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Coping Strategies in Middle Childhood: The Role of Parental Modeling

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Abstract

Developing effective coping strategies during middle childhood may place individuals on more adaptive developmental trajectories for coping throughout adulthood, yet little is known about how children develop these strategies. This project aims to understand the ways in which parents act as models for their children as they develop coping strategies. Participants included 65 children, aged 8-10 ($M = 9.51$, $SD = .81$; 29 females; 93.8% White), and at least one parent (65 mothers; 35 fathers). Hierarchical multiple regression analyses were conducted to examine cross-sectional and longitudinal associations between parents' responses to stress and children's responses to stress. Cross-sectionally, mothers' engagement coping was associated with more engagement coping and less involuntary engagement coping in children. Longitudinally, mothers' disengagement coping predicted higher levels of engagement coping and fewer involuntary responses to stress in children after a six-month follow-up. Results suggest that if adaptive coping strategies are established in parents, it has the potential to benefit children's coping as well, thus supporting a family-wide approach in skill-building interventions for children.

Introduction

Coping, or the ability to effectively regulate and adapt to stress (Compas et al., 2001; Zimmer-Gembeck & Skinner, 2011), is a central aspect of human development. Several studies demonstrate that the manner in which children respond to stress is an important correlate of psychological adjustment and symptoms of psychopathology (e.g., Compas et al., 2001; Hampel & Petermann, 2005; Kliwer et al., 2006). Developing effective coping skills during middle childhood may place individuals on more adaptive developmental trajectories for coping throughout adulthood. Thus, understanding how children develop particular styles of responding to stress is critical for promoting adaptive functioning. Although early coping behavior may be observable from infancy, advances in language skills and interpersonal understanding, such as seeing multiple perspectives in a situation, allow for more complex methods of problem solving in middle childhood (Compas et al., 2001; Kliwer et al., 1996; Hampel & Petermann, 2005), making this a potentially critical time to study coping development. Developmental theories of coping suggest that the parent is the most powerful influence on children's coping development during middle childhood. (Kliwer et al., 1996; Cox & Paley, 1997; Zimmer-Gembeck & Skinner, 2011; Seiffge-Krenke & Pakalniskiene, 2011), but this area of research is still in its infancy. The goal of the present study is to understand the way parents' own responses to stress influence how a child develops coping strategies.

Research on the development of children's coping strategies is relatively new in the field; however, several researchers have made significant strides in understanding how coping skills develop. This project will largely draw from the theoretical framework of Compas and colleagues. Compas et al. (2001) describes coping as "conscious and volitional efforts to regulate emotion, cognition, behavior, physiology, and the environment in response to stressful events or

circumstances” (p. 89). Compas et al. (2001) proposed that responses to stress can be broadly distinguished along two dimensions: *voluntary* versus *involuntary* and *engagement* versus *disengagement*. Voluntary coping efforts are within the conscious awareness of the individual and are intended to regulate one’s response to stress or the stressor itself. Involuntary responses to stress include reactions that are not within conscious awareness or volitional control. Both voluntary and involuntary stress responses can be further distinguished as engagement or disengagement. *Engagement coping* refers to responses oriented toward the source of stress or toward one’s emotions or thoughts surrounding the stress. Engagement coping includes *primary control engagement*, which involves children directly addressing the stressor (e.g., problem solving, emotional expression, support seeking), and *secondary control engagement*, which involves the child adapting to the stressful conditions (e.g., acceptance, cognitive restructuring, positive thinking). Alternatively, *disengagement coping* refers to responses oriented away from the stressor or one’s emotions or thoughts regarding the stressor. Disengagement coping includes problem avoidance, cognitive avoidance, social withdrawal, denial, and wishful thinking. In terms of involuntary responses to stress, *involuntary engagement* refers to unconscious or uncontrollable behavioral or emotional responses oriented toward the stressor, including emotional and physiological arousal, intrusive thoughts, and rumination. *Involuntary disengagement* refers to uncontrollable behavioral or emotional responses that orient an individual away from the stressor, such as emotional numbing, cognitive interference, or escape.

Compas et al. (2001) reviewed over 60 studies and concluded that engagement coping was generally associated with fewer internalizing and externalizing symptoms and better social and academic competence, whereas disengagement coping was largely associated with increased internalizing symptoms and poorer social and academic competence. More recent research

findings have observed these patterns as well (e.g., Kliewer et al., 2006; Santiago & Wadsworth, 2009; Sontag & Graber, 2010). Although a few studies have observed beneficial effects of disengagement strategies (Eisenberg et al., 1993; Eisenberg et al., 1994; Kliewer & Sandler, 1993; O'Brien et al., 1995), the majority of the literature provides evidence that engagement coping strategies promote better psychological adjustment, whereas disengagement coping strategies undermine healthy adjustment in children. With regard to involuntary responses, Wolff, Santiago, and Wadsworth (2009) demonstrated that involuntary stress responses typically exacerbate the effects of stress on an individual's psychological well-being due to an increase in anxiety symptoms in participants over a one-year period. Involuntary engagement stress responses are specifically correlated with increased internalizing problems and aggression (Langrock et al., 2002; Jaser et al., 2005). Another study found that involuntary engagement stress responses weaken the effectiveness of primary control coping (Wadsworth & Berger, 2006). Therefore, involuntary responses to stress appear to increase risk for unhealthy psychological adjustment.

Family Influences on Coping Development

This study specifically explores the role of parents in the development of children's strategies to cope with stress. A theoretical foundation of this study is Family Systems Theory, which characterizes the family as a system of interdependencies in which changes in one subsystem (e.g., parents having marital problems or a child struggling in school) has ramifications for all other subsystems (Cox & Paley, 1997). This theory considers individuals in the context of the larger family system. Each individual in the system affects other individuals, even outside the context of the direct family interactions. For example, if a parent loses his or her job, the entire familial system is impacted, including the child, the other parent's routine, or the

parent-child relationship. Therefore, parent behaviors and experiences not specifically directed at the child can still impact the child. Based on this theory, I expect parents' strategies for coping with stress in their own lives will influence the child's developing coping strategies.

