

## ABSTRACT

CLAY, AMY LEONARD. Population-level Implementation of Triple P: Practitioner-reported Organizational Barriers and Facilitators to Use (Under the direction of Mary E. Haskett).

Previous research has supported the efficacy of the Triple P – Positive Parenting Program for reducing dysfunctional parenting behaviors, increasing positive parenting behaviors, and reducing negative child behavior. However, prior evaluations suggested that sustained and widespread use of Triple P was limited among accredited practitioners. The purpose of the current study was to contribute to the understanding of how Triple P can be widely utilized to decrease child maltreatment by evaluating the organizational-level barriers and facilitators to practitioner use of Triple P. A survey of 297 accredited providers in a state-wide adoption of Triple P was used to address research questions, and was supplemented by a qualitative analysis of data from focus groups conducted with practitioners across six county clusters in the state. Inconsistent with study hypotheses, neither the frequency of supervision where Triple P was discussed, the perceived degree of organizational support for utilization of Triple P, nor the interaction between these variables predicted practitioners' perceived fit of Triple P with typical services. However, both the length of time a practitioner was accredited in Triple P and the degree of organizational support for utilization were significant predictors of the number of caregivers served using Triple P, with increases in each variable predicting likelihood of membership in the group of practitioners serving the highest number of caregivers. Additionally, the interaction between organizational support and frequency of supervision was significant, and suggested that simultaneous increase of these variables led to a greater likelihood of having served no caregivers. Qualitative findings, including emergent themes of organizational attributes, practitioner engagement, and system-level collaboration are also discussed.

© Copyright 2018 by Amy Leonard Clay

All Rights Reserved

Population-level Implementation of Triple P: Practitioner-reported Organizational Barriers and Facilitators to Use

by  
Amy Leonard Clay

A dissertation submitted to the Graduate Faculty of  
North Carolina State University  
in partial fulfillment of the  
requirements for the degree of  
Doctor of Philosophy

Psychology

Raleigh, North Carolina

2018

APPROVED BY:

---

Dr. Mary Haskett  
Committee Chair

---

Dr. Kate Norwalk

---

Dr. Elan Hope

---

Dr. Craig Brookins

## DEDICATION

To my best friend and husband Joseph, who encouraged me to always keep going, even when I was ready to stop. To my parents, who lit my path every step of the way (even when they weren't quite sure where it was leading). To my wonderful brother and his family, the beautiful family that I married into, and my late but beloved grandparents, for always being so proud of me and for keeping me smiling and laughing. To my tribe of friends near and far, who constantly support me, inspire me, and lift me up. And last but not least, to my Franklin and Bash: my furry study buddies who stuck by my side through law school, graduate school, a thesis, a bar exam, and a dissertation. They deserve a handful of letters after their names as well.

## **BIOGRAPHY**

Amy Leonard Clay was born on December 6, 1988 in Dumas, Texas. She completed her undergraduate coursework at the University of North Carolina at Chapel Hill, where she double-majored in Psychology and Sociology. In 2015, she obtained a Masters Degree in Psychology from North Carolina State University, and in 2016, a Juris Doctor degree from Campbell University Norman Adrian Wiggins School of Law. After a successful bar examination, she was admitted to the North Carolina State Bar in 2017. Following completion of her Doctor of Philosophy in School Psychology degree, she will pursue a career that allows her to fuse her training in law and psychology in a way that will serve to influence policy decisions in the field of education.

## ACKNOWLEDGMENTS

I have much gratitude for the continued support and guidance offered by research advisor, Dr. Mary Haskett, and my dissertation committee: Dr. Kate Norwalk, Dr. Craig *Kwesi* Brookins, and Dr. Elan Hope, as well as my Graduate School representative, Dr. Alan Ellis, and my motivating and inspiring peers in the Family Studies Research Lab. I appreciate your time, availability, and challenging and thoughtful feedback offered throughout the process. Additionally, a most sincere thank you is offered to Dr. Erin Banks, for her support and advocacy throughout my doctoral career.

## TABLE OF CONTENTS

LIST OF TABLES .....	vi
LIST OF FIGURES .....	vii
<b>Population-level Implementation of Triple P: Practitioner-reported Organizational Barriers and Facilitators to Use</b> .....	<b>1</b>
Triple P - Positive Parenting Program .....	2
Implementation Science Research.....	4
Implementation process and evidence-based practice.....	4
Understanding the role of the organization: Parenting interventions.....	6
<b>The Current Study</b> .....	<b>8</b>
<b>Method</b> .....	<b>11</b>
Participants.....	11
Procedure .....	12
Measure and Variables.....	13
NC Triple P Learning Collaborative: Practitioner Survey .....	13
Number of caregivers served.....	13
Perceived fit.....	13
Frequency of supervision or staff meetings where Triple P is discussed.....	13
Degree of agency support.....	14
Length of accreditation.....	14
Practitioner focus groups.....	14
<b>Results</b> .....	<b>15</b>
Descriptions of Variables.....	15
Test of Hypotheses.....	16
Fit with typical services.....	16
Number of caregivers served.....	17
Thematic Analysis of Focus Group Data.....	18
Analytic Process.....	18
Theme 1: Organizational attributes .....	22
Theme 2: Practitioner engagement.....	25
Theme 3: System level collaboration .....	27
<b>Discussion</b> .....	<b>29</b>
Limitations.....	34
Future Directions .....	35
Recommendations .....	36
<b>References</b> .....	<b>45</b>
<b>Appendices</b> .....	<b>51</b>
Appendix A: Codes and Code Definitions .....	52

**LIST OF TABLES**

Table 1	Frequencies of Demographic Variables .....	39
Table 2	Descriptive Statistics and Bivariate Correlations .....	41
Table 3	Ordinal Logistic Regression Parameter Estimates for Fit with Typical Services ....	42
Table 4	Multinomial Logistic Regression Parameter Estimates for Number of Caregivers Served .....	43
Table 5	Code Frequencies Across Counties .....	44



**LIST OF FIGURES**

Figure 1 Levels of Triple P ..... 38

## **Population-level Implementation of Triple P: Practitioner-reported Organizational Barriers and Facilitators to Use**

According to the World Health Organization, child maltreatment is a global public health problem, with lifelong negative implications for children's development and success (World Health Organization, 2016). Child maltreatment in early childhood has been found to serve as a predictor of behavioral, social, and learning difficulties when the child reaches pre-kindergarten age (Fantuzzo, Perlman, & Dobbins, 2011). Effects of child maltreatment may include physical trauma (such as abusive head trauma and impaired brain development), psychological impact (including poor mental and emotional health), behavioral problems (including those resulting in juvenile delinquency), and societal costs (Child Welfare Information Gateway, 2013).

Addressing the problem of child maltreatment is of critical importance to the global protection of children. One in four adults report being physically abused as a child, and one in five women and one in 13 men report experiencing childhood sexual abuse (World Health Organization, 2016). According to the Centers for Disease Control, enhancing parenting skills in an effort to promote the healthy development of children has the potential to reduce the perpetration of child abuse and neglect, as well as associated risk factors such as a parent's lack of education regarding child development and child behavioral problems (Center for Disease Control and Prevention, 2016). Population-level parenting interventions aimed at improving parenting skills on a large scale are critical for reducing child maltreatment. The Triple P Positive Parenting Program (Sanders, 1999) is one of the only parenting programs described by the World Health Organization as yielding strong evidence for effectiveness at preventing child maltreatment (World Health Organization, 2009). According to the American Psychological Association, evidence-based practice in psychology is defined as "the integration of the best

available research with clinical expertise in the context of patient characteristics, culture, and preferences” (APA Presidential Task Force on Evidence-Based Practice, 2006). Similarly, the Institute of Medicine defines evidence-based practice in the medical field as “the integration of best research evidence with clinical expertise and patient values (Institute of Medicine, 2001, p. 147). Evidence-based parenting programs such as Triple P are considered the optimal choice for intervention in regard to child welfare and parenting practices (Carr, 2014; Furlong & McGilloway, 2015; Valdez et al., 2005) and while used widely, research on population-level implementation of Triple P has only recently begun. One of the primary challenges in large-scale adoption of Triple P and other evidence-based child maltreatment prevention programs is ensuring that professionals trained to use the programs incorporate it into their practice with families and utilize it after adoption (Sanders, Prinz, & Shapiro, 2009).

The purpose of the current study was to contribute to the overall understanding of how Triple P can be widely utilized to decrease child maltreatment by evaluating the organizational-level barriers and facilitators to practitioner use of the Triple P Positive Parenting Program. Below is an overview of Triple P, including a brief discussion of outcome studies demonstrating efficacy, followed by an examination of existing implementation science research related to evidence based parenting interventions. Lastly, methodology and findings of the current study are discussed.

### **Triple P – Positive Parenting Program**

The Triple P Program is an evidence-based parenting intervention designed to provide support and education for caregivers of children and adolescents. The Triple P model is a “suite” of interventions with five levels; each level more intensive than the previous (Figure 1). These levels are designed to provide families and/or communities with the optimal amount of support

necessary to meet their needs, with the rationale that there exist “differing levels of dysfunction and behavioral disturbance in children, and parents have differing needs and desires regarding the type, intensity, and mode of assistance they may require (Sanders, 1999, p. 72). Level 1 of Triple-P is intended to reach the largest number of families within a community while Level 5 is expected to reach the fewest number of families, with the most intensive needs. In addition to a diversity of levels based on need, Triple P is also designed to address the needs of children across developmental periods, from infancy to adolescence (Sanders, 2008).

Numerous outcome studies conducted internationally (including, for example, the United States, Japan, Switzerland, Hong Kong, Iran, and among Indigenous Australians) have supported the efficacy of Triple P for reducing dysfunctional parenting behaviors, increasing positive parenting behaviors, and reducing negative child behavior (Bodenmann, Cina, Ledermann & Sanders, 2008; De Graaf, Speetjens, Smit, De Wolff, & Tavecchio, 2008; Fujuwara, Kato, & Sanders, 2009; Heinrichs, Kliem, & Halweg, 2014; Prinz, Sanders, Shapiro, Whitaker, & Lutzker, 2009). Additionally, a 2014 meta-analysis of 116 Triple P studies conducted over 33 years yielded support for short-term effects for children’s behavioral, social, and emotional outcomes; parenting practices, satisfaction, efficacy, and adjustment; and relationships between parents (Sanders, Kirby, Tellegen & Day, 2014).

