

**CENTER OF APPLIED RESEARCH  
FOR NONPROFIT ORGANIZATIONS**

The Impact of Program Service on the Parent-Child  
Interaction and Hope

**Parent Child Center of Tulsa  
Preliminary Report**

Fall 2010

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## **Mission**

The Parent Child Center (PCCT) provides a wide range of services that focus on strengthening families to prevent and end child abuse and neglect in our community. The unique role PCCT plays in the community is child abuse prevention as well as being part of a continuum of services for families at risk in our community.

## **Purpose**

The purpose of this report is to present the Parent Child Center of Tulsa (PCCT) preliminary findings from a global assessment on the impact of services on parent-child relationship quality as well as the formation of hope. This preliminary report is the framework for future studies on specific programs and services provided by PCCT. Therefore, this report's focus is on predictors of the parent-child relationship and the predictors and indicators of hope among the clients.

## **Procedure**

200 surveys were distributed throughout the various departments within PCCT and administered to clients by PCCT staff. The survey consisted of two parts. The first part was a 50 question survey composed of four different scales (such as the Life Satisfaction Scale and the Hope Scale) as well as some questions about satisfaction with the services received. The second part was the Parenting Stress Index-Short Form (PSI-SF), which is made up of 36 items and is meant to identify potentially dysfunctional parent-child systems. These measurement scales will be further described below.

The number of surveys provided to each department was determined upon the number of clients served within each department. This stratification sampling strategy was used to maximize a representative sample across the whole organization. Ultimately 156 completed surveys were returned representing a 78% response rate. As a result, we argue that the findings provided in this report are generalizable to the clients served by PCCT.

## **Instruments**

The instruments used in developing the surveys were the Satisfaction with Life Scale, the Hope scale, the Scale of Positive and Negative Experience, Rosenberg's Self-Esteem Scale, and the Parenting Stress Index-Short Form. The following paragraphs describe the reliability of the scales within the current sample.

Reliability is defined as the extent to which a test *consistently* measures whatever it is measuring; therefore, the higher the reliability, the better (Gay & Airasian, 1992). Internal consistency reliability estimates ( $\alpha$ ) are commonly used to measure reliability; while there is no set standard for an appropriate reliability, an estimate  $\geq .70$  may be considered adequate for purposes of this study.

### ***The Satisfaction with Life Scale (SWLS)***

The SWLS is a 5-item scale that measures general perceptions about satisfaction with one's life. Respondents indicate on a 7-point Likert scale, which ranges from strongly agree to strongly disagree, their satisfaction with general aspects of their life. Scoring is done by adding up the total of all the responses. A score of 31-35 would indicate the person is extremely satisfied with their life, while 5-9 would indicate extreme dissatisfaction. Within this sample, the SWLS reported high reliability ( $\alpha = .85$ ).

### ***The Hope Scale***

The Hope Scale is a 12-item scale that measures the extent to which the respondent feels motivated to obtain goals and whether they see ways to attain those goals. The Hope Scale is divided into two subscales, the agency subscale, which measures the former, and the pathways subscale, which measures latter. A total hope score can be derived by adding to the two subscales. A 4-point Likert scale, ranging from 1 = definitely false to 4 = definitely true, is used to measure the responses. Reliability estimates for the total Hope Scale was adequate ( $\alpha = .67$ ). Reliability for the agency and pathways subscales was also good ( $\alpha = .76$ ;  $\alpha = .77$ , respectively).

### ***Scale of Positive and Negative Experience (SPANE)***

The SPANE is a 12-item scale that measures positive and negative feelings, with six questions about each. Scores are derived by adding up the responses from each subscale, and can vary from 6 (lowest possible score) to 30 (highest possible positive or negative feelings score). A total affect balance score can be derived by subtracting the negative feelings score from the positive feelings score, with a range of possible scores being -24 (unhappiest balance) to 24 (highest affect balance). The respondent indicates on a 5-point Likert scale (1 = very rarely or never, 5 = very often or always) how much they have been experiencing the list of feelings within the past four weeks. Reliability for the positive scale and negative scale were found ( $\alpha = .91$ ;  $\alpha = .87$ ; respectively).

### ***Rosenberg's Self-Esteem Scale (SES)***

Rosenberg's SES is a 10-item scale that uses a 4-point Likert format (1 = strongly agree; 4 = strongly disagree) to measure the overall evaluation of one's self worth. Scoring is done by adding up the items with 40 being the highest possible score. Cronbach's alpha of the overall scale was .87.

### ***Parent-Child Center Services Scale***

This scale was created in order to obtain information regarding clients' perceptions of the services they were receiving from PCCT. The scale is made up of six items in which respondents indicate on a 4-point Likert scale (1 = strongly disagree, 4 = strongly agree) the extent to which PCCT has improved their situation. Statistical analysis derived a Cronbach's alpha of .95.

### ***Relationship Quality***

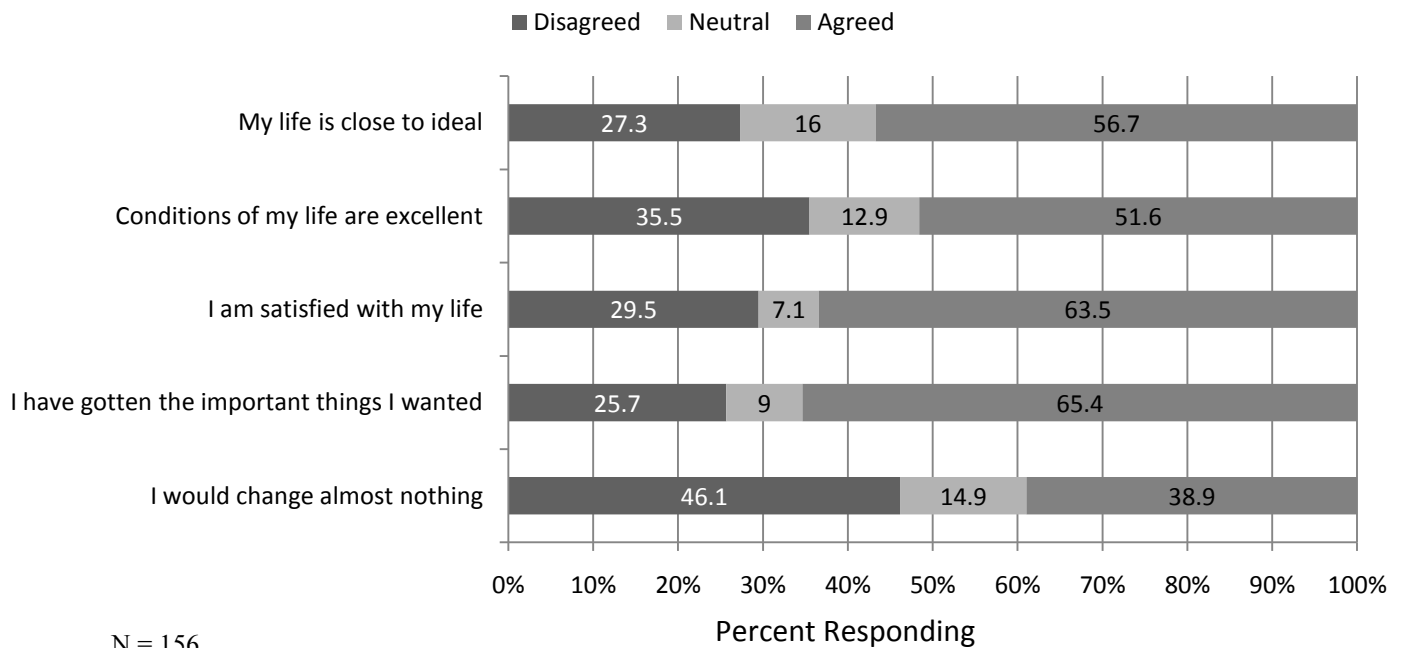
A relationship quality scale was also developed that consisted of four items with a Likert format similar to the Parent-Child Services Scale. Respondents indicated the extent to which they agreed or disagreed with a list of statements concerning their perceptions of relationship quality since beginning services at PCCT. Statistical analysis discovered a Cronbach's alpha of .94.