Numerous studies have analyzed contributions of the family environment to the development of children's responses to stress, including parent-child relationships (Steele, Forehand, & Armistead, 1995), poverty-related stress (Santiago et al., 2012; Wolff, Santiago, & Wadsworth, 2009), and marital conflict (Miller, Kliewer, & Partch, 2010). In a study of families with a chronically ill father, Steele, Forehand, and Armistead (1995) examined the coping strategies of a child within a family in which "normal family processes" were disrupted. The researchers found that normal family functioning was increasingly disrupted with a rise of depressive symptoms in parents, dyadic maladjustment, and difficulties in the parent-child relationship. Specifically, as normal family process variables were more disrupted, children increasingly employed disengagement coping strategies. When examining the influence of a parent with a history of depression on child coping, Langrock et al. (2002) and Jaser et al. (2005) both found that as the parent's symptoms of anxiety and depression increased, the child used less secondary control coping and more involuntary engagement. In another study of families with a depressed parent, Watson et al. (2014) found that observed parental responsiveness and warmth was positively correlated with children's primary control and secondary control coping and negatively correlated with children's disengagement coping. Together, this research demonstrates that adaptive family functioning promotes more adaptive coping patterns in children, whereas family dysfunction tends to promote maladaptive coping in children. These studies, in line with Family Systems Theory, support the idea that the environment in which the child is developing plays a major role in how the child will ultimately learn to cope with stress.

Within the larger family environment, coping researchers suggest that parents are a powerful influence on children's coping development during middle childhood (Kliewer et al., 1996; Cox & Paley, 1997; Zimmer-Gembeck & Skinner, 2011; Seiffge-Krenke & Pakalniskiene, 2011). Socialization of coping refers to parenting behaviors that communicate possible strategies for handling stress to their children (Kliewer et al., 1996; Abaied & Rudolph, 2010). Current research focuses on two ways parents socialize or influence their child's coping strategies: coaching and modeling. *Coaching* refers to explicit and direct suggestions parents make to encourage the child to use a specific strategy when faced with stress. Drawn from the framework by Compas et al. (2001), parent coping suggestions can be conceptualized as engagement versus disengagement. Engagement suggestions urge children to orient towards the stressor, through strategies such as problem solving, whereas disengagement suggestions urge children to deny stress, through strategies such as cognitive avoidance. Various studies examining coaching through questionnaires and interviews have found that parents who offered engagement coping suggestions protected their children against maladaptive responses to stress, whereas parents' disengagement coping suggestions amplified maladaptive responses to stress. (Kliewer et al., 1996, 2006; Miller et al., 1994; Abaied & Rudolph, 2011). Several studies have investigated parent socialization of coping by observing parent-child discussions of hypothetical social stress. This research indicates that when parents suggest engagement strategies in these interactions, their children exhibit increased social skills and peer acceptance as well as lower rates of social anxiety and aggression (Mize & Pettit, 1997; Miller, Kliewer, Partch, 2010; Werner et al., 2014; Su, Pettit, & Erath, 2016). These studies suggest that children take their parent's advice on dealing with stress and apply it to their own stressful situations. Thus, parents' direct suggestions

to children on how to cope with stress have a significant and meaningful impact on the strategies with which children utilize to respond to their own stress.

The second way in which parents influence their children's coping choices, and the method that is the focus of this study, is modeling. *Modeling* refers to the parents' own responses to stress as a potential source of socialization of coping. Family Systems Theory states that the distinct behaviors or emotions of one family member influence the relationships and development of other family members, including the child. Thus a parent's own modeled coping skills may be equally as important to examine as the parent's coping suggestions in order to get a holistic view of coping development. For example, a parent may model support-seeking behaviors by discussing a stressful workday with a spouse. Although this does not directly involve the child, a child in that household may observe this behavior and then apply support seeking in their own life, such as seeking comfort from a friend after a stressful day at school. Children, therefore, can learn from their parents without an explicit parent-child interaction. Moreover, according to Family Systems Theory, children's coping may still be influenced by how their parents cope even if the child does not directly see the parent coping. For example, if a parent uses positive thinking when dealing with a stressful situation, such as telling him or herself that there are good lessons to be learned, a child may not directly observe that strategy. The child, nonetheless, will experience the parent remaining calm or exhibiting less stress, which could in turn affect the child's approach to coping when faced with a stressful situation. This research conceptualizes modeling as the correlation between the way in which a parent copes with stress and the way a child copes with stress.

Research on how parents themselves cope with stress, and how this relates to child coping, is limited. Kliewer et al. (1996) conducted one of the only studies that examined the link

between parent coping strategies and child coping strategies with daily stressors. Kliewer et al. (1996) found that fathers' use of engagement coping predicted the use of engagement coping amongst their sons. This study supplies evidence for a direct relationship between the coping methods a parent employs and the coping methods a child employs. Similar results have been found in other studies that examined the correlation between parent coping and child coping within different contexts. In a study that assessed parental modeling of coping strategies within the context of community violence, Kliewer et al. (2006) found that disengagement coping strategies in parents predicted disengagement coping in their children. Santiago et al. (2012) examined family coping strategies within the context of poverty-related stress and observed several links between parent and child coping. Specifically, they found that parent disengagement coping predicted less secondary control, more disengagement coping, and more involuntary disengagement in children. Additionally, parent primary control coping predicted more primary control, less disengagement coping, and less involuntary disengagement in children. This study also found that parent secondary control predicted less child involuntary disengagement and involuntary engagement (Santiago et al., 2012). Collectively, these studies suggest that adaptive coping strategies in parents are correlated with adaptive coping patterns in children, in which children utilize more adaptive coping and fewer maladaptive coping skills. Further, maladaptive coping strategies in parents is related to maladaptive coping patterns in children, in which children engage in fewer adaptive coping skills and more maladaptive coping strategies. Nevertheless, the research in this area is still very limited. More studies must be conducted to further understand the way in which parent coping relates to child coping.