Previous research indicates that population-level adoption of Triple P is associated with decreased risk of child maltreatment (Prinz et al., 2009). Prinz and colleagues (2009) conducted a randomized evaluation of 18 counties in South Carolina to determine the impact of Triple P on three population-level indicators of child maltreatment: substantiated cases of child maltreatment, child out-of-home placements, and hospitalizations associated with injuries from child maltreatment. Matched counties were assigned to intervention (Triple P) or control

conditions (service as usual). The researchers found preventative effects for all three population-level indicators. Per Prinz and colleagues, “the trial should be viewed as the beginning of a line of population research in the prevention of [child maltreatment], from which we can expect to learn much over the next several years” (Prinz, et al., 2009).

Reaching population-level effects is an expensive endeavor. Training practitioners requires significant agency investment ranging from over \$18,000 to over \$32,000 per course to train 20 practitioners, yet sustained use of Triple P among practitioners is strikingly low. Per Shapiro and colleagues’ evaluation of barriers and facilitators to implementation (2012), discussed below, 58% of surveyed Triple P practitioners reported utilizing Triple P with 10 or fewer families in the preceding year. Understanding the factors that help and hinder utilization is critical to facilitating and sustaining widespread use of Triple P and other evidence-based interventions. There is limited research on factors that support the adoption of Triple P among practitioners. The current study was designed to address this gap in the literature and is grounded in implementation science, described below.

### **Implementation Science Research**

**Implementation process and evidence-based practice.** The field of implementation science is designed to evaluate the “to” in the translation from research to practice (Forman et al., 2013; Fixsen, Blasé, Duda, Naoom, & Van Dyke, 2010). Per Forman and colleagues, “Implementation refers to the process of putting a practice or program in place in the functioning of an organization . . . and can be viewed as the set of activities designed to accomplish this” (Forman et al., 2013, p. 78). Examination of the process of implementation guides the effective translation of research to practice (Lesley & Prelock, 2015). In short, while research on the efficacy of Triple P examines treatment outcomes, implementation-based evaluation of Triple P

examines the process of implementation, including organizational-level barriers and facilitators that guide practitioner's utilization of the intervention.

A drive towards the utilization of evidence-based practices in the field of child health and welfare has created new expectations for and increased scrutiny of clinical practice (McLennan, Wathen, MacMillan & Lavis, 2006). Thus, with increasing frequency, researchers have been evaluating how evidence-based practices supported by research in highly structured settings are implemented in real world settings. There are multiple implementation-based issues that have been defined as “research to practice gaps.” These include 1) the failure to implement an intervention that has been shown to yield positive impacts in a specific area, 2) implementing an intervention that has been shown to have harmful effects, 3) implementing an intervention that has been found to have no significant effect, and 4) implementing an intervention that lacks evaluation as to its effects (McLennan, Wathen, MacMillan & Lavis, 2006). The focus of the current study was on understanding factors associated with the failure to implement an intervention that has been shown to result in positive impacts.

Examining barriers and facilitators to adoption of evidence-based practices in real world settings is a critical step in bridging the gap between university research and practice in the community. Barriers to implementation have been defined as factors that impede or obstruct use of an intervention or practice (Reynders et al., 2016). Alternatively, a facilitator to implementation has been defined as any variable that “eases or promotes” use (Reynders et al., 2016). By examining barriers and facilitators to the implementation of evidence-based practices—including Triple P – new ways to improve and promote utilization of these practices can be considered. Implementation science research assists both practitioners and policymakers

in determining how these practices can be adopted and sustained in diverse settings (Forman et al., 2013).

Barriers and facilitators to implementation of evidence-based practices occur after a practice or intervention has been adopted within a particular setting or organization. The decision of whether to adopt a practice is often made by those with organizational control, while a successful implementation will be dependent on employee utilization (Klein & Sorra, 1996). Per Klein and Sorra (1996), whether or not an implementation fails will depend on the effort that employees put into the innovation, and the frequency and consistency of use of an innovation by employees. With this understanding, Klein and Sorra (1996) developed an integrative model of the determinants and consequences of implementation effectiveness, which recognizes the importance of an organization's climate (including obstacles and incentives) and practitioner-reported fit of the intervention to their personal values as factors driving implementation effectiveness. Understanding the role of the organization in adoption of parenting interventions and child maltreatment prevention programs is an important step in supporting adoption and sustainability of those interventions. Such was the purpose of this study.

**Understanding the role of the organization: Parenting interventions.** Evaluation of barriers and facilitators at the organizational level for practitioners implementing parenting interventions can serve to guide support for implementation, and is an emerging area of research. For example, interviews conducted with 17 child welfare workers trained to use SafeCare, a prevention program that targets parents at risk of perpetrating child neglect, suggested that organizational support at multiple levels was associated with implementation. Specifically, participants who were high users of SafeCare reported greater support from agency leadership and supervisors. Participants also discussed the importance of direct leader communication in

regards to the adoption of SafeCare; for example, participants noted that communication was useful when they were unsure of how to implement a specific component (Aarons & Palinkas, 2007). In 2009, Sanders, Prinz and Shapiro conducted an evaluation to predict practitioners' use of Triple P based on multiple variables, including organizational-level factors. Participants were practitioners in a population-level trial of Triple P. Information about barriers and facilitators to practitioners' use of Triple P was collected through use of structured telephone interviews with 611 practitioners accredited in Triple P. Sanders and colleagues found strong support for a need to prepare practitioners through adequate training and support from the organization when adopting Triple P. Participants reported a number of organizational barriers to the adoption of Triple P, including inadequate support, appointment time clashes, and lack of recognition in the workplace for work associated with Triple P (Sanders, Prinz, & Shapiro, 2009). The researchers described their analyses as exploratory due to the fact that there was minimal prior evidence related to predictors of practitioner use of Triple P, pointing to a continuing need for evaluation.

Three years later, Shapiro, Prinz and Sanders conducted a partial replication of their 2009 study (Shapiro, Prinz & Sanders, 2012) using 174 practitioners drawn from the same population of practitioners in the prior study. A notable difference was a focus on practitioners' sustained use of Triple P. Again, the researchers found support for the significance of organization-level supports in the post-training environment. A significant predictor of low practitioner use at the organizational level was lack of integration of Triple P work with practitioners' existing caseload or work responsibilities, which points to the importance of intervention fit within a particular organizational context. The researchers emphasized the importance of considering the systems-context of the environment (including both organizational characteristics and practitioner characteristics) when adopting an evidence-based parenting intervention such as Triple P, but



they urged further research, specifically related to supervision models within an organization (Shapiro, Prinz & Sanders, 2012). The researchers again described their analyses as exploratory, and their findings as preliminary. Shapiro and colleagues' initial study and the replication lay important groundwork for further investigation of organization-level factors associated with implementation of Triple P. The methodology utilized in both the 2009 and 2012 studies was limited in that the barriers included in the assessment were predetermined and evaluated through use of a structured telephone interview. Participants were asked to rate the extent to which each predetermined barrier served as an obstacle. Using less structured or guided responses might allow researchers to determine whether there are additional barriers and facilitators not previously assessed. Focus groups were used in the current study to determine whether there were factors that promoted or hindered use of Triple P that had not previously been considered.

### **The Current Study**

This study was designed to expand knowledge of what helps and hinders the use of Triple P among trained practitioners within the organizational context by utilizing a mixed-methods approach to understand the importance of organizational factors in predicting practitioner use. Determining these factors can guide organizational practice and structure to support Triple P practitioners in their work with families, with the ultimate goal of decreasing child maltreatment. This mixed-methods study was designed to examine practitioner-reported barriers and facilitators to implementation of Triple P in six implementation sites across North Carolina. Practitioner survey and focus group data were analyzed to obtain information related to practitioner use of Triple P, operationalized as (a) the number of caregivers that each practitioner reported serving to date and (b) their perceived fit of Triple P with their typical services to parents and families. This study was also designed to examine links between Triple P use and organizational factors,

including (a) frequency of staff meetings where Triple P was discussed and (b) overall agency support for use of Triple P. The researcher also explored whether or not length of accreditation and county/county cluster were correlated with the outcome variables such that they should be controlled for to account for differences in use based on time or location. Further, an exploratory analysis of focus group data was conducted to determine if novel explanatory categories of barriers and facilitators emerged. Explanatory categories are those that were not originally anticipated when the survey instrument was created, and which may not have been considered in prior studies based on forced-choice items in survey methodology. While surveys and focus groups can be utilized together to gather confirmatory information, utilizing focus group data to also explore potential explanatory categories can provide independent and complementary information that would be impossible to extract from survey methodology alone (Wolff, Knodel & Sittitrai, 1993).

Primary research questions and hypotheses are as follows:

- 1) Are (a) the degree of organizational support for use of Triple P, (b) the frequency of supervision or staff meetings where Triple P is discussed, and (c) the interaction between these variables significant predictors of practitioners' perceived fit of Triple P with their typical services offered to parents and families?
  - a. It is hypothesized that the degree of organizational support will significantly predict practitioners' perceived fit of Triple P with their typical services, with practitioners who report a higher degree of support also reporting better fit with typical services.
  - b. It is hypothesized that frequency of supervision or staff meetings where Triple P is discussed will significantly predict practitioners' perceived fit of Triple P with

their typical services, with practitioners who report a greater frequency of supervision or staff meetings where Triple P is discussed also reporting better fit with typical services.

- c. The investigation of a potential interaction effect between degree of organizational support and frequency of supervision or staff meetings where Triple P is discussed is exploratory, as there is insufficient basis to establish a hypothesis.
- 2) Are there significant main effects and/or a significant interaction effect between (a) the degree of organizational support and (b) the frequency of supervision or staff meetings where Triple P is discussed on the number of caregivers that practitioners served?
    - a. It is hypothesized that there will be a significant main effect for degree of organizational support, with practitioners who report a higher degree of organizational support also reporting a higher mean number of caregivers served.
    - b. It is hypothesized that there will be a significant main effect for frequency of supervision or staff meetings where Triple P is discussed, with practitioners who report a greater frequency of supervision or staff meetings where Triple P is discussed also reporting a higher mean number of caregivers served.
    - c. The investigation of a potential interaction effect between degree of organizational support and frequency of supervision or staff meetings where Triple P is discussed is exploratory.
  - 3) Are there additional explanatory categories that serve as facilitators or barriers to practitioner use of Triple P? That is, are there factors other than discussion of Triple P

at staff meetings and agency support that practitioners view as factors that impact their use of Triple P?