### ***Parenting Stress Index-Short Form (PSI-SF)***

The PSI-SF is a 36-item scale that has three subscales as well as a total stress score that is derived by adding up the scores from the previous subscales. Also embedded into the scale is a validity subscale, Defensive Responding, which is used to determine whether individuals are underreporting stress. The three subscales are Parental Distress (PD), Parent-Child Dysfunctional Interaction (PCID), and Difficult Child (DC). PD refers to the stress a parent experiences directly related to their role as parent while the PCDI is concerned with both parents' expectations of the child and whether the child is emotionally reinforcing to the parent (McKelvey, et al., 2009). The DC subscale is concerned with whether the parent perceives behaviors in the child as disruptive. Reliability scores were derived for each subscale (DR,  $\alpha = .79$ ; PD,  $\alpha = .88$ ; PCDI,  $\alpha = .88$ ; DC,  $\alpha = .91$ ; Total Stress,  $\alpha = .94$ ).

*The following pages contain the graphical representations of the  
Participants' responses to the questionnaires*

## Satisfaction with Life Scale

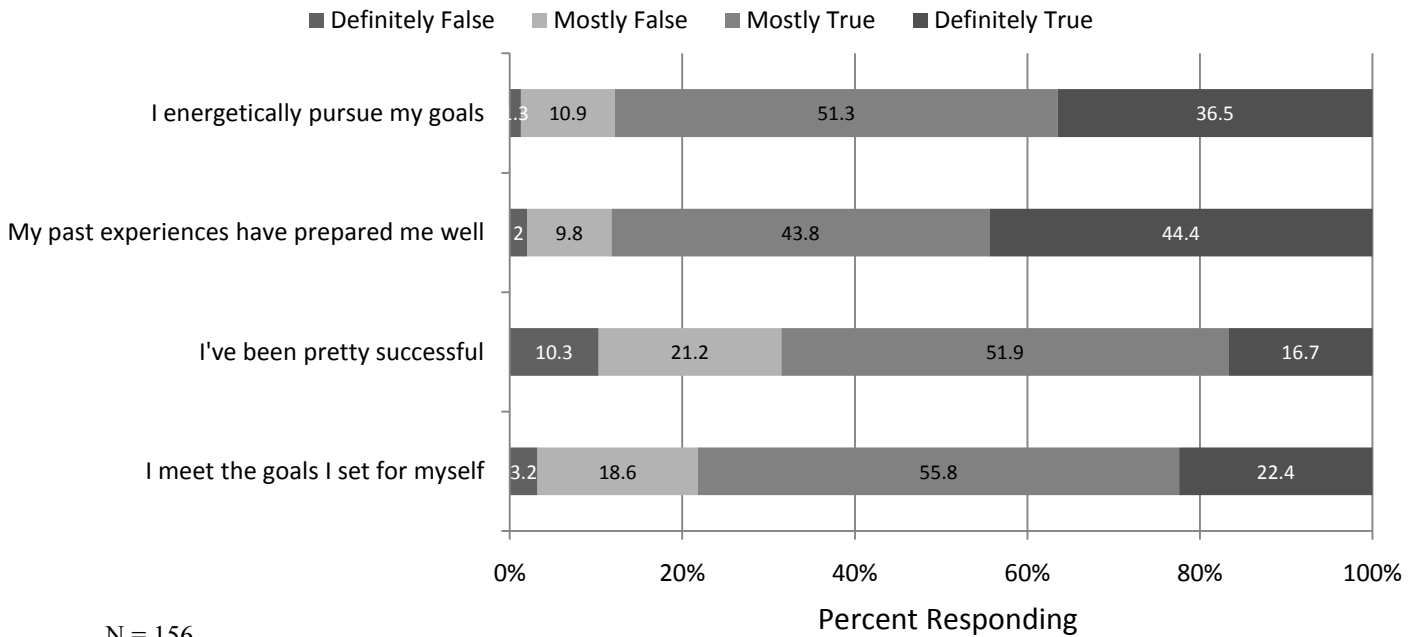


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**Satisfaction with life refers to general perceptions about one's satisfaction with their life**

The above graph illustrates the percentage of responses for each question in the SWLS. As shown, 56.7% agreed that their life was close to ideal, 51.6% agreed that the conditions of their life were excellent and 63.5% were satisfied with their life. Also, 65.4% have gotten the important things in life they wanted while 46.1% disagreed that they would change almost nothing.

# Hope Agency

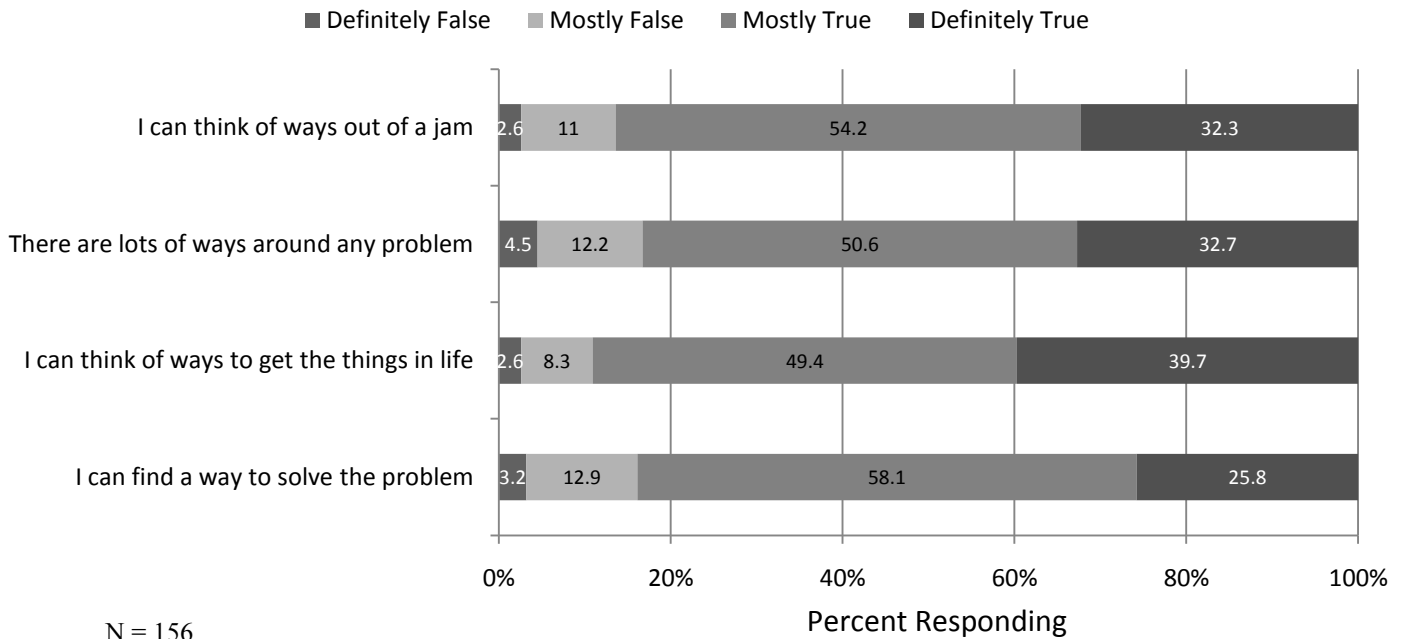


N = 156  
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**Hope Agency measures the extent to which the respondent feels motivated to obtain goals**

The above graph illustrates the percentage of responses for each question for the Hope Agency subscale of the Hope Scale. Of those who responded, 51.3% said it was mostly true that they energetically pursue their goals, while 44.4% claimed it was definitely true that past experiences have prepared them. 51.9% claimed it was mostly true that they have been pretty successful and 55.8% claimed it was mostly true that they meet the goals they set.