The present study intends to address this gap in knowledge within the coping literature by examining the way in which parents model coping strategies to their children aged 8-10. Based

on previous research, I hypothesize that parents who utilize adaptive coping strategies will have children with adaptive coping patterns. Specifically, I hypothesize that primary and secondary control engagement coping in parents will predict more primary and secondary control engagement coping, less disengagement coping, and less involuntary responses to stress in their children. Additionally, I predict that parents who utilize maladaptive coping strategies will have children with maladaptive coping patterns. Specifically, I expect that disengagement coping in parents will predict less primary and secondary control engagement coping and more disengagement coping in children. Moreover, I expect that parents' involuntary responses to stress will be associated with less primary and secondary control engagement coping, more disengagement coping, and more involuntary responses in children.

Methods

Participants

Participants consisted of a community sample of 65 children (8 to 10 years old; 29 females; M age = 9.51; SD = .81; 93.8% White) along with at least one parent. All child participants had a mother who also participated in the study, yet only 35 children had a secondary parent participant. The 65 mothers who filled out the questionnaires were predominately Caucasian mothers (100% females; 28 to 53 years old; M age = 42.94; SD = 5.36; 90.8% Caucasian; 1.5% Asian American; 1.5% Latino or Hispanic; 1.5% other), and 95.4% of the sample identified as the biological mother, 3.1% were adoptive mother, and 1.5% chose not to disclose. The sample consisted of 10 single mothers, yet the majority of the mothers were married (80% married; 7.7% never married; 4.6% divorced; 3.1% separated; 3.1% other). The 35 secondary parents who participated were all male (97.0% biological fathers, 3.0% adoptive fathers). Fathers, or second parent participants were 97.1% Caucasian or white, and 2.9% Latino

or Hispanic. Throughout the project, the group consisting of parent 1 is referred to as “mothers” and the group consisting of parent 2 is referred to as “fathers” due to the gender distinction. The gross family income was generally high (\$0-14,999 = 3.1%; \$15-29,999 = 10.8%; \$30-44,999 = 7.7%; \$45-59,999 = 15.4%; \$60-74,999 = 6.2%; \$75-89,999 = 10.8%; \$90,000+ = 43.1%). At Wave 1, relevant data were available for one 63 families. At Wave 2 (six month follow-up), relevant data were available for 52 families. Participants with complete data at Wave 2 did not differ from those with incomplete data in age, $t(62) = 1.08$, *ns* or sex, $\chi^2(N = 64, df = 1) = 1.12$, *ns*. However, there was a significant difference between those with complete data at Wave 2 and those without complete data in ethnicity, $\chi^2(N = 64, df = 1) = 7.88$, $p < .01$; there was one non-white participant who had complete data at Wave 2 and three non-white participants who did not have complete data.

Procedure

This research was conducted using data from the Parents and Peers Project, which commenced in 2012. The Human Subjects Review Board at the University of Vermont approved all procedures and a parent provided written informed consent prior to child participation. At Wave 1, child participants and one parent were invited to complete a three-hour laboratory assessment that included tasks and questionnaires administered by trained undergraduate and graduate research assistants. During the first phase of the laboratory visit, the child participant was attached to physiological sensors during a series of laboratory tasks and assessments that were not examined in the current study. In second phase of the laboratory visit, child participants completed questionnaires while their parent completed questionnaires in a separate room. A trained research assistant read the questions out loud to the children in order to increase comprehension. Second parent participants completed the same questionnaires and returned

them by mail. At Wave 2, the same battery of questionnaires was mailed to parent participants to complete and return by mail. Trained research assistants once again read the same battery of questionnaires to child participants either over the phone or in person at Wave 2. The two Waves were separated by a six-to-eight-month period. At each Wave, child participants received either a small toy or gift certificate and parents received monetary reimbursement.

Measures

Responses to Stress Questionnaire: (RSQ; Connor-Smith et al., 2001). The RSQ assesses how a person responds to a stressful situation. Parents and children each reported on their own coping behavior using parent and child versions of the RSQ, which assesses primary control engagement, secondary control engagement, disengagement coping, as well as involuntary engagement and involuntary disengagement strategies. Participants indicated frequency with which the individual engaged in each type of response on a 4-point scale (1 = not at all, 4 = very much). The Parent RSQ is a 57-item measure, including: primary control engagement (e.g., “I try to think of different ways to change the problem or fix the situation”; 9 items, $\alpha = .88$), secondary control engagement (e.g., “I think about things I’m learning from the situation, or something good that will come from it”; 12 items, $\alpha = .81$), disengagement coping (e.g., “I try to stay away from people and things that make me feel upset or remind me of the problem”; 9 items, $\alpha = .77$), involuntary engagement (e.g., “When I have problems I can’t stop thinking about what I did or said”; 15 items, $\alpha = .85$), and involuntary disengagement (e.g., “When problems happen I don’t feel anything at all, it’s like I have no feelings”; 12 items, $\alpha = .82$). The parent RSQ reliabilities are excellent. The child RSQ is a 41-item measure, which measures the same responses to stress as the Parent RSQ, but with adopted, age-appropriate language. In concurrence with the Compas, et al. framework and the parent RSQ, the child

version of the RSQ (Connor-Smith et al., 2001) assesses for primary control engagement (6 items, $\alpha = .76$), secondary control engagement (8 items, $\alpha = .84$), disengagement coping (9 items, $\alpha = .71$), involuntary engagement (10 items, $\alpha = .77$), and involuntary disengagement (8 items, $\alpha = .71$). Youths rated how frequently they engaged in each type of response to stress with a 4-point scale (1 = not at all, 4 = a lot).

Proportion scores were calculated (dividing scores on each scale by the total scores across scales) to adjust for individual base rate differences of item endorsement as recommended by Connor-Smith et al. (2001). The internal reliability, retest reliability, and predictive validity of the measure have been established in multiple samples. (Connor-Smith et al., 2001; Compas et al., 2001; Connor-Smith & Compas, 2004; Wadsworth et al., 2004).