Focus group responses collected from Triple P practitioners and open-ended survey questions were analyzed to determine whether or not additional explanatory categories related to organizational barriers and facilitators were reported by Triple P practitioners, as well as to determine if focus group responses align with survey reports by exploring whether or not organizational support and frequency of staff meetings emerged as explanatory categories as well.

## **Method**

### **Participants**

Participants who completed the survey portion of the study included 297 Triple P practitioners working in one of six urban and suburban counties or county clusters in a southeastern state in the U.S. There were 16 counties adopting Triple P at the time of data collection, so the county response rate was 37.5%. In the six counties or county clusters that participated, there were a total of 586 providers, so the provider response rate for the survey was 50.6%. Participants for the focus groups included 43 Triple P practitioners across the six county clusters. All participating practitioners were accredited Triple P practitioners and represented diverse professions including social workers, educators, counselors, and physicians. Additionally, practitioners served families in a variety of settings such as schools, health departments, physician's offices, faith-based organizations, law enforcement agencies, hospitals, childcare facilities, departments of social services, early intervention agencies, mental health agencies, and family support organizations (Table 1). To maintain anonymity, no demographic data were obtained from focus group participants or survey participants.

## **Procedure**

Over four years, 16 counties or county clusters across the state of NC had been adopting Triple P at the population level. Counties with relatively small populations were “clustered” together for administrative purposes. Practitioners in local community agencies were trained and accredited by certified Triple P trainers to provide one or more levels of Triple P. Representatives from each county project and state-wide stakeholders met regularly as a Triple P Learning Collaborative to support adoption and sustainability of Triple P across the state. To gain perspective from practitioners on success of the adoption, a workgroup of the Triple P Learning Collaborative facilitated the collection of practitioner surveys and focus groups across six participating counties/county clusters in North Carolina. The workgroup was provided with contact information for Triple P practitioners in each county, and county Coordinators of the Triple P project contacted the practitioners in their area to inform them of the upcoming data collection. The workgroup then notified the practitioners via email about the opportunity to participate in the practitioner survey as well as focus groups to be held in their counties. Practitioners who elected to participate in the survey were provided with a link to complete an online Qualtrics survey. With the exception of one county whose Coordinator opted out, participants who completed the Qualtrics survey had the option to be entered into a random drawing for a small incentive. After the survey was closed, practitioners were invited via email to participate in a practitioner focus group. Those who wished to participate signed up for a group utilizing an online scheduling tool. A member of the NC Triple P Learning Collaborative Knowledge Management workgroup conducted the focus groups and each session lasted approximately 60 minutes, with incentives such as small door prizes being offered at completion. Each focus group was audio recorded and transcriptions were conducted by research assistants.

IRB approval was granted from the researcher's university for use of the extant survey data and focus group content.

### **Measure and Variables**

**NC Triple P Learning Collaborative: Practitioner Survey.** The North Carolina Triple P Learning Collaborative: Practitioner Survey contained items drawn from evaluations of Triple P adoption in Washington state (Kerns, Negrete, & McCormick, 2014) and New South Wales (Masters, Gaven, Pennington, & Askew, 2011). The online survey was utilized to obtain quantitative and qualitative data about practitioners' reported use of Triple P and each predictor variable. This survey included 19 questions, and participants took an average of 8 minutes to complete the survey.

**Number of caregivers served.** Practitioners were asked, "How many caregivers have you served with Triple P, to date?" They typed the number of caregivers in an open box.

**Perceived fit.** Practitioners were asked "How well does Triple P fit with your typical services to parents and families?". Response options were a) Not at all; there is no way I'll be able to use Triple P, b) It fits a little; I am beginning to see how it might fit with typical services, c) It fits reasonably well; I am able to incorporate Triple P into my typical services, d) It fits very well; I am likely to use Triple P with many families, and e) It is essential; I will definitely use Triple P with most families.

**Frequency of supervision or staff meetings where Triple P is discussed.** Practitioners were asked, "If your agency has regular supervision or staff meetings, is Triple P discussed in those sessions or meetings?". Response options included a) My agency does not have regular supervision or staff meetings, b) Yes we have meetings: Triple P is never discussed, c) Yes we

have meetings; Triple P is sometimes discussed, d) Yes we have meetings; Triple P is often discussed, and e) Yes we have meetings; Triple P is always discussed.

**Degree of agency support.** Practitioners were asked, “What level of support does your agency provide for using Triple P with your families?”. Response options were a) There is no support for using Triple P with my families, b) I feel a little support from the agency for using Triple P, c) There is a moderate level of support from my agency for using Triple P, and d) My agency full embraces Triple P and I receive a great deal of support.

**Length of accreditation.** To determine how long practitioners had been accredited at the time of data collection, practitioners were asked, “If you are accredited in Triple P, how long have you been accredited?”. Response options included a) 3 months or less, b) Less than 6 months, c) About 6 months, d) 6 to 12 months, e) About a year, f) More than a year, g) More than 2 years.

**Practitioner focus groups.** Guided focus group questions were structured as a means of obtaining practitioner input related to training, implementation (ex. “How well does Triple P fit with your role and daily work with parents and children?”), barriers to implementation (including agency barriers, personal barriers, logistic barriers, and community level barriers), opportunities for strengthening the model within the overall community, peer support and supervision, as well as more general, overall feedback related to the implementation of Triple P. Focus groups were facilitated by one of three members of the NC Triple P Learning Collaborative. Research assistants transcribed focus groups for subsequent coding, described below.

## Results

### Descriptions of Variables

Table 2 presents bivariate correlations, means, and standard deviations among the analytic variables of interest. An examination of variable means revealed an overall low frequency of supervision or staff meetings where Triple P was discussed ( $M = 1.78$ ,  $SD = 1.11$ , on a scale of 0 to 4), and a moderate degree of organizational support ( $M = 1.94$ ,  $SD = 1.00$ , on a scale of 0 to 3). Practitioners also reported low to moderate fit with typical services ( $M = 1.97$ ,  $SD = 1.01$ , on a scale of 0 to 4). Length of accreditation was recoded into an ordinal variable with the following categories: 0 = 3 months or less ( $n = 24$ , 8.1%); 1 = Less than 6 months ( $n = 6$ , 2%); 2 = About 6 months ( $n = 32$ , 10.8%); 3 = 6 to 12 months ( $n = 16$ , 5.4%); 4 = About a year ( $n = 58$ , 19.5%); 5 = More than a year ( $n = 151$ , 50.8%); 6 = More than 2 years ( $n = 8$ , 2.7%). Examination of skew and kurtosis values revealed that the Number of Caregivers Served variable was not normally distributed; thus, responses were recoded into four options: 0) None ( $n = 61$ , 21.9%); 1) One to five ( $n = 99$ , 35.5%); 2) Six to 10 ( $n = 50$ , 17.9%); and 3) More than 10 ( $n = 69$ , 24.7%).

Bivariate Spearman correlations were conducted among variables of interest (see Table 2). Length of accreditation was not significantly correlated with practitioners' perceived fit of Triple P with typical services ( $r = -.08$ ,  $p > 0.5$ ) but was correlated with number of caregivers served ( $r = .34$ ,  $p < .001$ ). Therefore, length of accreditation was controlled for in analysis of the second research question.

Due to the hierarchical nature of the data (i.e., practitioners nested within county), hierarchical linear modeling (HLM) was first considered as an analytic approach. For each dependent variable (i.e., fit with typical services and number of caregivers served), a fully



unconditional model with no predictors was estimated using SAS PROC MIXED in order to partition the total variance into within and between-county components, as well as to estimate the proportion of total variance in the variables that existed between counties. This proportion, known as the intraclass correlation coefficient (ICC), was used to determine the extent to which there was similarity within counties for each dependent variable, to assess the need to control for county in each analysis or to employ HLM. Results of the fully unconditional models revealed that only 2.9% of the variance in perceived fit with typical services was between counties, and only 0.5% of the variance in the number of caregivers served by practitioners was between counties. Therefore, practitioners' county was excluded from the present analysis as it was not otherwise a variable of interest.

### **Test of Hypotheses**

**Fit with typical services.** It was hypothesized that the degree of organizational support and frequency of supervision or staff meetings where Triple P was discussed would significantly predict practitioners' perceived fit of Triple P with their typical services. No hypothesis was stated regarding the potential effect of the interaction between the predictor variables due to insufficient evidence to support a hypothesis. A cumulative odds ordinal logistic regression was conducted in SPSS 22.0 to test the model. The three predictor variables in this regression were frequency of staff meetings or supervision where Triple P was discussed, and degree of organizational support and the interaction between those two variables (created by taking the product of values on these two variables). Due to the fact that ordinal predictors must be treated as continuous or categorical in an ordinal regression model, predictor variables were treated as continuous. The assumption of proportional odds was met, and was tested using a full likelihood ratio test comparing the fit of the proportional odds location model to a model with varying

location parameters,  $\chi^2(9) = 4.77, p = .854$ . Results of the Pearson goodness-of-fit test indicated that the model provided a good fit to the observed data,  $\chi^2(57) = 51.33, p = .687$ . Analysis of the ordinal logistic regression indicated that neither the frequency of staff meetings or supervision where Triple P was discussed, the degree of organizational support, nor the interaction between the two were statistically significant predictors of practitioners' perceived fit of Triple P with typical services (see Table 3).

**Number of caregivers served.** It was hypothesized that practitioners who reported a higher degree of organizational support, and a greater frequency of supervision or staff meetings where Triple P was discussed would also report a higher number of caregivers served. The investigation of a potential interaction effect between degree of organizational support and frequency of supervision or staff meetings where Triple P was discussed was proposed as exploratory. A multinomial logistic regression was conducted in SPSS 22.0 to test the hypotheses. A model in which the predictor variables were treated as continuous was compared to a model in which responses on the predictor variables were dummy coded using the Akaike information criterion (AIC), where smaller values indicate better fit (Akaike, 1974; Kingdom & Prins, 2016). Subsequently, frequency of supervision and perceived organizational support were entered as continuous predictors, followed by the interaction between supervision and organizational support. The highest level of the Caregivers Served variable (i.e., more than 10) served as the reference category. Length of accreditation was entered into the model as a control variable.