# Hope Pathways

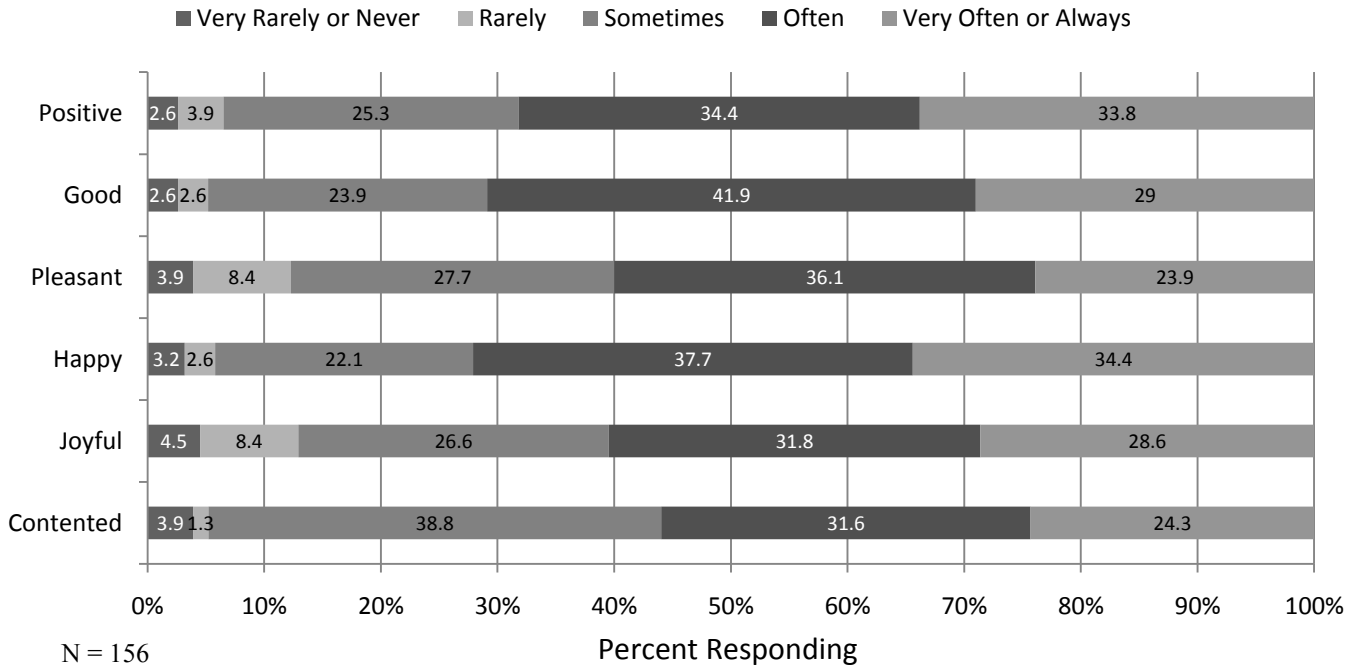


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**Hope Pathways refers to whether individuals see ways to attain goals**

The above graph illustrates the percentage of responses to each question for the Hope Pathways subscale. It was mostly true for 54.2% and 50.6% that they can think their way out of a jam and that there are lots of ways out of a problem, respectively. 49.4% and 58.1% reported it was mostly true that they can get things in life and find a way to solve a problem, respectively.

# SPANE Positive Feelings

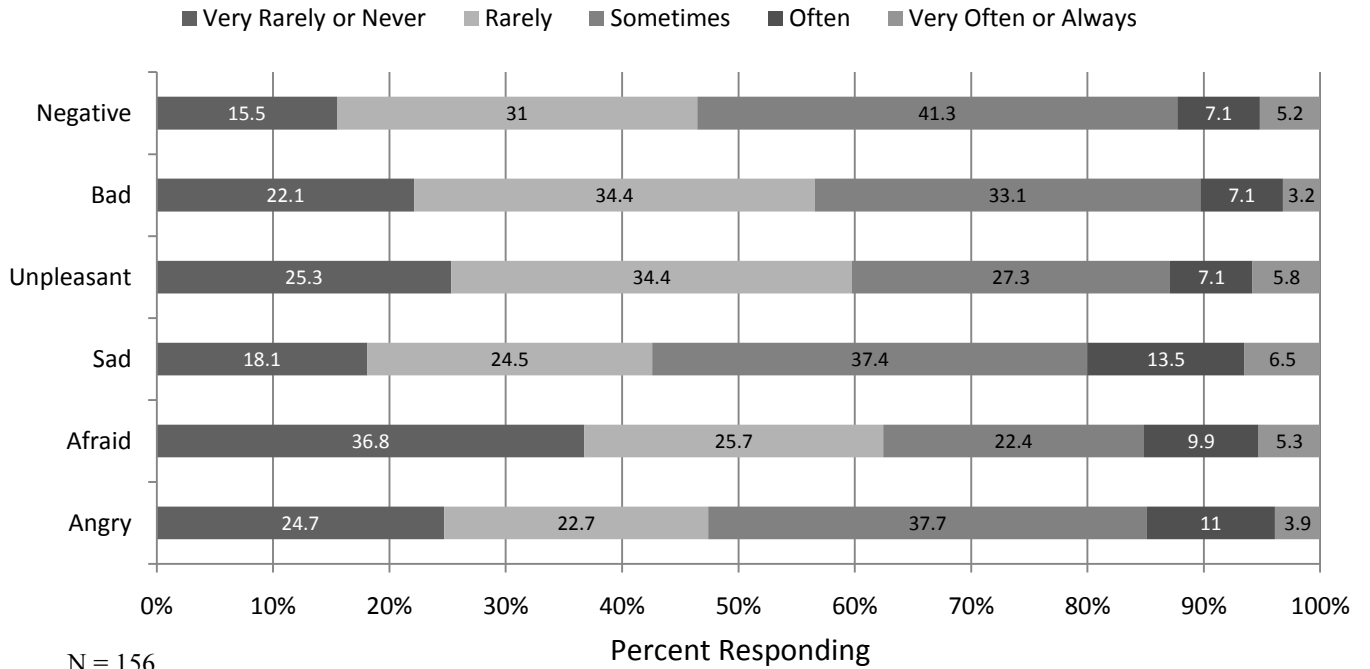


**Subscale which examines the number of positive feelings within the last four weeks**

The above graph illustrates the percentage of responses for each question of the SPANE Positive Feelings subscale. The highest percentages were found within the response of 'Often', with Positive being 34.4%, Good 41.9% and Pleasant 36.1%. Also, Happy was found to be 37.7%, Joyful 31.8% and Contented 31.6%.



## SPANE Negative Feelings

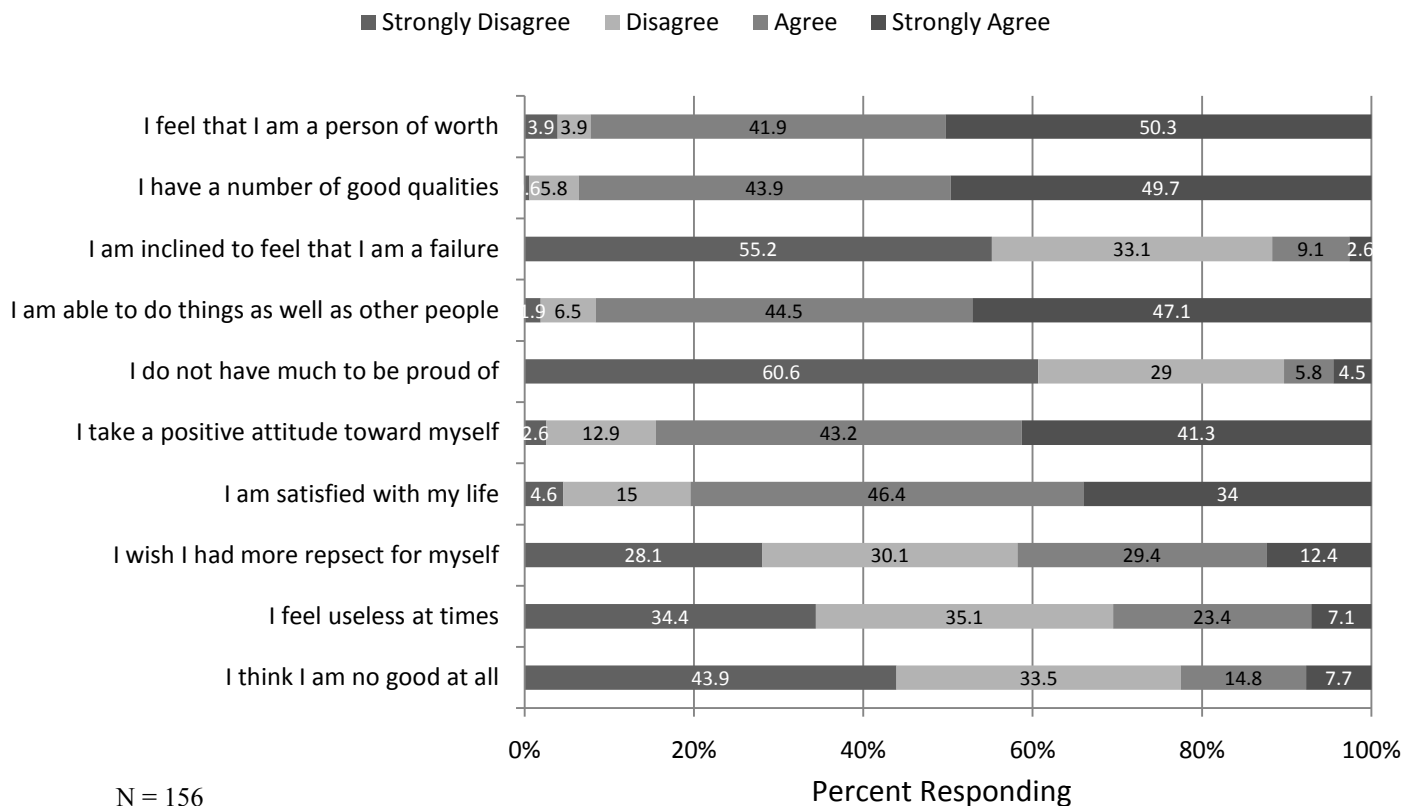


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**Subscale which examines the number of negative feelings within the last four weeks**

The above graph illustrates the percentage of responses for each question of the SPANE Negative Feelings subscale. Of those responding, 41.3% reported feeling Negative sometimes, 34.4% reported feeling Bad rarely and 34.4% reported feeling Unpleasant rarely. Additionally, 37.4% and 37.7% of respondents also reported feeling Sad and Angry sometimes, respectively, while 36.8% very rarely or never felt afraid.