Results

Descriptive statistics for the study variables at Wave 1 appears in Table 1. Table 2 displays correlations between the study variables at Wave 1. For each informant (mother, father, and child) intercorrelations among types of coping were consistent with prior research; specifically, more adaptive responses to stress (primary control and secondary control coping) were positively correlated with each other, as were maladaptive responses to stress (disengagement, involuntary engagement, involuntary disengagement). Further, primary control and secondary control coping were both negatively correlated with disengagement coping and involuntary responses to stress for each informant. Additionally, a cross-informant correlation emerged in which secondary control in mothers was positively correlated with primary control coping in children.

Hierarchical multiple regression analyses (Table 3-6) were conducted to examine the relative contributions of parent responses to stress to children's responses to stress at Wave 1.

Because the responses to stress scores were calculated as proportion scores, entering all five scales into one regression would lead to linear dependency among predictor variables and thus render the regression models invalid. To avoid this issue, I ran one set of regressions with parents' voluntary coping (three scales) as predictors and another set of regressions with parents' involuntary responses to stress as predictors. In addition, each set of regression analyses were conducted separately for each parent (mothers versus fathers). In the first step of the analysis the children's sex and age were entered as covariates, and responses to stress, either voluntary or involuntary, were entered in the second step.

Table 3 displays mothers' voluntary coping at Wave 1 predicting child coping at Wave 1. Regression analyses indicated that, in agreement with my hypothesis, higher levels of secondary control in mothers were positively associated with primary control engagement in children and negatively associated with involuntary engagement in children. Contrary to hypotheses, regression analyses revealed no significant associations between mothers' involuntary responses to stress and children's responses to stress (Table 4) or between fathers' voluntary coping and children's responses to stress (Table 5). Table 6 displays that, contrary to my hypothesis, fathers' involuntary responses to stress at Wave 1 did not predict child coping at Wave 1.

Hierarchical multiple regression analyses (Table 7-8) were conducted to examine the contributions of parent responses to stress at Wave 1 to children's responses to stress at Wave 2. Thus, these regression analyses display the associations between parent responses to stress on child responses to stress over time. Nine families who participated at Wave 1 did not complete Wave 2. With this decrease in families at Wave 2, there were very few families at Wave 2 who had data available from fathers at Wave 1. Thus, due to the small sample size, I did not conduct regressions for the longitudinal effect of fathers' coping. Therefore, these regressions were only

conducted for mothers (parent 1). In the first step of the analysis the children's sex, age, and their coping at Wave 1 were entered as covariates, and parent responses to stress at Wave 1, either voluntary or involuntary, were entered in the second step.

Regression analyses revealed that children's responses to stress were somewhat stable from Wave 1 to Wave 2, with the exception of disengagement coping. Regression analyses demonstrated that higher levels of disengagement coping among mothers at Wave 1 were positively associated with secondary control coping in children at Wave 2 and negatively associated with both involuntary engagement and involuntary disengagement in children at Wave 2.

Discussion

This study examined whether parents' strategies of responding to stress were related to their children's responses to stress. The findings of this study partially supported my hypotheses. As expected, voluntary engagement coping in parents was associated with higher levels of voluntary engagement coping in children. I also predicted that voluntary engagement coping in parents would be associated with less disengagement coping in children; although these associations were in the predicted directions, they were not significant. Moreover, I expected that involuntary responses to stress in parents would be associated with more involuntary responses to stress and fewer voluntary engagement coping skills in children. These associations were, again, in the predicted directions, but were not significant. Also contrary to my hypothesis, disengagement coping in parents was associated with higher rather than lower levels of voluntary engagement coping and less rather than more involuntary responses to stress in children. Overall, the results provide modest evidence that a direct relationship exists between some types of coping strategies in parents, specifically mothers, and coping strategies in children.

Cross-sectional Findings

As predicted, this study presents evidence that parents can have a beneficial effect on children's responses to stress. Secondary control coping in mothers was related to more primary control coping in children and fewer involuntary engagement responses in children. Thus, mothers' adaptive coping seems to promote adaptive coping patterns in children, which is in line with prior research. Santiago et al. (2012) also found that parents' use of adaptive coping strategies protected against maladaptive responses to stress in children, specifically child involuntary engagement. My results take the findings of Santiago et al. (2012) further by suggesting that children of mothers who utilize adaptive coping not only use fewer maladaptive responses, but also more adaptive responses. My results thus offer novel evidence that adaptive coping in parents fosters an adaptive coping profile in children.

Supporting my findings, Kliewer et al. (1996) found that adaptive coping in parents was associated with adaptive coping in children. However, Kliewer et al. (1996) did not distinguish between primary and secondary control engagement coping. My results indicated that when we consider these two types of engagement coping skills separately, correlations between mother and child coping emerged across types of engagement coping (primary vs. secondary control) but not within types of engagement coping. Specifically, secondary control coping in mothers was related to higher levels of primary control coping in children. Although children in the sample engage in both primary and secondary control coping in relatively equal amounts, only children's primary control coping was related to their parent's coping. This finding may be due to the fact that primary control coping is more resource-intensive than secondary control coping. For example, problem solving may require more cognitive, social, and emotional resources compared to a strategy such as acceptance or positive thinking. Because primary control strategies may be

more difficult to enact, it is possible that children's use of primary control coping is more contingent on adaptive coping examples from parents than secondary control coping. Overall, both primary control and secondary control coping are adaptive coping strategies. The findings thus indicate that mothers who engage in adaptive coping skills have children who engage in adaptive coping skills as well.

Contrary to my hypotheses, the results did not provide evidence that parents who utilize maladaptive coping strategies will have a detrimental effect on children's responses to stress. Specifically, involuntary responses to stress in parents were not associated to the ways in which children respond to stress. This lack of association may be due to this study's high functioning sample; there may not have been enough variability in involuntary responses to detect these associations. However, it is also possible that involuntary responses to stress, such as rumination or racing thoughts, are not easily observable for children. Voluntary coping skills, such as support seeking, problem solving, or positive thinking, may be easier for the child to observe and, therefore, easier to imitate. Involuntary responses to stress in parents may contribute to the parent being less responsive to their child's needs or contribute to mental health symptoms in parents (Watson et al, 2014; Langrock et al., 2002; Jaser et al., 2005). These factors could, in turn, affect the child's coping skills, yet the parents' involuntary responses to stress may not directly influence the child's coping. Exploring these mediation pathways is a logical next step for this research. The present study suggests that children are more likely to model voluntary coping skills as opposed to involuntary responses to stress.