Results are presented in Table 4. The overall model was significant  $\chi^2(12) = 45.43, p < .05$ . Length of accreditation was a statistically significant predictor for each of the levels of caregivers served. Specifically, each one-unit increase in length of accreditation was associated

with a decrease in the odds of being in each respective level. Supervision or staff meetings where Triple P was discussed did not significantly increase or decrease the likelihood of membership in any level of the Caregivers Served variable, as compared to practitioners serving 10 or more. However, for each one-unit increase in organizational support, the odds of serving *no* caregivers, as compared to more than 10 caregivers, significantly decreased (OR = 0.25, 95% CI = 0.11 – 0.57,  $p = .001$ ). Additionally, the interaction between supervision and organizational support was statistically significant when comparing practitioners who reported serving no caregivers to those serving more than 10 (OR = 1.65, 95% CI = 1.07 – 2.55,  $p = .025$ ). Each one-unit increase in the interaction term increased the odds of belonging to the group of practitioners who had served no caregivers.

### **Thematic Analysis of Focus Group Data**

**Analytic process.** To begin the analytic process, the researcher read all focus group transcripts conducted in the six county clusters. Initial codes were generated and were refined throughout the analytic process as part of an ongoing discussion with the second coder who assisted in the project (see Appendix A). Statements were divided into single or multi-line statements, and ultimately 1,751 items were coded across 30 codes dispersed across six code families: Organizational Level, Practitioner Level, Client Level, Project or Program Level, Community Level, and Other. Prior to developing a consensus for final codes, inter-rater agreement was 78%. Disagreements were resolved through a discussion of each discrepancy before arriving at a final assigned code. Final codes were then assessed for emergent themes, and codes were analyzed across county to assess for similarities and differences based on location. Overall responses are presented first, followed by a discussion of emergent themes related to organizational barriers and facilitators.

*Overall focus group responses.* Table 5 presents a meta-matrix demonstrating the number of times a code was utilized within individual county clusters. Overall, the highest number of items across all counties (excluding items coded as facilitator comments or questions, and miscellaneous participant conversations – see note a in Table 5 for frequencies) were coded at the Practitioner Level (37.4%) and at the Project Level (29.24%), followed by the Client Level (17.35%), the Organizational Level (11.8%) and the Community Level (4.2%).

Notably, clusters coded at the organizational level were largely absent in County A. Only 5 clusters were coded at this level, all of which related to Knowledge of Triple P at the organizational level. Per a practitioner in County A,

*Practitioner: Why promote something if you don't know what it is?*

In contrast, the majority of clusters from the County A focus group were coded at the Project or Program Level, particularly as related to Triple P trainings and the structure of the intervention. Discussion of the role of community in the implementation of Triple P was absent in the County B focus group, however, a significant amount of conversation in the County B focus group involved practitioners sharing anecdotes about their own utilization of Triple P in regular practice. For example, a practitioner shared,

*Practitioner: And then I just thought, "Okay, what is common to every parent on my case load?" I identified those and began to choose the ones [tip sheets] I knew I could keep in my car all the time, and I actually created a notebook so I have them along with any supporting documentation I might need and I just go from there.*

Implementation of Triple P at the community level was an important point of discussion in County C, and was discussed with greater frequency than in any other county. In particular, practitioners spoke often about the role of interagency collaboration, and made reference to community meetings and "collaboratives." However, not all discussion of interagency

collaboration was positive, and one practitioner reported feeling as if Triple P was being “pushed” towards her agency from other organizations with trained practitioners.

*Practitioner: I know they have a case load there and they are swamped just like we are, but I kind of felt like we share all these clients because we've both been trained, but they didn't want any part of it. So I'm like, "This is not right."*

Practitioners in Counties D, E, and F devoted a large amount of discussion time to providing recommendations for improvement at the Project Level. Practitioners in County D spoke about both the importance of accessible technology (such as making resources available through YouTube) as well as the need for more media resources to share with their clients. For example,

*Practitioner: I would like more videos to share with families because when they leave they're going home with the tip sheets, but sometimes just a little clip to put back in the CD player just to get the vocabulary, the eye contact, the verbal use of what you're wanting them to do, just for them to watch again will say a lot.*

Practitioners in County E also spoke about the use of videos or technology, however, one practitioner described utilizing the existing videos as a “personal hesitancy” due to the lack of cultural diversity portrayed:

*Practitioner: Well and even for us it's a little bit of a ... the videos are kind of all, not very diverse. Yeah, diversity in the videos... if they could create another video. That's a hesitancy, a personal hesitancy.*

Accessibility of resources in an online format was also a point of discussion in County F.

Practitioners spoke about the need to easily gain access to Tip Sheets, and recommended that Tip Sheets be available to access in an online format, rather than having to leave their agency to obtain more.

Practitioners across counties also discussed the structure and content of the Triple P trainings, and provided recommendations for improvement of the training and accreditation process. Per a practitioner in County C:

*Practitioner: Part of the training should be for us to be able to maneuver through the website, because through training you only get the basic training and how to implement it. But then they don't give you how to implement it on the website and how to go through it and maneuver it. My first time I struggled trying to put the information in there and you know, I was like, "You gotta be kidding me!"*

Additionally multiple practitioners discussed the need for a "refresher" course after the initial accreditation. For example, a practitioner expressed the following:

*Practitioner: It just seems like you just get to the pinnacle and you're just free to go and it's like, "How do I do this again?" So maybe like a refresher or a reminder. Because you're so built up, you know that you have to go through this accreditation, and they're going to come and you've got to talk to people and say what's good, and you've got to pass and all that kind of stuff. And when you've never done it, you freak out. And people say, "Oh it's no big deal." Okay, sure it's no big deal, but I still have to do it myself. So I think after the wave of accreditation, if there was a time to just kind of, okay, now that you're done, let's talk about how we're going to let you go be a nurse, in the school system...*

A practitioner in County F reported that having a point of contact at the Project level served as an important resource when she felt as if she needed to clarify or ask questions related to Triple P:

*Practitioner: To me, it is continuing to have the contact here. Like [name] is assigned to me. And having her available to help me work out kinks is key. And she's very flexible too. Just having that resource to bounce things off and make sure I'm doing it right. Particularly, like Level 4, I haven't done that in a while and so I can call her and ask for a refresher.*

Despite perceived difficulties, however, several practitioners across counties reported feeling positive about the intervention or their personal experiences utilizing the interventions. A practitioner reported:

*Practitioner: Triple P put a name to it and actually gave us tools – the tip sheets and stuff – to actually provide information to our families and the strategies and*

*stuff kind of give them a guide to what they want to address and work on. It's a very helpful tool.*

**Theme 1: Organizational attributes.** Organizational attributes were defined as characteristics of the organization related to everyday functioning. These included organizational values, guidelines and expectations, and available resources (including time, physical space, and funding), and intensity of services typically provided. Practitioners from all six county clusters discussed experiences or factors related to organizational attributes.

***Organizational expectations.*** A change in expectations regarding the array of services provided emerged as a barrier in County A. Practitioners reported receiving instructions to implement multiple new programs and plans into their typical services. Additionally, there was agreement between practitioners that their organizations lacked a thorough understanding of Triple P. In another county, existing expectations for utilization of other interventions made it difficult for practitioners to navigate integrating Triple P into their typical services.

*Practitioner: With our agency, we have another model that we have to adhere to so it's working on that balance of, like Marcie said, embedding it into our sessions as well as having fidelity for that other model as well.*

Another practitioner reported:

*Practitioner: We are implementing another curriculum and we do groups, and we have limited time. So we're implementing a new curriculum, Parents as Teachers, so that supersedes...*

Other organizational expectations, such as the expectation to utilize a team-based approach to service delivery, also served to inhibit effective implementation. For example, one practitioner reported that working with a team of practitioners inhibited an effective client-practitioner relationship and impacted the parent's experience with Triple P:

*Practitioner: We see families a lot but we are a team of three and we are all trained. In my previous agency, I was the only one trained so there was some consistency but now that we are all three trained they want us all to rotate ... I*

*think it's different to have that parenting conversation when one week you're talking to somebody else and then... you know that's been difficult for me because as the therapist on the team I've always been the one on the parent side of things and my other two co-workers who are not therapists worked more with the children. And so I think the parents don't get the same program when it's three different people.*

**Physical space.** Physical space within the organizational setting emerged as a barrier in multiple counties. Practitioners reported a lack of defined space to deliver Triple P to childcare practitioners coming into their work setting. For example, in County B, one practitioner reported:

*Practitioner: For me it's having the space to do it. I have an office, a resource room, and child care center and the phone is ringing, people are coming in...one woman I had come in to do TP it took us so long to find a place to settle in and actually talk about TP that she actually ended up getting up and walking out before we could even start.*

Similarly, a practitioner in the County D reported a lack of available space to conduct Triple P discussion groups:

*Practitioner: And then for one, with us being the [agency], the clientele, the area, the location ... we don't have a nice meeting space or area so when we do ours, we have to do them after-hours so that we can meet in the lobby. I think those are the bigger problems.*

Similar physical space limitations were discussed in County E. For example, one practitioner's role in a primary healthcare setting yielded difficulties conducting Triple P sessions without intrusion.

*Practitioner: I would say a logistical barrier is being in an exam room where you're constantly being interrupted by doctors and nurses and the lab, so if someone wants to really open up and talk to you about their issues then you're constantly interrupted.*

Additionally, practitioners across multiple counties reported concern about delivering Triple P to parents in the presence of their children. In County D, a practitioner reported:

*Practitioner: ...when you want to talk with the families, their children are usually with them. Some things you don't want to share around listening ears. That is a*



*barrier that we would need to be able to find someone to watch the children while we have these conversations.*

These types of concerns generated conversations between participants regarding how they could collaborate between agencies to provide childcare for parents during Triple P Discussion Groups.