## Rosenberg's Self-Esteem Scale

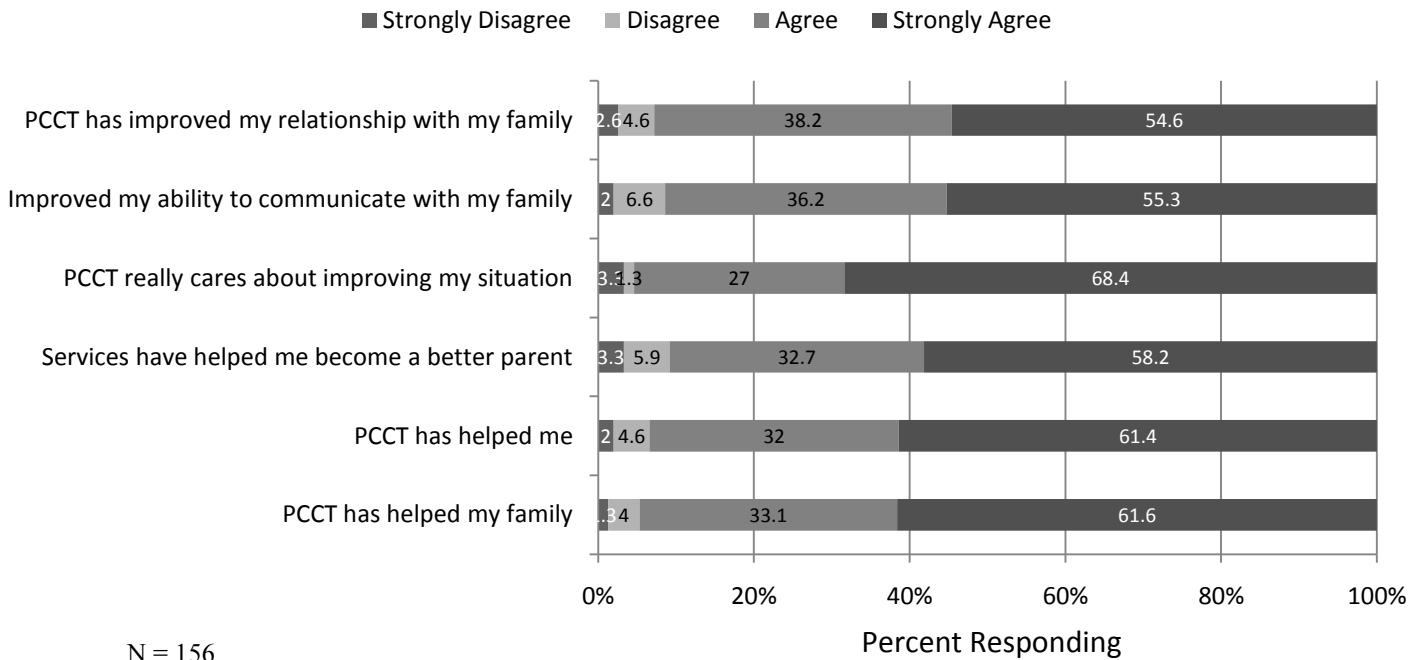


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**Self-esteem is seen as an overall perception of one's self worth**

The above graph illustrates the percentage of responses for each question of Rosenberg's Self-Esteem Scale. Of those who responded, 50.3% and 49.7% strongly agreed that they were a person of worth and they had good qualities, respectively. Also, 60.6% strongly disagreed that they do not have much to be proud of, while 43.9% strongly disagree with the statement that they are no good at all.

## Parent-Child Center Services Scale

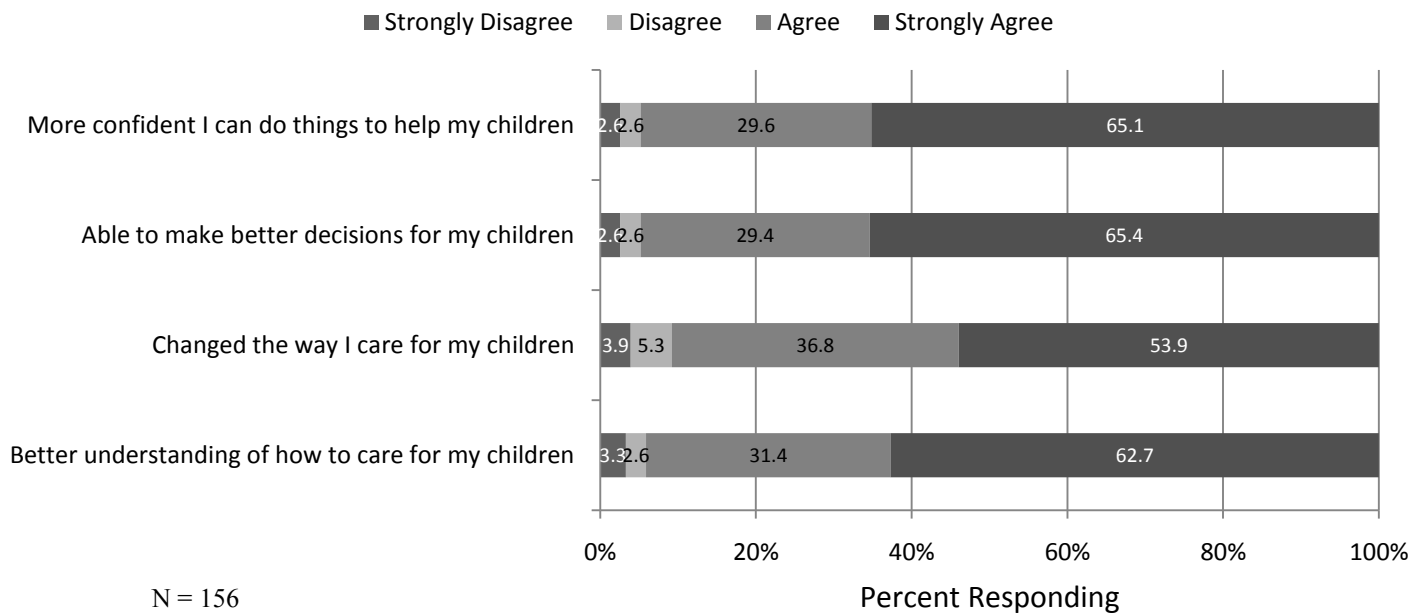


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**Examines respondents  
perceptions of the services they  
have received from PCCT**

The above graph illustrates the percentage of responses for each question of the PCCT Services Scale. An overwhelming number of respondents indicated that they agreed or strongly agreed with all of the questions. For example, 92.8% agreed/strongly agreed that PCCT improved their relationship with their family, while 91.5% agreed/strongly agreed that PCCT improved their ability to communicate with their family. 93.4% agreed/strongly agreed that PCCT has helped them, while 94.7% agreed/strongly agreed that PCCT has helped their family.