Interestingly, fathers' coping strategies did not significantly influence the ways in which their children cope. Given the small sample size of fathers, this may indicate a lack of power. However this could also suggest that fathers are less likely to act as a model for their children. A

potential explanation is that fathers are more likely to withdraw from their children when under stress. In the emotion regulation literature, several studies found that males are more likely than females to use avoidance strategies (Zimmerman & Iwanski, 2014; Blanchard-Fields & Coats, 2008; Silk et al., 2003; Vierhaus, Lohaus, & Ball, 2007). Emotion regulation strategies and coping strategies are very similar because they each involve the modification and control of how individuals react to specific stimuli. Coping with a stressor typically involves emotion regulation. Even if the father does not physically withdraw, he may be more likely to handle a stressor internally rather than display his coping strategies for his children. In a study on job-stressors, Repetti (1994) found that fathers tended to be more behaviorally and emotionally withdrawn during interactions with their children after a demanding day at work. If a father withdraws when faced with stress, his children may be unable to imitate this strategy or be unaware that their father is dealing with stress at all. A child, therefore, may be more likely to model their mother's coping skills. However, given that power was particularly low for father-child analyses, this study cannot make firm conclusions. Future studies should further examine relative contributions of mothers and fathers as models for their children's coping.

Longitudinal Findings

The present study also examined the ways in which mothers' responses to stress related to children's responses six months later. Contrary to my predictions, disengagement coping in mothers predicted more secondary control coping strategies and less involuntary responses to stress in their children over time. Thus, this study demonstrates that disengagement coping strategies in mothers, such as avoidance or denial of a stressor, seem to help children develop adaptive coping strategies. This finding is in disagreement with my hypothesis. Extant research demonstrates that disengagement coping can contribute to maladaptive outcomes, such as

internalizing behaviors and poor social and academic competence (for review see Compas et al., 2001). However, some studies illuminate disengagement as an adaptive strategy within some specific contexts, such as when grappling with parents' divorce, or when dealing with hostile behaviors from peers (Eisenberg et al., 1993; Eisenberg et al., 1994; Kliewer & Sandler, 1993). There are several explanations for this finding. First, disengagement involves intentionally removing oneself or distancing oneself from the stressor, which can possibly be helpful in short-term situations. For example, avoiding a stressor for a short period of time may give an individual a chance to calm down or gain perspective on the issue. Additionally, some individuals may use several coping strategies during their process of coping with stress. Individuals may use disengagement coping momentarily as part of their larger goal to reframe the situation or confront the stressors, but mainly use more adaptive coping skills. Therefore, parents reporting that they use disengagement may not use disengagement as a long-term strategy, but re-engage with the stressor after some time has passed. It is possible that the children only see, and therefore imitate, these parents when they eventually re-engage with the stressor. As a result, parents who use disengagement coping before employing engagement coping strategies may still model adaptive coping skills to their children.

When examining modeling for children, it is important to consider what a child actually witnesses. Disengagement coping strategies may remain maladaptive for the individual parent, yet *observing* disengagement coping in action seems to promote adaptive coping in children. It is possible that a parent who is mentally avoiding a stressor may appear to simply remain positive and calm through a stressful experience. From a child's perspective, this could be similar to secondary control coping, which uses cognitive reframing and positive thinking. A child of a parent who purposefully avoids stress and engages in wishful thinking may learn to stay positive

when addressing a stressor. Because there are discrepancies in the literature regarding the effects of disengagement coping, future studies examining coping within families should address the role of voluntary disengagement strategies over time. To further examine the adaptive outcome in children of parents who employ disengagement coping, future research may require observational methodology.

Implications for Theory and Research

Understanding how children develop particular styles of responding to stress is critical for promoting adaptive and effective coping. Despite extant research on the effects of parenting practices on child stress and development, little is known about the influence of parents' own coping skills on children's coping development. Within the emerging field of coping socialization, this research is one of the only studies that analyzes modeling as a method of socialization of coping. My findings demonstrate that adaptive coping in mothers is related to adaptive coping profiles in children. These results suggest that when children experience their own stressors, they remember how their parents deal with stress and emulate that type of behavior.

Several mechanisms may explain the association between parent coping and child coping. First, parent mental health potentially mediates this relationship. The coping literature demonstrates that secondary control coping strategies, such as cognitive restructuring and acceptance, predict more adaptive outcomes and protects against internalizing and externalizing symptoms for both parents and children (Compas et al., 2001; Jaser et al., 2005; Wadsworth et al., 2005). As a result, it is likely that parents who use secondary control strategies have fewer internalizing and externalizing problems and are less likely to struggle with their mental health. Research also suggests that mental health of a parent affects child coping strategies. Langrock et

al. (2002) and Jaser et al. (2005) found that as a parent experiences increased symptoms of anxiety and depression, their child uses fewer adaptive coping strategies. When directly observing families with a depressed parent, Watson et al. (2014) found that parents who lacked in warmth and responsiveness fostered unhealthy coping skills in children. Thus, parents who do employ secondary coping skills, such as the mothers in my sample, may have fewer internalizing or externalizing symptoms, which could in turn promote more adaptive coping strategies in children. Future research should examine the ways in which parent mental health plays a role in how parents model coping strategies to their children.

Additionally, the quality of the parent-child relationship may act as a moderator of the link between parent and child coping. Research suggests that negative relationships with parents are associated with children and adolescents using less engagement coping and more disengagement coping (Karavasilis et al., 2003; Zimmer-Gembeck & Locke, 2007), whereas positive relationships with parents are associated with more engagement coping in children (Kliewer et al., 1996). The quality of the parent-child relationship may contribute to how willing the child is to use parents as a model for how to cope with stress. A positive relationship may foster an increase in coping imitation, whereas a negative relationship may undermine the modeling relationship. Thus, future research should compare the strength of the association between parent coping and child coping for families with both positive versus negative parent-child relationships.