***Work setting and intensity of services.*** A practitioner's work setting and the intensity of services typically provided emerged as factors affecting utilization of Triple P. Practitioners across multiple counties reported that parenting concerns were secondary to more primary needs (such as food or clothing) or more severe behaviors than they thought Triple P was designed to address. A practitioner in County F described her agency's work as "triage," and reported that each case required an assessment of intensity, while a practitioner in County B described role in a crisis center as one that connected her to parents whose primary concern was acquiring clothing or food.

***Organizational support.*** For some practitioners, a lack of perceived organizational support emerged as a barrier across counties. For example, one reported feeling as if leadership within her organization was not invested in Triple P over the long term, as her organization failed to replace her as she approached retirement, thereby reducing the availability of Triple P for parents served by that organization.

*Practitioner: In my situation they knew I was going to retire and they didn't make sure anyone else got trained in Group [Triple P]. You can't make Level 3 into a group setting. That's why they had to develop another program. They couldn't do Triple P because no one else was trained. ... And so it was very ... I know people who were interested in taking my job but they didn't get the information about the training in Level 4.*

Other practitioners reported that organizational leadership was resistant to aspects of Triple P, such as the marketing materials. One practitioner reported that a supervisor disliked a sign that

she was using to advertise Triple P; the sign was part of official Triple P materials and showed a child crying, with an angry expression:

*Practitioner 1: She said it looked scary. And that whole thing. And she wouldn't let the counselor and I have it out in the office.*

**Facilitator: What does she mean by “scary?”**

*Practitioner 1: It's one of the girls screaming, crying. You know, she wanted a nice happy child there because Triple P's working.*

**Facilitator: Okay.**

*Practitioner 1: I tried to explain that it's the parent that has the child doing this that needs Triple P.*

*Practitioner 2: That's what parents will identify with is that face.*

*Practitioner 1: So it's stuck back in a room now.*

However, organizational support also emerged as a facilitator for many practitioners, and often came in the form of support from organizational staff and co-practitioners. For example, a practitioner in County C reported that case managers were available to follow-up for them regarding Triple P sessions with clients, while another reported that employees in her agency worked together to “pick up the slack” when another Triple P practitioner in the agency was burdened by a heavy caseload.

**Theme 2: Practitioner engagement.** Practitioner engagement refers to employee response to Triple P and their use of Triple P with caregivers, as well as motivation or incentive for utilization.

**Evidence-based intervention.** Multiple practitioners in County F reported a shift towards evidence-based practices in their fields. The evidence base behind Triple P was reported as a motivating factor for utilization.

*Practitioner: Well I just knew it was evidence based and I know the trend now in terms of supporting young children in the DD world as well as the mental health world is evidence based practices, so I wanted to be a part of anything that was researched based. So I just learned as I came along. As long as it was birth to five or birth to eight and supporting parents and how they support their children, I was just interested in that.*

**Enthusiasm and program competence.** Multiple practitioners reported a high level of excitement among practitioners immediately following Triple P training and accreditation, however, this excitement was quick to deteriorate if practitioners failed to or did not have the opportunity to implement the intervention. For example, a practitioner reported the following:

*Practitioner: I think if you can get that fire underneath you, that you quickly enjoy doing it, but if you don't let that fire and you lay dormant and you do nothing, then it's just like another thing to do. Like, "Oh God, here she comes. Telling me about doing Triple P." And I think people get that lackadaisical about it, and ... because they haven't applied it, aren't more intentional in using it, they just kind of lose the fizz for it.*

Practitioner's engagement and excitement for use of Triple P was also reportedly influenced by their perceived competence in the program. A practitioner described her colleagues:

*Practitioner: ...They weren't widely enthusiastic with it because they had just been so, you know, people that did seem enthusiastic to take it first ... they went to this class and came back like, "Man I can't do this..."*

Similarly, even when the content of the training and intervention were motivating, apprehension regarding practitioners' ability to implement the intervention emerged across multiple counties.

*Practitioner: It just seems like you just get to the pinnacle and you're just free to go and it's like, "How do I do this again?" So maybe like a refresher or a reminder. Because you're so built up, you know, that you have to go through this accreditation, and they're going to come and you've got to talk to people [quote shortened] ... and when you've never done it, you freak out.*

Practitioners across multiple counties suggested that some form or "refresher course" following the initial Triple P training would serve useful in encouraging practitioners to utilize the intervention.

**Workload.** A heavy workload also emerged as a barrier to Triple P implementation. For example, a practitioner in County B reported feeling “overwhelmed” by the idea of integrating Triple P into her practice, while a practitioner in County C described the addition of Triple P to her workload as “a bit much.” A County D practitioner described “time” as her primary limitation to implementation, and a practitioner in County A expressed that colleagues charged with implementing Triple P were tied down by a busy schedule and minimal financial incentive.

*Practitioner: A lot of them are making minimum wage and working long hours, and then you've got to do a parenting supplement on top of it. It's just a lot to ask. I don't know what that would look like.*

**Theme 3: System level collaboration.** System level collaboration refers to community adoption of Triple P and interagency collaboration (such as referral, collaboration of resources, etc.). System level collaboration emerged as both a barrier and facilitator to implementation of Triple P across county organizations.

**System level facilitators.** In terms of facilitating use of Triple P, a practitioner reported the “camaraderie” between practitioners in the area was a driver for utilization, and reported “lots of referral bases” within her county. Another reported that such camaraderie has helped not only with Triple P, but also with connections within the community. However, another practitioner voiced frustration over regulations related to the delivery of services across county lines.

*Practitioner: We're so county-mindful, so I think if you looked at Triple P as whole as providers instead of [individual counties ... [I] can't go out to help those in [one] county because I only serve [other counties]. We have those boundaries of the counties. I think that's irrelevant because it's about the people not the counties. I think those lines that go around those counties really stop who we are and what we are, and stops [caregivers] from getting what they need.*

In some counties, agency collaboration led to expansion and support, and emerged as a facilitator to implementation.

*Practitioner: My agency has gotten together with two to three other agencies to look at ways to come up with more training. We all want to get the Teen training. We started the conversation in September.*

**System level barriers.** Practitioners in several counties reported lack of community understanding and appropriate utilization and referral of caregivers across organizations as a barrier to implementation with their communities. In two counties, inappropriate referrals to Triple P practitioners yielded a mismatch of client need with available resources. To illustrate, a practitioner recounted an experience where a parent referred to her through the court system was sanctioned for not completing a parenting class even though the practitioner had attempted to communicate to the court that Triple P was not the appropriate fit for that particular parent.

*Practitioner: The parent still didn't get what she needed. And so this parent almost went three or four months without getting the services that she needed and when she had to go back to court, she got sanctioned for that. If it was not for me going into court saying, "Well this is no fault of her own."*

Similarly, another practitioner voiced frustration that family treatment plans were being implemented and "signed off on" by community agencies without regard to whether or not Triple P was an appropriate fit for the parent being referred.

*Practitioner: The social worker emailed me and wanted me to send the email to the judge about how this parent had gone to Triple P to get her kids back, and that parent talked to me about chores for about 10 minutes. And I didn't [email the judge], but say I did do it ... you've got a judge who is going to give her kids back because they completed Triple P and that judge don't understand. But it's just social workers are okay with it. This social worker wants you to sign off that this parent went through Triple P so she can get her child back, but she never went through it, don't know nothing about it.*

Multiple practitioners in one county expressed concern that they were expected to "check a box" or complete a "certificate" without regard not only to the parent's needs and situation, but also without regard to the wellbeing of the child.

In addition to inappropriate utilization of Triple P, practitioners reported that the novelty of Triple P was a barrier to implementation within their agencies and broader communities. For example, a practitioner stated,

*Practitioner: I think a barrier is the newness of Triple P, even though we've had it in this county for a while, I just think that by the time you saturate the community and you are sick of it, the community is just now understanding what it is. You know? Because it's new, because it's a different concept, because it came from a different country, people are like, "What is it?"*

### **Discussion**

The current study was designed to expand knowledge of population-level implementation of the Triple P Positive Parenting Program. In particular, the aim of the study was to explore practitioners' perceptions of factors that served as organizational barriers and facilitators to implementation of Triple P. Previous research suggested that sustained utilization of Triple P was limited among trained practitioners (Shapiro et al., 2012), and prior evaluation of Triple P at the population level indicated that there were a number of reported organizational barriers to implementation (Sanders, Prinz, & Shapiro, 2009). The present study expands that previous research by utilizing a mixed-methods approach with a rich qualitative dataset from practitioners across diverse implementation sites. Although focused primarily on organizational barriers and facilitators, we also used available quantitative data to examine factors at the individual practitioner and community levels that served to support or hinder use of Triple P.

Understanding the role of agency support and clinical supervision is an important step in determining the types of organization-level supports that facilitate the use of evidence-based practices in real world settings. In particular, the present study assessed how these factors related to providers' perceived ability to integrate or "fit" Triple P in with the typical services that they provided to caregivers. Analysis of quantitative data suggested that, inconsistent with study

hypotheses, neither the frequency of supervision or staff meetings where Triple P was discussed, the perceived degree of organizational support for utilization of Triple P, nor the interaction between these variables predicted practitioners' perceived fit of Triple P with typical services. Examination of these findings in light of focus group responses suggests that while a limited number of practitioners reported that their sole role was implementation of Triple P, the majority of practitioners were expected to integrate Triple P into an existing workload. Additionally, on average, organizational support and frequency of supervision of staff meetings where Triple P was discussed was low among practitioners. Therefore, it's difficult to know whether frequent supervision or a high degree organizational support could serve to address difficulties such as a perceived insufficiency of training, or difficulty delivering the intervention to certain populations.

The present study also considered the predictive value of organizational support and supervision in terms of the number of caregivers that a practitioner reported serving, while controlling for length of accreditation. As expected, both the length of time a practitioner was accredited in Triple P and the degree of organizational support for utilization were significant individual predictors of the number of caregivers served using Triple P. An unexpected finding was that a simultaneous increase in both of these factors actually increased the likelihood of a practitioner reporting that they had served no caregivers using Triple P. As previously discussed, the average degree of organizational support and frequency of supervision where Triple P was discussed were not very high among participants. Even so, nearly twice as many respondents reported the lowest frequency of supervision or staff meetings (none) as compared to the lowest degree of organizational support for use of Triple P (no support), therefore it is possible that the interaction between these two variables suppressed the beneficial effects of organizational

support, as some practitioners reporting receipt of organizational support also reported receiving no supervision. Per Bearman and colleagues, although use of regular supervision and support may be emphasized in clinical trials of an intervention, actual frequency and function of supervision (such as completing administrative tasks versus engaging in active learning strategies) varies in real world settings (Bearman et al., 2013).