# Relationship Quality

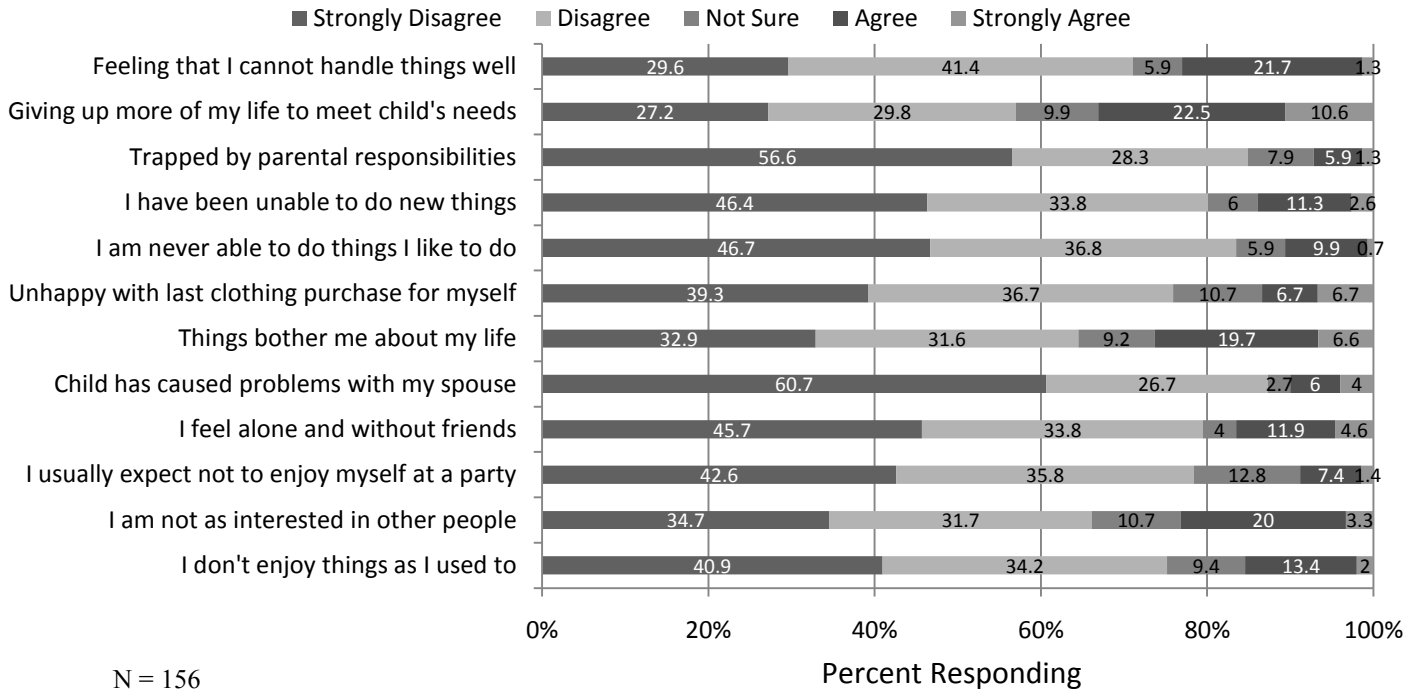


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**Examines the changes in relationship quality since beginning services at PCCT**

The above graph illustrates the percentage of responses for each question of the Relationship Quality scale. 94.7%, 94.8%, 90.7%, and 94.1% agreed/strongly agreed that they felt more confident to help their child, make better decisions regarding their child, changed the way they care for their child, and have a better understanding of how to care for their child, respectively.

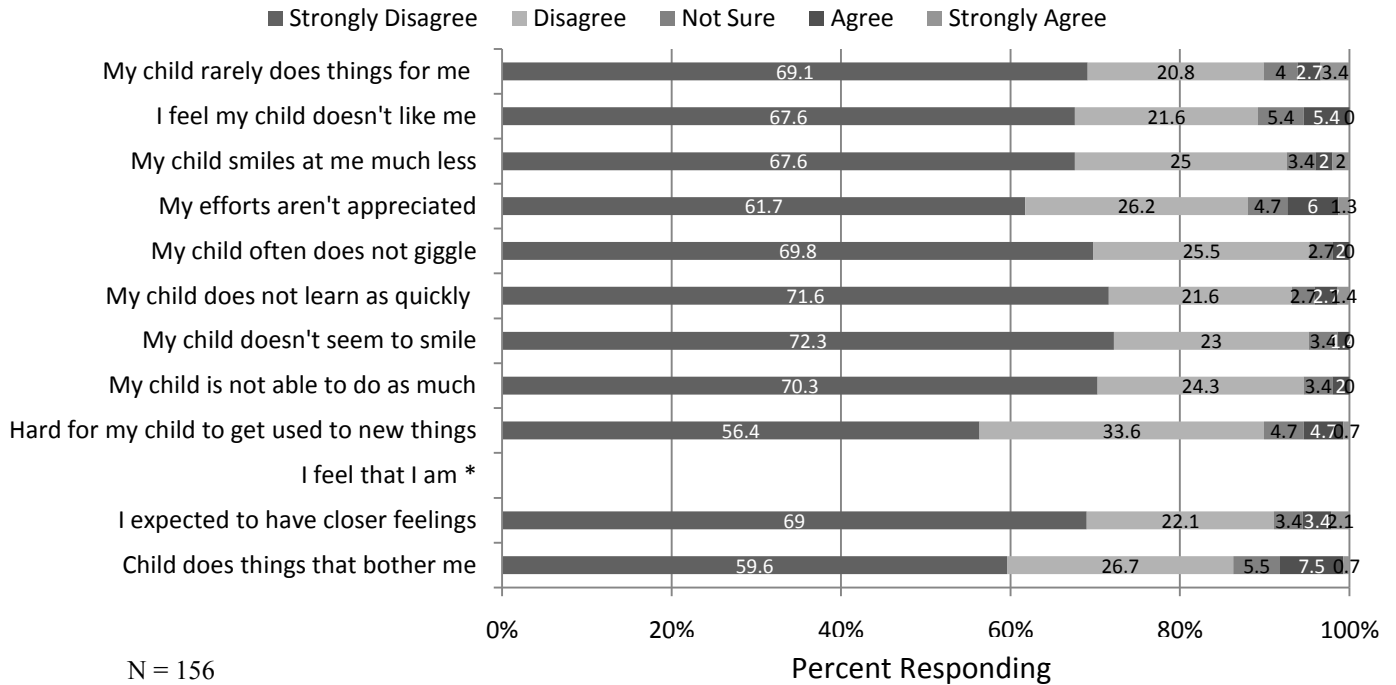
## Parental Distress (PD)



**Stress related to one's role as a parent**

The above graph illustrates the percentage of responses for each question of the Parental Distress subscale of the PSI-SF. 56.6% strongly disagreed that they felt trapped by parental responsibilities while 60.7% strongly disagreed that their child has caused problems with their spouse. Also, 41.4% disagreed that they could not handle things well and 45.7% strongly disagreed that they felt alone.

## Parent-Child Dysfunctional Interaction (PCDI)



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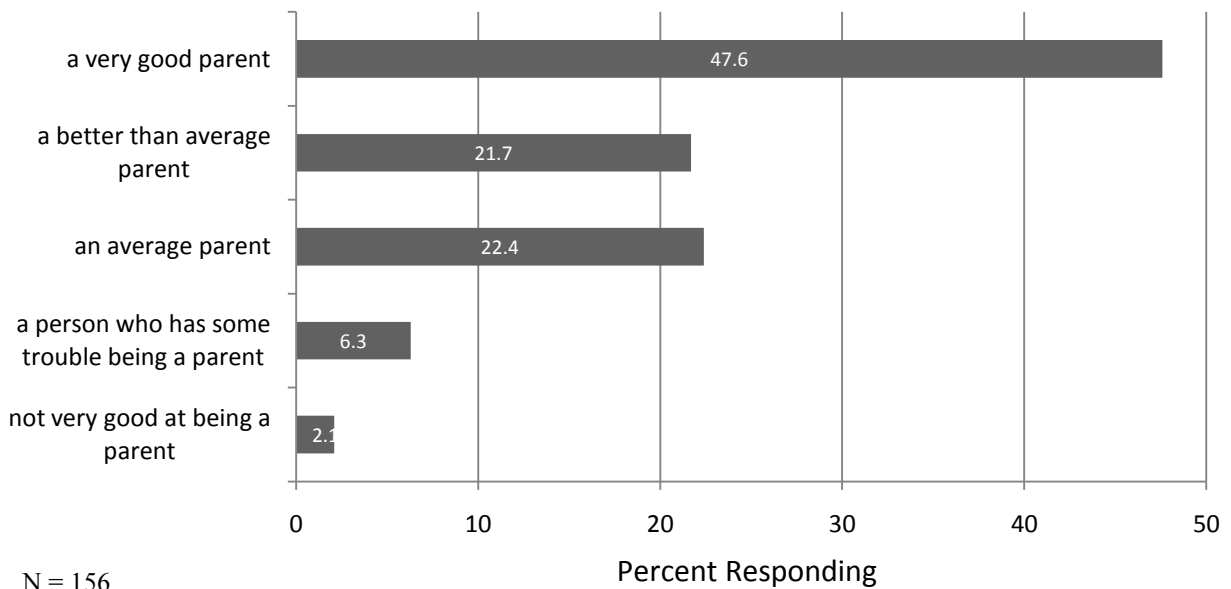
**Subscale looks at parents' expectations of their child**

The above graph illustrates the percentage of responses for each question of the PCDI subscale of the PSI-SF. The majority of responses were in the strongly disagreed category. 72.3% strongly disagreed that their child does not seem to smile and 71.6% strongly disagreed that their child does not learn quickly. 70.3% and 69.1% strongly disagreed that their child is not able to do as much as other children and rarely does things for them, respectively.