The data obtained through this study is an important contribution to the socialization of coping literature and may impact the future directions of coping research. Numerous studies have researched parent coping suggestions and parent modeling separately, yet few studies have analyzed the relationship between these two phenomena. Future research should examine coping

suggestions as a potential mediator that explains the relationship between parent coping and child coping. The way a parent copes may influence the coping suggestions a parent offers the child, which in turn can influence the way a child copes (Abaied & Rudolph, 2011). These findings highlight the need for researchers to continue to investigate parent behavior and coping.

Although this study has a number of strengths, it had some limitations. My sample was very homogenous in ethnicity and socioeconomic status. Additionally, this small sample size did not allow me to explore child gender as a moderator. An analysis of child gender may have contributed to a more complete understanding of the gender differences in the effects of parent coping. Further, the small sample size of fathers participating in the study may have contributed to the lack of association between father coping and child coping. Future research should continue to analyze the relationship between fathers and children and the role that parent gender plays in how children learn to cope. It should also be noted that correlational and cross-sectional studies do not inform us about the direction of the effects. Family Systems Theory states that dyadic relationships are reciprocal in that both the parent and the child will adapt and learn from the other. Therefore, it is possible that a child exhibiting maladaptive coping patterns, such as uncontrollable emotional or behavioral responses, can cause stress for a parent that leads to maladaptive coping in the parent. This study was further limited through only using self-report questionnaires rather than multiple informants. Coping is an internal mechanism that is often most accurately recorded through self-report. However, self-reports are often biased. Using multiple informants or observational methods may have created a more holistic and accurate picture of the coping strategies employed within the sample. Future research should utilize various informants and methodologies in order to assure the accurate report of coping strategies.

This study has several important implications for parenting and interventions. Mothers engaging in adaptive patterns of responding to stress predicted children who employ adaptive patterns of responding to stress as well. This suggests that if adaptive coping strategies are established in parents, it will benefit the children and the family as a whole. Thus, the present study supports the hypothesis that, at least for children with similar demographics to those of the current sample, parental engagement and a family-wide approach is key in coping skill-building interventions for children (Santiago et al., 2012). Family interventions to help improve coping strategies in children may set children on adaptive coping trajectories through adolescence and into adulthood.

References

- Abaied, J. L., Rudolph, K. D. (2010). Contributions of maternal adult attachment to socialization of coping. *Journal of Social and Personal Relationships, 27*, 637-657.
- Abaied, J. L., Rudolph, K. D. (2011). Maternal Influences on youth responses to peer stress. *Developmental Psychology, 47*, 1776-1785.
- Bandura, A. (1977). Self-efficacy: Toward a unifying theory of behavioral change. *Psychological review, 34*, 191-215.
- Blanchard-Fields, F., Coats, A. H. (2008). The experience of anger and sadness in everyday problems impacts age differences in emotion regulation. *Developmental Psychology, 44*, 1547-1556.
- Compas, B. E., Connor-Smith, J. K., Saltzman, H., Thomsen, A. H., Wadsworth, M. E. (2001). Coping with stress during childhood and adolescence: Problems, progress, and potential in theory and research. *Psychological Bulletin, 127*, 87-127.
- Connor-Smith, J. K., Compas, B.E. (2004). Coping as a moderator of relations between reactivity to interpersonal stress, health status, and internalizing problems. *Cognitive Therapy & Research, 28*, 347-368.
- Connor-Smith, J. K., Compas, B. E., Wadsworth, M. E., Thomsen, A. H., Saltzman, H. (2001). Responses to stress in adolescence: Measurement of coping and involuntary stress responses. *Journal of Consulting and Clinical Psychology, 68*, 976-992.
- Cox, M. J., Paley, B. (1997). Families as systems. *Annual Review of Psychology, 48*, 243-267.
- Eisenberg, N., Fabes, R. A., Bernzweig, J., Karbon, M., Poulin, R., & Hanish, L. (1993). The relations of emotionality and regulation to preschoolers' social skills and sociometric status. *Child Development, 64*, 1418-1438.

- Eisenberg, N., Fabes, R. A., Minore, D., Mathy, R., Hanish, L., & Brown, T. (1994). Children's enacted interpersonal strategies: Their relations to social behavior and negative emotionality. *Merril-Palmer Quarterly, 40*, 212-232.
- Hampel, P., Petermann, F. (2005). Age and gender effects on coping in children and adolescents. *Journal of Youth and Adolescence, 34*, 73-83.
- Jaser, S. S., Langrock, A. M., Keller, G., Merchant, M. J., Benson, M. A., Reeslund, K., Champion, J. E., Compas, B. E. (2005). Coping with the stress of paternal depression II: Adolescent and parent reports of coping and adjustment. *Journal of Clinical Child and Adolescent Psychology, 34*, 193-205.
- Karavasilis, L., Doyle, A. B., Markiewicz, D. (2003). Associations between parenting style and attachment to mother in middle childhood and adolescence. *International Journal of Behavioral Development, 27*, 153-164.
- Kliewer, W., Fearnow, M. D., Miller, P. A. (1996). Coping socialization in middle childhood: Tests of maternal and paternal influences. *Child Development, 1996, 67*, 2339-2357.
- Kliewer, W., Parrash, K. A., Taylor, K. W., Jackson, K., Walker, J. M., Shivy, V. A. (2006). Socialization of coping with community violence: Influences of Caregiver coaching, modeling, and family context. *Child Development, 77*, 605-623.
- Kliewer, W., & Sandler, I. (1993). Social competence and coping among children of divorce. *American Journal of Orthopsychiatry, 63*, 432-440.
- Kotchick, B. A., Forehand, R., Wierson, M., Armistead, L., Klien, K. (1996). Coping with illness: Interrelationships across family members and predictors of psychological adjustment. *Journal of Family Psychology, 10*, 359-370.