Although previous research suggested limited sustained utilization of Triple P (Shapiro et al., 2012), the present study yielded the promising finding that practitioners' length of accreditation significantly predicted the number of caregivers served at all levels. Practitioners in focus groups reported that although initial uptake could be slow, sustained utilization came from learning how to embed Triple P into day-to-day practice. Per Shapiro and colleagues (2015), practitioners who reported utilizing Triple P long after their initial accreditation reported the ability to use it across different settings and with diverse and high-need populations (such as parents with cognitive delays or teenage parents).

Examination of focus group data proved a valuable supplement to the quantitative data. The emergence of organizational support as theme from the data, with mixed responses from practitioners, aligns with survey responses indicating that among practitioners, organizational support is neither striking high nor strikingly low. Focus group participants assisted in defining what organizational support looks like in real world settings. For example, for one practitioner a lack of organizational support for Triple P was perceived when management removed Triple P advertisements, while another practitioner was facilitated in her delivery of Triple P by the availability of office support staff. Additionally, themes beyond organizational support including practitioner engagement and system-level collaboration between multiple organizations emerged to supplement findings from the practitioner survey. However, overall discussion of factors



related to the organizational setting was limited among Triple P practitioners. An ecological approach to the analysis necessitated inclusion of codes closely related to the organizational level, such as practitioners' reported fit of Triple P with their jobs, the extent of their workloads, and community level collaboration and utilization. Attributes of the organization, including factors such as organizational support, organizational culture, and organizational resources emerged as a theme from the data. Notably, limited resources (including physical space for delivery of services and availability of funding for materials) was a consistent point of conversation. Per Weiner (2009), the term "organizational readiness" refers to "a shared psychological state in which organizational members feel committed to implementing an organizational change and confident in their collective abilities to do so." (p.1). Obstructions to implementation such as a lack of physical space or limited funding for materials stood in stark opposition to organizational readiness, and suggested a need to ensure that an organization is prepared to adopt a new practice prior to investing practitioner time or financial capital in training. Scaccia and colleagues (2015) offer a heuristic (coined " $R = MC^2$ ") based in implementation science to measure organizational readiness that includes examination of three components: 1) motivation, 2) general capacity, and 3) innovation specific capacity. Per the authors, motivation relates to the desirability of adopting an intervention, including any incentives or disincentives. General capacity refers to attributes both inside and surrounding the organization (such as staffing, infrastructure, and community connections), while innovation specific capacity refers to factors such as the knowledge and skills requisite for implementation. Each of these factors arose in focus group discussion and suggested that many practitioners were functioning within organizations not yet "ready" for adoption of a new intervention.

Practitioner engagement in Triple P also emerged as a theme from the focus group data. Practitioners discussed topics such as their enthusiasm for Triple P as well as how confident they felt delivering Triple P to caregivers. A prior evaluation of Triple P conducted by Shapiro, Prinz, and Sanders (2015) suggested that provider self-efficacy was an important influence on sustained implementation. In the present study, conversations regarding program competence and enthusiasm were supplemented by discussions of barriers and facilitators at the program level, such as the complexity of Triple P training. Additionally, practitioners across counties reported numerous recommendations for improvement at the program level. In particular, there was a focus on the need for a “refresher course” following accreditation and the need for supplemental training on utilization of the website. Practitioners also urged the importance of making the Triple P website more “user-friendly.” Easy accessibility to program resources such as Tip Sheets and videos was also encouraged, and was supported by practitioner discussion of heavy workloads necessitating ease of use and access.

Lastly, discussions of system-level collaboration suggested that while practitioners valued the opportunity to work closely with other trained practitioners, they were sometimes frustrated by inappropriate referrals, such as referrals of caregivers from uninformed staff in the court system. While parent-training programs can be an important tool in the child welfare system (Barth, 2009), it is important to consider the fit of an intervention with the organization’s population (Highfield et al., 2015). Thus, a program that utilizes behavior monitoring and modification techniques as part of positive parenting training (as Triple P does) might not be an appropriate fit for a parent whose child is not living in the home. Failure to assess fit might lead to an inappropriate certification that the parent completed an appropriate training course—a concern voiced by multiple practitioners.

**Limitations.** Although the present study contributed to and expanded upon prior research regarding population-level implementation of Triple P, there are caveats to interpretation that should be considered. Most notably, the qualitative data analysis was exploratory in nature and was designed to determine whether or not organizational barriers and facilitators beyond support and supervision emerged in open discussions among practitioners. This exploration would benefit from further refinement and assessment as part of the analytic process, such as the inclusion of codes specific to organizational readiness. Additionally, the focus group questions were broad in scope; a more focused and robust discussion of factors specific to the organization would have facilitated a more thorough description of practitioner-reported barriers and facilitators at the organizational level. As previously stated, the majority of discussion was related to factors outside of the organization. It is also recognized that interpretation of qualitative data can be heavily influenced by a researcher's individual skillset as well as their personal biases (Anderson, 2010). The present analysis served as both a research and learning experience in qualitative data analysis. While issues of reliability were addressed through utilization of a second coder, early stages of research preparation would likely have benefitted from a team-based approach. This is especially true in terms of shifting raw data into items to be coded.

In addition to limitations related to qualitative analysis, all quantitative measures were based on a single measure on the North Carolina Triple P Learning Collaborative: Practitioner Survey. Variables such as organizational support should be viewed as multi-level factors that could include constructs such as climate, or rewards for evidence-based practice or innovation (Chaudoir, Dugan & Barr, 2013). French and colleagues (2009) conducted a meta-analysis identifying 30 measures that target factors specifically within the organizational context. A more

targeted measure would have assisted in more accurately pinpointing barriers and facilitators at the organizational level.

Lastly, generalizability of findings may be limited to states or regions where Triple P is grant funded. As previously stated, Triple P training is a significant financial investment, and many practitioners in the present study received training through grant-based scholarship funding. In areas where agencies are independently responsible for the cost of training as well as for materials, utilization and support may be reported differently.

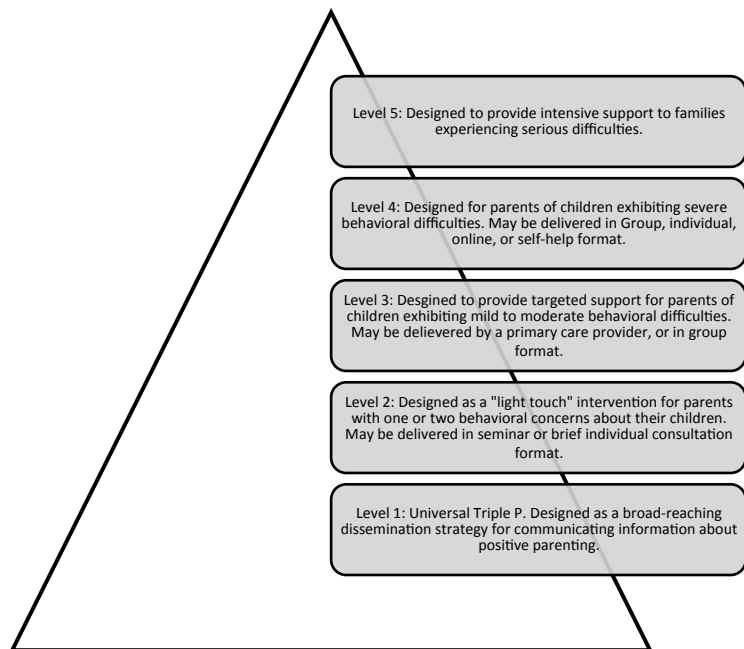
Next, this study focused on practitioners' views in the context of a relatively new adoption of Triple P. At the time of data collection, most providers (97.3%) had been trained for less than two years. It is certainly possible that barriers would differ over the course of a rollout of evidence-based programs. Follow-up studies of these practitioners will be necessary to determine whether barriers and facilitators differ for prolonged and sustained utilization of Triple P in comparison to the factors identified for this fairly new adoption.

**Future directions.** Practitioners engaged in rich discussion regarding implementation of Triple P at the population level. Future research related to organizational barriers and facilitators should focus on the relation between “organizational readiness” and implementation outcomes (Weiner, 2009), as factors such as financial resources, appropriate allocation of space, and employee buy-in arose in practitioner focus groups. Application of Scaccia and colleagues' organizational readiness heuristic ( $R = MC^2$ ) to implementation of Triple P in this state could provide meaningful information regarding practical barriers to implementation such as infrastructure and sufficiency of financial resources. Additionally, use of the heuristic could assist in addressing questions related to employee motivation to adopt something new, as well as organizational culture.

While present research questions focused largely on organizational factors, qualitative practitioner responses suggested that barriers and facilitators to implementation spread far beyond the organizational level. Though other relevant factors were outside the scope of the present study, ripe for consideration in future investigations include project, client, or practitioner-level factors. Additionally, because practitioners indicated that many referrals that came to them from outside of the organization were not an appropriate fit for the Triple P intervention, research should also focus on the utilization of Triple P in specific communities and contexts. In particular, there are important questions to be explored regarding the utilization of Triple P in the child welfare system (such as when a judge refers a parent to a Triple P provider when the parent does not have custody of his or her child). These questions are driven by the policy implications of mismatching an intervention to a parent in a high needs situation.

**Recommendations.** Outcomes of the present study yield a number of clinical suggestions regarding ways to support the implementation of Triple P in state-level adoptions. Notably, while practitioners were eager and excited about adding evidence-based interventions to their tool-belts, many practitioners found pressure in integrating Triple P with their existing services. Therefore, consideration of practitioner workloads and the organization's readiness for adopting a new intervention should be considered before tasking a practitioner with implementing something new. Organization leaders and practitioners should engage in open discussion regarding how adoption of Triple P will proceed within the context of their specific organization, and ask questions such as, "How does Triple P align with services or interventions that we are currently offering?," "How will practitioners measure and support their own competencies in delivering Triple P?" and "How will practitioners allocate their time when integrating Triple P with our typical services?" While many practitioners expressed a desire to attend countywide

peer support groups, their time was limited, and many were left with lingering questions following training that could be addressed at a peer support meeting. Time should be appropriately allocated to ensure that practitioners are able to openly address concerns and problem-solve implementation related issues in order to further support adoption and fidelity to the intervention.