\* Please see graph on the next page for this question

### \* Sub Question of PCDI

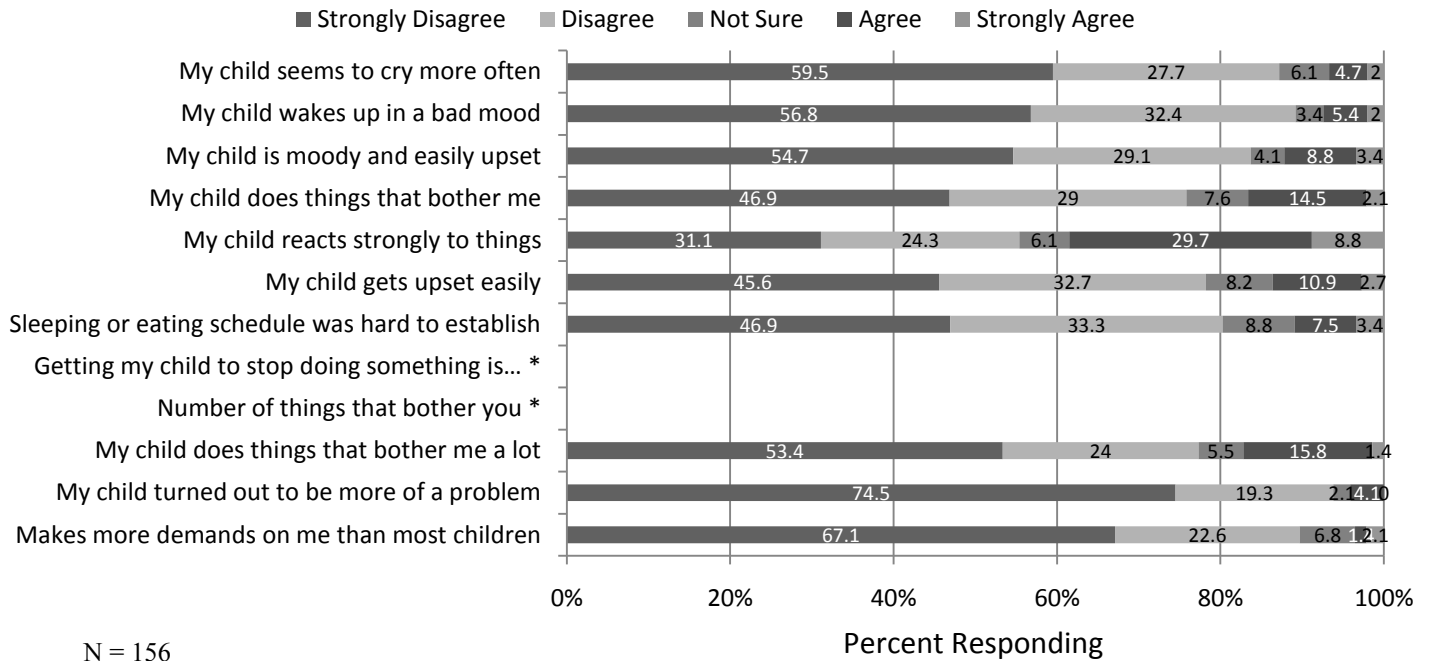
I feel that I am...



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The above graph illustrates the percentage of responses for the statement "I feel that...". 47.6% reported they felt they are a very good parent, 21.7% a better than average parent and 22.4% an average parent. Also, 6.3% and 2.1% reported being a person that has some troubles parenting and feel that they are not very good at being a parent, respectively.

## Difficult Child (DC)



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**Difficult Child examines whether the parent views their child's behavior as disruptive**

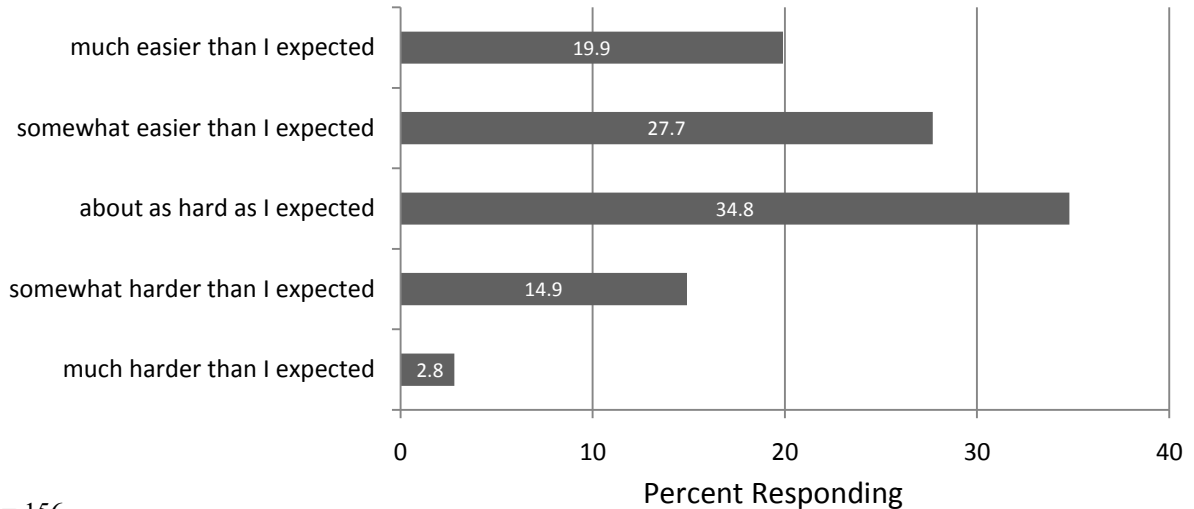
The above graph illustrates the percentage of responses for each question of the Difficult Child subscale. For the most part, the highest percentage of responses are strongly disagree, with 59.5% strongly disagreeing that their child seems to cry more often than other children and 56.8% strongly disagreeing that their child wakes up in a bad mood. Also, 74.5% strongly disagreed that their child turned out be more of a problem while 67.1% strongly disagreed that their child makes more demands on them.

\* Please see graphs on the following pages for these responses



### \* Sub Question #1 for DC

I have found that getting my child to do something or stop doing something is...

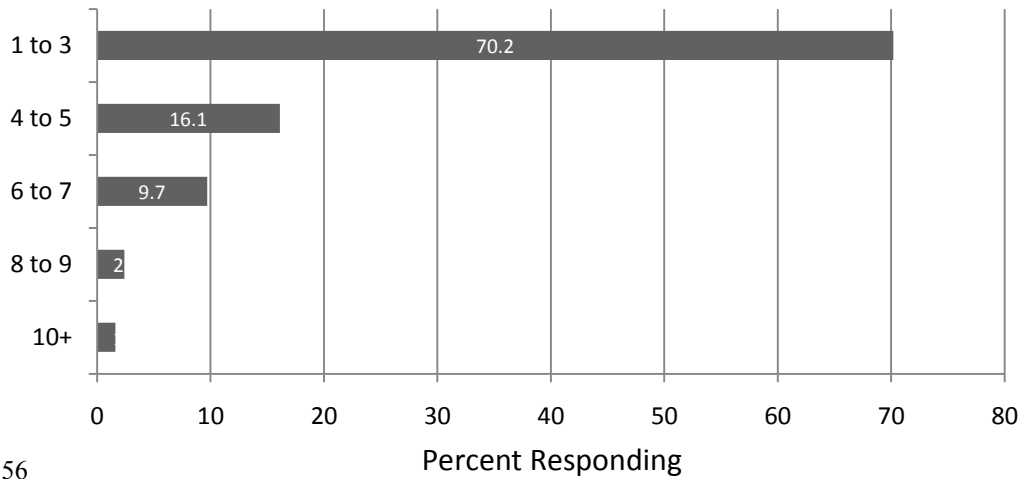


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The above graph illustrates the percentage of responses for the statement “I have found that getting my child to do something or stop doing something is...”. 47.6% felt that getting their child to do something was much easier or somewhat easier than expected. 34.8% felt that it was about as hard as they expected. 17.7% felt that it was somewhat harder or much harder than they expected.