- Langrock, A. M., Compas, B. E., Keller, G., Merchant, M. J., Copeland, M. E. (2002). Coping with the stress of parental depression: Parents' reports of children's coping, emotional, and behavioral problems. *Journal of Clinical Child and Adolescent Psychology, 31*, 312-324.
- Miller, P. A., Kliewer, W., Hepworth, J. T., & Sandler, I. N. (1994). Maternal socialization of children's post-divorce coping: Development of a measurement model. *Journal of Applied Developmental Psychology, 15*(3), 457-487.
- Miller, P. A., Kliewer, W., Partch, J. (2010). Socialization of children's recall and use of strategies for coping and interparental conflict. *Journal of Child and Family Studies, 19*, 429-443.
- Mize, J., Pettit, G. S. (1997). Mothers' social coaching, mother-child relationship style, and children's peer competence: Is the medium the message? *Child Development, 68*, 312-332.
- O'Brien, M., Margolin, G., John, R. S. (1995). Relation among marital conflict, child coping, and child adjustment. *Journal of Clinical Child Psychology, 24*, 346-361.
- Power, T. G. (2004). Stress and coping in childhood: The parents' role. *Parenting: Science and Practice, 4*, 271-317.
- Repetti, R. L. (1994). Short-term and long-term processes linking job stressors to father-child interaction. *Social Development, 3*, 1-15.
- Rudolph, K. D., Abaied, J. L., Flynn, M., Sugimura, N., Agoston, A. M. (2011). Developing relationships, being cool, and not looking like a loser: Social goal orientation predicts children's responses to peer aggression. *Child Development, 82*, 1518-1530.

- Santiago, C. D., Etter, E. M., Wadsworth, M. E., Raviv, T. (2012). Predictors of responses to stress among families coping with poverty-related stress. *Anxiety, Stress, & Coping, 25*, 239-258.
- Santiago, C. D., Wadsworth, M. E. (2009). Coping with family conflict: What's helpful and what's not for low-income adolescents. *Journal of Child and Family Studies, 18*, 192-202.
- Seiffge-Krenke, I., Pakalniskiene, V. (2011). Who shapes whom in the family: Reciprocal links between autonomy support in the family and parents' and adolescent coping behaviors. *Journal of Youth Adolescence, 40*, 983-995.
- Silk J. S., Steinberg L., Morris A. S. (2003). Adolescents' emotion regulation in daily life: links to depressive symptoms and problem behavior. *Child Development, 74*, 1869–1880.
- Sontag, L. M., Graber, J. A. (2010). Coping with perceived peer stress: Gender-specific and common pathways to symptoms of psychopathology. *Developmental Psychology, 46*, 1605-1620.
- Steele, R. G., Forehand, R., Armistead, L. (1995). The role of family processes and coping strategies in the relationship between parental chronic illness and childhood internalizing problems. *Journal of Abnormal Child Psychology, 25*, 83-94.
- Su, S., Pettit, G. S., Erath, S. A. (2016). Peer relations, parental social coaching, and young adolescent social anxiety. *Journal of Applied Developmental Psychology, 42*, 89-97.
- Vierhaus M., Lohaus A., Ball J. (2007). Developmental changes in coping: Situational and methodological influences. *Anxiety, Stress and Coping, 20*, 267–282.

- Wadsworth, M. E., Berger, L. E. (2006). Adolescents coping with poverty-related family stress: Prospective predictors of coping and psychological symptoms. *Journal of Youth and Adolescence, 35*, 54-67.
- Wadsworth, M. E., Raviv, T., Compas, B. E., Connor-Smith, J. K. (2005). Parent and adolescent responses to poverty-related stress: Tests of mediated and moderated coping models. *Journal of Child and Family Studies, 14*, 283-298.
- Wadsworth, M. E., Rieckman, T., Benson, M. A., Compas, B. E. (2004). Coping and responses to stress in Navajo adolescents: Psychometric properties of the responses to stress questionnaire. *Journal of Community Psychology, 32*, 391-411.
- Watson, K. H., Dunbar, J. P., Thigpen, J., Reising, M. M., Hudson, K., McKee, L., Forehand, R. (2014) Observed parental responsiveness/warmth and children's coping: Cross-sectional and prospective relations in a family depression preventive intervention. *Journal of Family Psychology, 28*, 278-286.
- Werner, N. E., Eaton, A. D., Lyle, K., Tseng, H., Holst, B. (2014). Maternal social coaching quality interrupts the development of relational aggression during early childhood. *Social Development, 23*, 470-486.
- Wolff, B. C., Santiago, C. D., Wadsworth, M. W. (2009) Poverty and involuntary engagement stress responses: Examining the link to anxiety and aggression within low-income families. *Anxiety, Stress, & Coping, 22*, 309-325
- Zimmer-Gembeck, M. J., Locke, E. M. (2007). The socialization of adolescent coping behaviors: Relationships with families and teachers. *Journal of Adolescence, 30*, 1-16.

Zimmer-Gembeck, M. J., Skinner, E. A. (2011). The development of coping across childhood and adolescence: An integrative review and critique of research. *International Journal of Behavioral Development, 35*, 1-17.

Zimmerman, P., Iwanski, A. (2014). Early regulation from early adolescence to emerging adulthood and middle adulthood: Age differences, gender differences, and emotion specific developmental variations. *International Journal of Behavioral Development, 38*, 182-194.