**Figure 1.** Levels of Triple P (Sanders, 1999; Triple P, n.d.).

**Table 1.** Frequencies of Demographic Variables.

	N	Percent
County	297	100
<i>County A</i>	44	14.8
<i>County B</i>	73	24.6
<i>County C</i>	18	6.1
<i>County D</i>	21	7.1
<i>County E</i>	79	26.6
<i>County F</i>	62	20.9



**Table 1** (continued).

Primary Discipline	297	100
<i>Child Care / Preschool Worker</i>	9	3.0
<i>Child Development Specialist</i>	1	0.3
<i>Clergy/Faith Based Leader</i>	2	0.7
<i>Counselor/Psychologist/Mental Health Practitioner</i>	69	23.2
<i>Developmental Therapist</i>	8	2.7
<i>Law Enforcement Officer</i>	1	0.3
<i>Nurse/Medical Staff Clinical Support</i>	12	4.0
<i>OT/PT/Speech Therapist</i>	6	2.0
<i>Parent / Family Life Educator</i>	10	3.4
<i>Physician/Health Care Practitioner</i>	3	1.0
<i>Program Administrator / Coordinator</i>	30	10.1
<i>Public Health Educator / Community Outreach Worker / Care Manager</i>	20	6.7
<i>School</i>	1	0.3
<i>Social Worker</i>	89	30.0
<i>Teacher Aid</i>	15	5.1
<i>WIC Worker/Nutritionist</i>	1	.3
<i>Other</i>	18	6.1

**Table 2.** Descriptive Statistics and Bivariate Correlations.

	<i>M</i>	<i>SD</i>	Range	1	2	3	4	5
1. Supervision for Triple P	1.78	1.11	0-4		.52*	.16*	-.39	.04
2. Organizational Support	1.94	1.00	0-3	.52*		.30*	.02	.15*
3. Fit with Typical Services	1.97	1.01	0-4	.16*	.30*		-.08	.20*
4. Length of Accreditation	3.91	1.61	0-6	-.04	.02	-.08		.34*
5. Number of Caregivers Served	1.45	1.09	0-3	.04	.15*	.20*	.34*	.

\* Correlation is significant at the 0.05 level

**Table 3.** Ordinal Logistic Regression Parameter Estimates for Fit with Typical Services.

	<i>B</i>	SE	Wald $X^2$	df	<i>p</i>	Odds-Ratio
Supervision	-0.47	0.30	2.37	1	.124	.626
Organizational Support	0.25	0.23	1.26	1	.262	1.29
Interaction	0.21	0.12	2.87	1	.090	1.23

Pearson goodness-of-fit:  $\chi^2(57) = 51.33, p = .687$

**Table 4.** Multinomial Logistic Regression Parameter Estimates for Number of Caregivers Served<sup>a</sup>.

	<i>B</i>	SE	<i>p</i>	Odds-Ratio	95% CI
<i>No Caregivers Served</i>					
Supervision	-0.98	0.54	.065	0.37	0.13 – 1.07
Organizational Support	-1.41	0.43	.001*	0.25	0.11 – 0.57
Interaction	0.50	0.22	.025*	1.65	1.07 – 2.55
Length of Accreditation	-0.76	0.17	.000*	0.47	0.36 – 0.65
<i>One to Five Caregivers Served</i>					
Supervision	-0.29	0.50	.570	0.75	0.28 – 2.01
Organizational Support	-0.49	0.38	.191	0.61	0.29 – 1.28
Interaction	0.16	0.20	.427	1.17	0.79 – 1.74
Length of Accreditation	-0.55	0.16	.001*	0.58	0.42 – 0.80
<i>Six to Ten Caregivers Served</i>					
Supervision	-0.03	0.56	.959	0.97	0.32 – 2.93
Organizational Support	-0.28	0.43	.519	0.76	0.33 – 1.75
Interaction	-0.03	0.23	.885	0.97	0.61 – 1.53
Length of Accreditation	-0.42	0.18	.021*	0.66	0.46 – 0.94

<sup>a</sup>The group More than 10 Caregivers Served is utilized as the reference group.

\* Significant at the 0.05 level.

Overall Model Fit:  $\chi^2(12) = 45.43, p < .05$

**Table 5.** Code frequencies across counties<sup>a</sup>.

	County A	County B	County C	County D	County E	County F
<b>Organizational Level</b>						
Organizational Culture	0	5	0	4	18	18
Organizational Support	0	5	1	7	23	14
Knowledge of Progress	5	1	2	0	1	2
Type of Organization	0	0	0	0	7	2
Organizational Resources	0	2	7	4	4	7
<b>Practitioner Level</b>						
Personal Beliefs	0	3	0	4	2	4
Personal Preferences	2	2	0	1	3	0
Competence in Triple P	1	7	1	9	16	19
Personal Opinion	12	11	5	3	23	33
Fit With Job	0	6	1	2	7	12
Workload	2	7	3	3	10	7
Motivation or Incentive	1	3	0	0	14	16
Practitioner Utilization	2	23	1	4	22	68
Introduction to Triple P	3	10	7	3	12	9
<b>Client Level</b>						
Client Culture	0	0	3	0	11	3
Population Fit	6	10	2	3	19	19
Client Engagement	6	7	12	11	0	21
Client Experience	0	1	4	2	20	34
<b>Project or Program Level</b>						
Project Recruitment	6	0	3	0	1	0
Advertising	6	1	0	5	19	3
Program Resources	8	0	2	1	0	0
Training	16	4	4	2	8	2
Structure of Program	0	1	6	3	3	22
Peer Support	2	13	3	8	11	16
Financial	4	0	1	0	0	2
Recommendation of Improvement	9	15	5	18	60	25
<b>Community</b>						
Community Utilization	9	0	3	2	5	0
Interagency Collaboration	4	0	12	1	6	5

a. Facilitator comment or questions account for 16% of coded items, and miscellaneous participant conversations account for 17.8% of coded items.

## REFERENCES

- Aarons, G. A., & Palinkas, L. A. (2007). Implementation of evidence-based practice in child welfare: Service provider perspectives. *Administration and Policy in Mental Health and Mental Health Services Research, 34*, 411–419. doi:10.1007/s10488-007-0121-3
- Akaike, H. (1974). A new look at the statistical model identification. *IEEE Transactions on Automatic Control, 19*. doi:10.1109/TAC.1974.1100705
- Anderson, C. (2010). Presenting and evaluating qualitative research. *American Journal of Pharmaceutical Education, 74*(8) 141. doi: 10.5688/aj7408141
- APA Presidential Task Force on Evidence-Based Practice. (2006). Evidence-based practice in psychology. *American Psychologist, May-June*, 271–285. doi: 0.1037/0003-066X.61.4.271
- Bearman, S.K., Weisz, J.R., Chorpita, B.F., Hoagwood, K., Ward, A., Ugueto, A. M., & Berstein, A. (2013). More practice, less preach? The role of supervision processes and therapist characteristics in EBP implementation. *Administration and Policy in Mental Health and Mental Health Services, 40*, 518-529, doi: 10.1007/s10488-013-0485-5
- Bertram, R. M., Blase, K. A., & Fixsen, D. L. (2015). Improving programs and outcomes: Implementation frameworks and organization change. *Research on Social Work Practice, 25*, 477-487. doi: 10.1177/1049731514537687
- Bodenmann, G., Cina, A., Ledermann, T., & Sanders, M. R. (2008). The efficacy of the Triple P-Positive Parenting Program in improving parenting and child behavior: A comparison with two other treatment conditions. *Behaviour Research and Therapy, 46*, 411-427. doi: 10.1016/j.brat.2008.01.001
- Birks, M., & Mills, J. (2015). *Grounded Theory: A Practical Guide (2nd ed.)*. London: SAGE.

- Braun, V., & Clarke, V. (2006). Using thematic analysis in psychology. *Qualitative Research in Psychology, 3*, 77–101. doi: 10.1191/1478088706qp063oa
- Carr, A. (2014). The evidence base for family therapy and systemic interventions for child-focused problems. *Journal of Family Therapy, 36*, 107-157. doi: 10.1111/1467-6427.12032
- Charmaz, K. (2014). *Constructing grounded theory: A practical guide through qualitative analysis*. London: SAGE.
- Chaudoir, S. R., Dugan, A. G., & Barr, C. H. (2013). Measuring factors affecting implementation of health innovations: a systematic review of structural, organizational, provider, patient, and innovation level measures. *Implementation Science, 8*, 1–20. doi:10.1186/1748-5908-8-22
- Centers for Disease Control and Prevention. (2016, April 5). *Child abuse and neglect: Risk and protective factors*. Retrieved from <http://www.cdc.gov/violenceprevention/childmaltreatment/riskprotectivefactors.html>
- Child Welfare Information Gateway. (2013). Long-term consequences of child abuse and neglect. *Factsheet, July*, 1–10. Retrieved from [https://www.childwelfare.gov/pubpdfs/long\\_term\\_consequences.pdf](https://www.childwelfare.gov/pubpdfs/long_term_consequences.pdf)
- De Graaf, I., Speetjens, P., Smit, F., De Wolff, M., & Tavecchio, L. (2008). Effectiveness of the Triple P Positive Parenting Program on parenting: A meta-analysis. *Family Relations, 57*, 553-566. doi: 10.1111/j.1741-3729.2008.00522.x
- Fantuzzo, J. W., Perlman, S. M., & Dobbins, E. K. (2011). Types and timing of child maltreatment and early school success: A population-based investigation. *Child and Youth Services Review, 33*, 1404-1411. doi: 10.1016/j.childyouth.2011.04.010

- Forman, S., Shapiro, E.S., Coddling, R.S., Gonzales, J.E., Reddy, L.A., Rosenfield, S.A....Stoiber, K.C. (2013). Implementation science and school psychology. *School Psychology Quarterly*, 28, 77-100. doi: 10.1037/spq0000019
- French, B., Thomas, L. H., Baker, P., Burton, C. R., Pennington, L., & Roddam, H. (2009). What can management theories offer evidence-based practice? A comparative analysis of measurement tools for organisational context. *Implementation Science*, 4, 1–15. doi:10.1186/1748-5908-4-28
- Fujiwara, T., Kato, N., & Sanders, M. R. (2009). Effectiveness of group Positive Parenting Program (Triple P) in changing child behavior, parenting style, and parental adjustment: An intervention study in Japan. *Journal of Child and Family Studies*, 10, 1-12. doi: 10.1007/s10826-011-9448-1
- Furlong, M., & McGilloway, S. (2015). Barriers and facilitators to implementing evidence-based parenting programs in disadvantaged settings: A qualitative study. *Journal of Child and Family Studies*, 24, 1809-1818. doi: 10.1007/s10826-014-9984-6
- Glaser, B. G. & Strauss, A. L. (1967). *The discovery of grounded theory*. Chicago, IL: Aldine.
- Heinrichs, N., Kliem, S., & Hahlweg, K. (2014). Four-year follow-up of a randomized controlled trial of triple p group for parent and child outcomes. *Prevention Science*, 15, 233-245. doi: 10.1007/s11121-012-0358-2
- Institute of Medicine. (2001). *Crossing the quality chasm: A new health system for the 21st century*. Washington, DC: National Academies Press.
- Kerns, S. Negrete, A., & McCormick, E. (2014). *Division of Behavioral Health and Recovery Triple P initiative*. Unpublished evaluation report available from the first author at the University of Washington, Seattle.