### \* Sub Question #2 for DC

Count the number of things your child does that bother you



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The above graph illustrates the percentage of responses for the statement “Count the number of things your child does that bother you”. 70.2% reported 1-3, 16.1% reported 4 to 5, and 9.7% reported 6 to 7. 2.4% and 1.6% reported 8 to 9 and 10+, respectively.

## **Relationships Among the Measures**

The table on the next page provides the correlation matrix for all the scales described above. A correlation represents the level of relationship between two variables. The interpretation is based upon the strength of the relationship as well as the direction. Strength of a correlation is based upon Cohen's (1990) effect size heuristic. More specifically, a correlation (+ or -) of .10 or higher is considered small; a correlation (+ or -) of .30 is considered moderate, and a correlation (+ or -) of .50 is considered strong. With regards to direction, a positive correlation indicates that higher scores on one variable are associated with higher scores on the other variable. A negative correlation indicates that higher scores on one variable are associated with lower scores on the other variable. Using a correlation matrix is a parsimonious way to present several correlations among multiple variables. Identifying a specific correlation is based upon matching a row to a particular column.

### **Examples from Table 1.0:**

On the left side of the table the column marked "Variable" identifies the order of the correlations. The first variable "life satisfaction" is also the next column. The first correlation ( $r = .58; p < .01$ ) under the life satisfaction column represents the relationship between life satisfaction and hope agency. We interpret this correlation as follows: "Participating clients who reported higher levels of motivation to attaining goals (hope agency) also reported higher scores of life satisfaction reflecting a strong positive correlation."

With respect to the impact hope has on parental stress, higher scores of hope agency were associated with lower scores of parental distress ( $r = -.47; p < .01$ ) and lower scores of total stress ( $r = -.34; p < .01$ ). Also, hope pathways had a moderately negative relationship with parental distress ( $r = -.34; p < .01$ ) as well as a small-to-moderately negative relationship with total stress ( $r = -.22; p < .05$ ). In regards to relationship quality, higher scores on relationship quality were associated with lower scores on both parental distress ( $r = -.22; p < .01$ ) as well as total stress ( $r = -.21; p < .01$ ), representing a small-to-moderate negative relationship in both cases.

## Correlation Matrix

Table 1.0: *Correlations of all of the various scales and subscales*

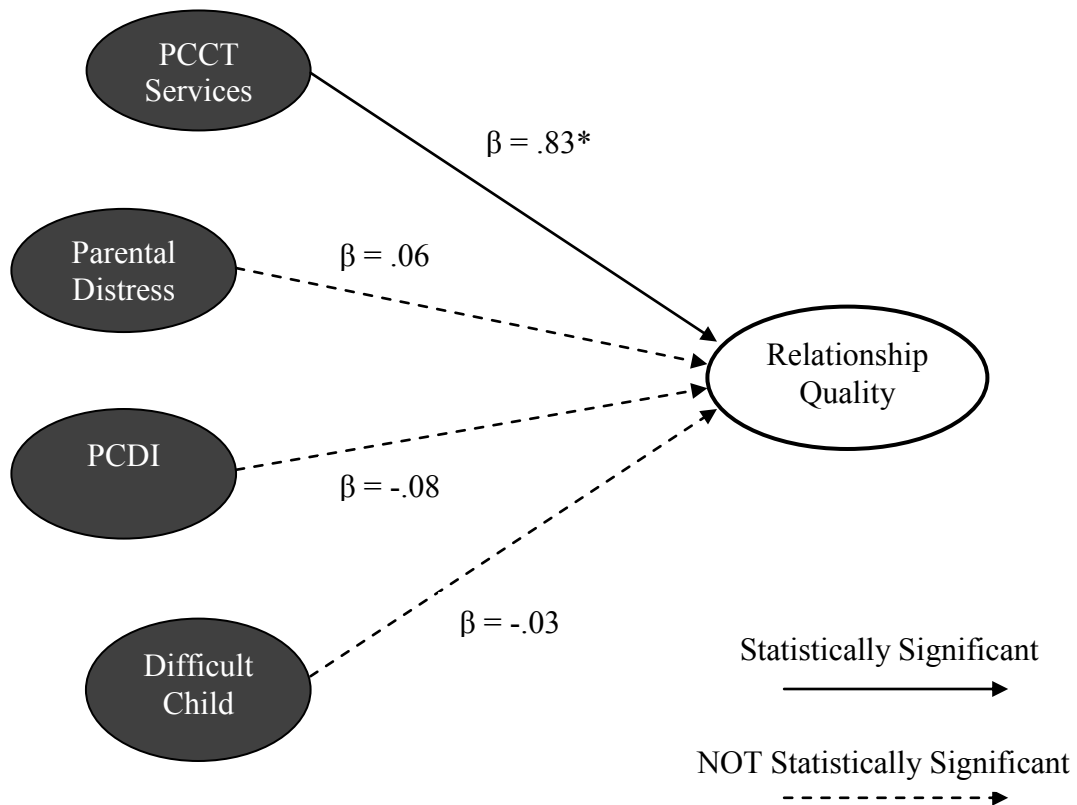
Variable	Life Satisfaction	Hope Agency	Hope Pathways	Hope Total	SPANE Positive	SPANE Negative	SPANE Balance	Self-Esteem	PSI-DR	PSI-PD	PSI-PCDI	PSI-DC	PSI-Total Stress	PCCT Services	RQ
Life Satisfaction															
Hope Agency	.58**														
Hope Pathways	.50**	.64**													
Hope Total	.59**	.91**	.90**												
SPANE Positive	.59**	.56**	.47**	.56**											
SPANE Negative	-.45**	-.53**	-.32**	-.48**	-.67**										
SPANE Balance	.58**	.59**	.43**	.57**	.91**	-.91**									
Self-Esteem	.45**	.49**	.43**	.50**	.68**	-.59**	.70**								
PSI-DR	-.38**	-.42**	-.35**	-.42**	-.53**	.52**	-.57**	-.63**							
PSI-PD	-.40**	-.47**	-.34**	-.45**	-.54**	.52**	-.58**	-.62**	.96**						
PSI-PCDI	-.24**	-.16	-.16	-.18*	-.29**	.29**	-.32**	-.38**	.47**	.50**					
PSI-DC	-.25**	-.17*	-.18	-.16	-.31**	.29**	-.34**	-.32**	.51**	.59**	.77**				
PSI-Total Stress	-.35**	-.34**	-.22*	-.31**	-.45**	.46**	-.50**	-.50**	.77**	.82**	.84**	.90**			
PCCT Services	.30*	.36**	.26**	.35**	.47**	-.32**	.44**	.25**	-.27**	-.27**	-.16	-.17	-.21*		
RQ	.25**	.28**	.19*	.26**	.40**	-.28**	.37**	.25**	-.24**	-.22**	-.15	-.17*	-.21*	.79**	

Note. N = 156. \* $p < .05$ , \*\* $p < .01$

## Regression Analysis

The correlation matrix above shows several variables associated with the parent-child relationship quality. In particular, consistent with the empirical literature, there is an adverse effect between parent stress on the parent-child interaction (Schechter, Willheim, Hinojosa, Scholfield-Kleinman, Turner, McCaw, et al., 2010). Thus, to examine the effects of parent stress a regression analysis was used to further examine the relationship between the three subscales of the PSI-SF, PCCT Services Scale, and Relationship Quality. Specifically, Relationship Quality was regressed on the other scales (see figure 1). The regression was significant  $R^2 = .71$  [ $F(4, 118) = 71.83, p < .01$ ] with the predictors accounting for 71% of the variance. However, the only predictor that proved significant when controlling for the variables was PCCT services. This means that PCCT services are *the* significant predictive factor in relationship quality ( $\beta = .83; p < .001$ ).

Figure 1.0



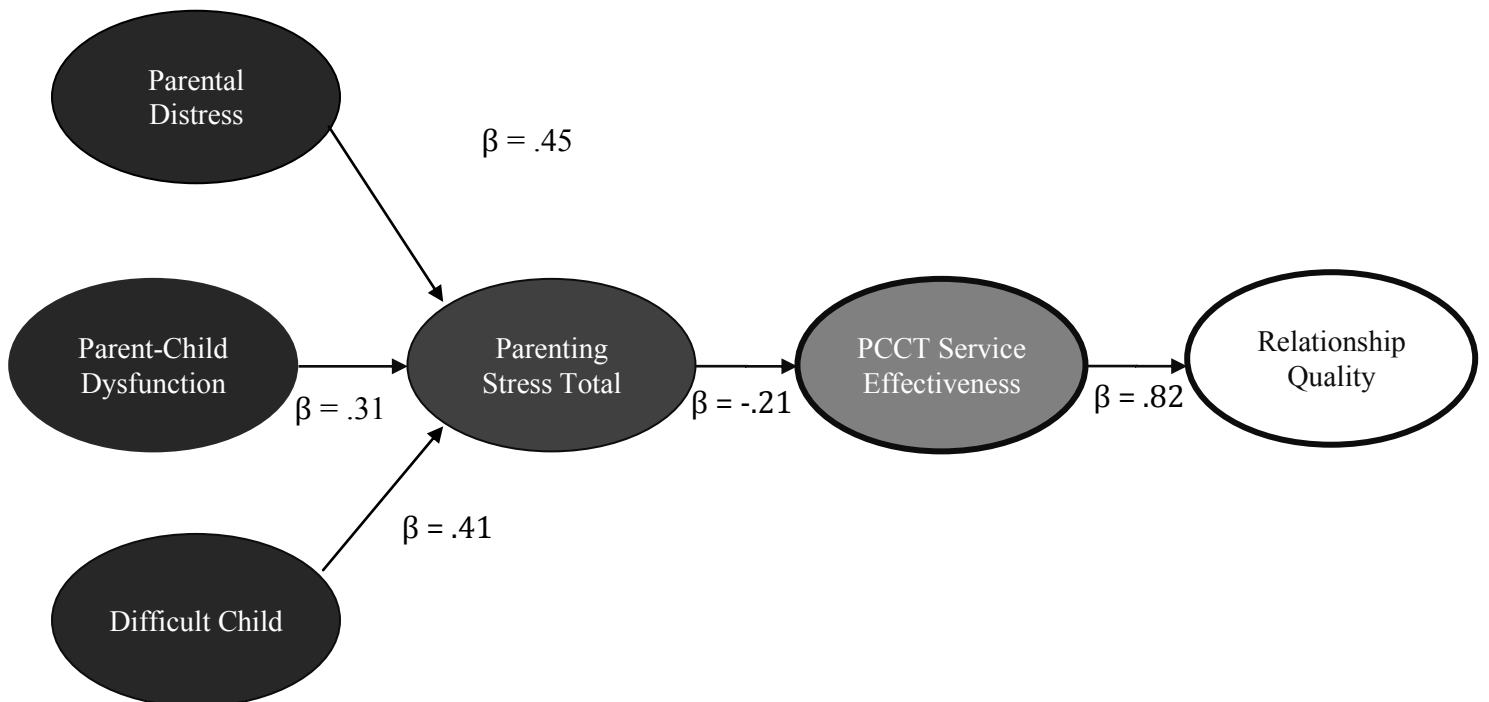
Note. \* $p < .001$

## The Mediating Effect of PCCT Services on the Relationship Between Parenting Stress and Parent-Child Relationship Quality

The previous graph demonstrates that perceived service effectiveness is the best predictor of improved relationship quality. Subsequently, we tested a mediational model to better understand the impact of service effectiveness relative to the negative impact of parental stress. Baron and Kenny (1986) stated "...a variable may be said to function as a mediator to the extent that it accounts for the relation between a predictor and criterion." (p. 1176). From this it is important to note that the correlation matrix showed a significant negative relationship between the parenting stress variables and relationship quality. Indeed, the final model below illustrates the mediating effect of service effectiveness on the relationship between parenting stress and relationship quality.

Moving from left to right, the graph shows that the relationship between parenting stress and relationship quality is indirect via service effectiveness and that service effectiveness has a direct relationship with relationship quality. While it is not appropriate to describe this relationship in terms of cause and effect, this finding suggests the positive impact service delivery is having on the mission of the Parent Child Center. That is, the negative affects of parental stress on relationship quality are alleviated through PCCT services.

Figure 2.0

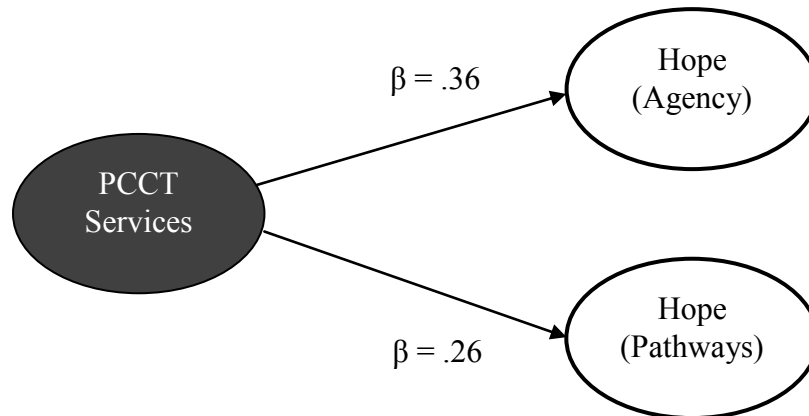


### Parent-Child Center as a Pathway of Hope

Hope is a positive motivational state that is based upon the interplay between successful goal-directed energy and planning to meet goals. Further, hope is the perceived capacity to produce clear goals, along with the routes to reach these goals (pathways thinking) and the motivation to use those routes (agency thinking). PCCT services are significant predictors of hope among the responding clients. Indeed, services received have increased the pathways to goal attainment as well as the motivation to pursue the pathways.

Hope theory argues that we are motivated by our goals. While limited literature exists on the relationship between hope and the improvement of parent-child relations these preliminary findings suggest that the services provided by the PCCT provide pathways of hope for at-risk families. Indeed, without hope there is no motivation to change one's behavior (cf. Snyder, 2002).

Figure 3.0



## **Impact of Hope on Client Well-Being**

Table 2.0: *The mean scores on specific scales and subscales within a particular grouping*

	Low Hope	Medium Hope	High Hope	F	<i>p-value</i>
Life Satisfaction	13.08	22.23	27.79	22.79	.000
SPANE Positive	16.79	22.81	26.74	25.71	.000
SPANE Negative	19.07	15.11	14.65	16.73	.000
SPANE Balance	-2.29	7.74	16.07	25.79	.000
Self-Esteem	26.69	31.93	35.79	15.30	.000
PSI Parental Distress	33.58	24.52	19.85	11.60	.000
PSI Difficult Child	18.50	21.55	16.00	4.77	.010
PSI Total Stress	69.50	63.45	50.26	5.13	.007
PCCT Services	17.79	21.42	22.14	9.02	.000
Relationship Quality	12.64	14.10	14.86	3.48	.033

The table above provides a comparison on the well-being between high hope and low hope clients. More specifically, clients were categorized into low hope if they scored below one standard deviation of the mean of hope. High hope clients were those who scored one standard deviation above the average score for hope. Subsequently, a series of ANOVAs were then computed to compare these groups. These findings are generally consistent with the hope literature on the positive impact of high hope within the counseling arena (Snyder, 2002).

### **High Hope**

Clients with higher levels of hope have:

- Higher Life Satisfaction
- Higher Positive Affect
- Lower Negative Affect
- Better Affect Balance
- Higher Self-Esteem
- Lower Parental Distress
- Lower Perceived Difficult Child Evaluation
- Lower Total Stress
- Higher Relationship Quality
- Higher Perceived PCCT Service Effectiveness



## **Impact of Stress on Client Well-Being**

Table 3.0: *The mean scores on specific scales and subscales within a particular grouping*

	Low Stress	Medium Stress	High Stress	F	<i>p-value</i>
Life Satisfaction	26.94	22.65	18.13	6.46	.002
SPANE Positive	24.89	23.05	18.80	7.03	.001
SPANE Negative	11.42	14.99	19.27	11.53	.000
SPANE Balance	13.47	8.06	-.47	10.78	.000
Self-Esteem	35.53	32.51	28.00	7.86	.001
Hope Agency	13.63	12.25	11.19	5.48	.005

The table above provides a comparison on the well-being between high stress and low stress clients. More specifically, clients were categorized into low stress if they scored below one standard deviation of the mean of parent stress. High stress clients were those who scored one standard deviation above the average score for parenting stress. It is important to note that those who scored high on stress approximated the score Abidin (1995) listed for clients in crisis. Subsequently, a series of ANOVAs were then computed to compare these groups. These findings are generally consistent with the literature on the negative impact of high stress within the counseling arena.

### **High Stress**

Clients with higher levels of stress have:

- Lower Self-Esteem
- Lower Affect Balance
- Lower Positive Affect
- Higher Negative Affect
- Lower Hope Agency
- Lower Life Satisfaction

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