- Kingdom, F. A., & Prins, N. (2016). Chapter 9 - Model Comparisons. In F. Kingdom & N. Prins (Eds.), *Psychophysics: A practical introduction, 2nd Ed.* (pp. 247–307). London, UK: Academic Press. doi:10.1016/B978-0-12-407156-8.00009-8
- Klein, K. J., & Sorra, J. S. (1996). The challenge of innovation implementation. *The Academy of Management Review, 21*, 1055–1080. doi: 10.2307/259164
- Masters, G., Gaven, S., Pennington, A., & Askew, L. (2011). *Evaluation of the implementation of Triple P in NSW*. Sydney: Nexus Management Consulting. Retrieved from [www.nexus.com.au](http://www.nexus.com.au)
- McLennan, J. D., Wathen, C. N., MacMillan, H. L., & Lavis, J. N. (2006). Research-practice gaps in child mental health. *Journal of the American Academy of Child & Adolescent Psychiatry, 45*, 658–665. doi: 10.1097/01.chi.0000215153.99517.80
- Miles, M. B., & Huberman, A. M. (1994). *Qualitative data analysis: An expanded sourcebook*. London: SAGE.
- Olswang, L. B., & Prelock, P. A. (2015). Bridging the gap between research and practice: Implementation science. *Journal of Speech Language and Hearing Research, 58*, S1818–S1826. doi: 10.1044/2015\_JSLHR-L-14-0305
- Prinz, R. J., Sanders, M. R., Shapiro, C. J., Whitaker, D. J., & Lutzker, J. R. (2009). Population-based prevention of child maltreatment: The U.S. Triple P system population trial. *Prevention Science, 10*, 1-12. doi: 10.1007/s11121-009-0123-3
- Reynders, R. M., Ronchi, L., Ladu, L., Di Girolamo, N., de Lange, J., Roberts, N., & Mickan, S. (2016). Barriers and facilitators to the implementation of orthodontic mini-implants in clinical practice: a protocol for a systematic review and meta-analysis. *Systematic Reviews, 5*, 1–14. doi: 10.1186/s13643-016-0198-4

- Sanders, M. R. (1999). Triple P-Positive Parenting Program: towards an empirically validated multilevel parenting and family support strategy for the prevention of behavior and emotional problems in children. *Clinical Child and Family Psychology Review*, 2, 71–90. doi: 10.1023/A:1021843613840
- Saldaña, J. (2016). *The coding manual for qualitative researchers*. London: SAGE.
- Sanders, M.R. (2008). Triple P-Positive Parenting Program as a public health approach to strengthening parenting. *Journal of Family Psychology*, 22, 506-517. doi: 10.1037/0893-3200.22.3.506
- Sanders, M.R., Kirby, J.N., Tellegen, C.L., & Day, J.J. (2014). The Triple P-Positive Parenting Program: A systematic review and meta-analysis of a multi-level system of parenting support. *Clinical Psychology Review*, 34, 337-357. doi: 10.1016/j.cpr.2014.04.003
- Sanders, M. R., Prinz, R. J., & Shapiro, C. J. (2009). Predicting utilization of evidence-based parenting interventions with organizational, service-provider, and client variables. *Administration and Policy In Mental Health*, 36, 133–143. doi: 10.1007/s10488-009-0205-3
- Scaccia, J. P., Cook, B.S., Lamont, A., Wandersman, A., Castellow, Katz, J., & Beidas, R. S. (2015). A practical implementation science heuristic for organizational readiness: R = MC<sup>2</sup>. *Journal of Community Psychology*, 43, 484-501, doi: 10.1002/jcop.21698
- Shapiro, C. J., Prinz, R. J., & Sanders, M. R. (2012). Facilitators and barriers to implementation of an evidence-based parenting intervention to prevent child maltreatment: the Triple P-Positive Parenting Program. *Child Maltreatment*, 17, 86–95. doi:10.1177/1077559511424774

- Shapiro, C. J., Prinz, R. J. & Sanders, M.R. (2015), Sustaining use of an evidence-based parenting intervention: Practitioner perspectives. *Journal of Child and Family Studies*, 24, 1615-1624. doi:10.1007/s10826-014-9965-9
- Strauss, A. L. and Corbin, J. M. (1990). *Basics of Qualitative Research: Grounded Theory Procedures and Techniques*. Newbury Park, CA: SAGE.
- Triple P America. (n.d.). *The system explained*. Retrieved from <http://www.triplep.net/global/the-triple-p-system-at-work/the-system-explained/>
- Valdez, C., Carlson, C., & Zanger, D. (2005). Evidence-based parent training and family interventions for school behavior change. *School Psychology Quarterly*, 20, 403-433. doi: 10.1521/scpq.2005.20.4.403
- Weiner, B. J. (2009). A theory of organizational readiness for change. *Implementation Science*, 4, 67. doi:10.1186/1748-5908-4-67
- Wolff, B., Knodel, J., & Sittitrai, W. (1993). Focus groups and surveys and complementary research methods: A case example. In *Successful focus Groups: Advancing the State of the Art* (pp. 119–136). California: SAGE Publications.
- World Health Organization. (2009). Preventing violence through the development of safe, stable and nurturing relationships between children and their parents and caregivers. *Series of Briefings on Violence Prevention: The Evidence*, 1–18. Retrieved from [http://apps.who.int/iris/bitstream/10665/44088/1/9789241597821\\_eng.pdf](http://apps.who.int/iris/bitstream/10665/44088/1/9789241597821_eng.pdf)
- World Health Organization. (2016, September). *Child maltreatment: Fact sheet*. Retrieved from <http://www.who.int/mediacentre/factsheets/fs150/en/>

**APPENDICES**

## Appendix A

### Codes and Code Definitions

<b>Code</b>	<b>Name</b>	<b>Definition</b>
<i>Organizational Level</i>		
OC	Organizational Culture	Discussion of how Triple P fits within the culture of the organization in which they work
OS	Organizational Support	Discussion or comment on support for implementation of Triple P within the organization (including support at staff or supervision meetings)
KN	Knowledge of Program	Discussion or comment on knowledge of Triple P within organization
TO	Type of Organization	Discussion or comment related to type of organization (including primary population served, etc.)
OR	Organizational Resources	Discussion or comment on availability of resources (such as financial or physical space)
<i>Practitioner Level</i>		
PB	Personal Beliefs	Discussion or comment on how the practitioner's individual beliefs about parenting impact their implementation of Triple P
PP	Personal Preferences	Discussion or comment on any preference the practitioner has for a certain type of intervention
CP	Competence in Triple P	Discussion or comment on the degree of confidence that

		a practitioner reports having in their ability to implement Triple P
PO	Personal Opinion	Practitioner personal opinion about Triple P (including whether they like or dislike the program)
FJ	Fit with Job	Discussion or comment of how Triple P fits with the practitioner's current job or services offered
WL	Workload	Discussion or comment on how the practitioner's workload impacts implementation
MI	Motivation or Incentive	Discussion of or comment on motivations or incentives related to implementation
PU	Practitioner Utilization	Anecdotes associated with delivery of Triple P
ITP	Introduction to Triple P	Anecdotes about how the participant came to be introduced to Triple P
<i>Client Level</i>		
CC	Client Culture	Discussion or comment on how cultural issues (including language or beliefs) helps or hinders practitioner use of Triple P
PF	Population Fit	Discussion or comment on whether or not Triple P is an appropriate fit for the population that the practitioner serves
CEN	Client Engagement	Discussion or comment on the degree to which the practitioners' clients were engaged or motivated to participate in Triple P
CEX	Client Experience	Discussion or comment on experiences of clients and feedback from clients regarding Triple P
<i>Project or Program Level</i>		
REC	Project Recruitment	Discussion or comment of

		recruitment for training practitioners in Triple P
AD	Advertising	Discussion or comment of Triple P related advertising and marketing
RES	Program Resources	Discussion or comment of Triple P related advertising and marketing
TR	Training	Discussion or comment related to Triple P training (including structure of training)
ST	Structure of Program	Discussion or comment of structural components of Triple P as an intervention
PS	Peer Support	Discussion or comment of attendance at our availability of peer support groups
FI	Financial	Discussion or comment of costs associated with the implementation of Triple P, or financial aid for training or resources
IMP	Recommendation for Improvement	Recommendations on how Triple P could be improved
<i>Community Level</i>		
CU	Community Utilization of Triple P	Discussion or comment of how Triple P is utilized in the community (including the county system)
IC	Inter-agency Collaboration	Discussion of collaboration or lack of collaboration between multiple agencies
<i>Other</i>		
FQC	Facilitator question or comment	Comments or questions made by the focus group facilitator
PCM	Participant Conversation – Miscellaneous	Not otherwise classified conversation between practitioners (including questions and answers not associated with a barrier or facilitator)