Table 1

Descriptive Statistics

Mother Variables	Min	Max	Mean	SD
Primary Engagement	0.11	0.45	0.30	0.08
Secondary Engagement	0.12	0.46	0.29	0.08
Disengagement	0.00	0.21	0.08	0.05
Involuntary Engagement	0.10	0.42	0.26	0.08
Involuntary Disengagement	0.00	0.32	0.08	0.06
Father Variables				
Primary Engagement	0.17	0.50	0.30	0.08
Secondary Engagement	0.09	0.52	0.33	0.10
Disengagement	0.00	0.17	0.07	0.05
Involuntary Engagement	0.06	0.47	0.23	0.10
Involuntary Disengagement	0.00	0.24	0.07	0.06
Child Variables				
Primary Engagement	0.13	0.27	0.19	0.03
Secondary Engagement	0.09	0.32	0.21	0.04
Disengagement	0.14	0.26	0.20	0.03
Involuntary Engagement	0.15	0.35	0.23	0.04
Involuntary Disengagement	0.10	0.23	0.17	0.03

Table 2

Correlations Among Study Variables at Wave 1

Variable	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
1. P1 PC	1														
2. P1 SC	.56**	1													
3. P1 DIS	-.68**	-.43**	1												
4. P1 IE	-.58**	-.80**	.13	1											
5. P1 ID	-.78**	-.70**	.52**	.41**	1										
6. P2 PC	.17	.05	-.12	-.18	.06	1									
7. P2 SC	.13	.30	-.09	-.15	-.28	.34*	1								
8. P2 DIS	-.06	-.13	.26	.04	.01	-.71**	-.35*	1							
9. P2 IE	-.21	-.17	.03	.17	.25	-.45*	-.75**	.07	1						
10. P2 ID	-.06	-.16	.05	.19	-.03	-.57**	-.59**	.60**	.16	1					
11. Child PC	.06	.28*	-.08	-.11	-.24	.23	.20	-.14	-.15	-.27	1				
12. Child SC	.02	.09	.01	-.12	.00	.28	.19	-.27	-.23	-.08	.15	1			
13. Child DIS	-.08	.09	.04	-.08	.06	-.16	.01	.13	-.03	.15	-.16	.15	1		
14. Child IE	-.03	-.25	-.03	.20	.12	-.20	-.20	.23	.18	.08	-.40**	-.77**	-.44**	1	
15. Child ID	-.01	-.17	.09	.08	.08	-.23	-.17	.09	.21	.18	-.68**	-.58**	-.06	.43**	1

Note: P1 = Mothers P2 = Fathers PC = Primary Control SC = Secondary Control DIS = Voluntary Disengagement IE = Involuntary Engagement ID = Involuntary Disengagement *p = < .05 **p = < .01

Table 3

Mother Voluntary Coping at Wave 1 Predicting Child Coping at Wave 1

Predictors	Child Primary Control Engagement		Child Secondary Control Engagement		Child Voluntary Disengagement		Child Involuntary Engagement		Child Involuntary Disengagement	
	β	ΔR	β	ΔR	β	ΔR	β	ΔR	β	ΔR
Step 1		.02		.03		.01		.05		.03
Sex	.12		-.16		.10		-.20		-.16	
Age	.00		-.04		-.05		.10		-.04	
Step 2		.10		.01		.04		.09		.06
PC	-.21		-.05		-.23		.14		.25	
SC	.37*		.13		.21		-.35*		-.25	
DIS	-.07		.01		-.04		-.06		.17	

Note: PC = Primary Control SC = Secondary Control DIS = Voluntary Disengagement * $p < .05$

Table 4

Mother Involuntary Responses to Stress at Wave 1 Predicting Child Coping at Wave 1

Predictors	Child Primary Control Engagement		Child Secondary Control Engagement		Child Voluntary Disengagement		Child Involuntary Engagement		Child Involuntary Disengagement	
	β	ΔR	β	ΔR	β	ΔR	β	ΔR	β	ΔR
Step 1		.02		.03		.01		.05		.03
Sex	.12		.16		.10		-.20		-.16	
Age	.00		-.04		-.05		.10		-.04	
Step 2		.05		.02		.02		.04		.01
IE	-.02		-.16		-.13		.19		.44	
ID	-.22		.09		.12		.01		.27	

Note: IE= Involuntary Engagement ID Involuntary Disengagement * $p < .05$

Table 5

Father Voluntary Coping at Wave 1 Predicting Child Coping at Wave 1

Predictors	Child Primary Control Engagement		Child Secondary Control Engagement		Child Voluntary Disengagement		Child Involuntary Engagement		Child Involuntary Disengagement	
	β	ΔR	β	ΔR	β	ΔR	β	ΔR	β	ΔR
Step 1		.01		.03		.10		.04		.09
Sex	.06		.18		.33		-.16		-.28	
Age	.06		-.01		.05		.06		-.17	
Step 2		.08		.14		.05		.13		.11
PC	.21		.11		-.22		.03		-.26	
SC	.18		.21		.22		-.26		-.23	
DIS	.04		-.18		-.03		.22		-.08	

Note: PC = Primary Control SC = Secondary Control DIS = Voluntary Disengagement * $p < .05$

Table 6

Father Involuntary Responses to Stress at Wave 1 Predicting Child Coping at Wave 1

Predictors	Child Primary Control Engagement		Child Secondary Control Engagement		Child Voluntary Disengagement		Child Involuntary Engagement		Child Involuntary Disengagement	
	β	ΔR	β	ΔR	β	ΔR	β	ΔR	β	ΔR
Step 1		.01		.03		.10		.04		.09
Sex	.06		.18		.33		-.16		-.28	
Age	.06		-.01		.05		.06		-.17	
Step 2		.11		.09		.01		.07		.11
IE	-.12		-.26		-.09		.21		.22	
ID	-.31		-.13		.06		.13		.25	

Note: IE= Involuntary Engagement ID Involuntary Disengagement * $p < .05$

Table 7

Mother Voluntary Coping at Wave 1 Predicting Child Coping at Wave 2

Predictors	Child Primary Control Engagement		Child Secondary Control Engagement		Child Voluntary Disengagement		Child Involuntary Engagement		Child Involuntary Disengagement	
	β	ΔR	β	ΔR	β	ΔR	β	ΔR	β	ΔR
Step 1		.40**		.52**		.23**		.48**		.39**
Sex	.24*		-.15		.23		-.04		-.11	
Age	-.03		-.09		-.26*		.08		.23*	
Child W1	.58**		.72**		.25		.67**		.57**	
Step 2		.04		.15**		.02		.15**		.07
PC	.08		.19		-.02		-.18		-.16	
SC	.08		.06		-.15		-.03		-.03	
DIS	.24		.50**		-.05		-.49**		-.40*	

Note: PC = Primary Control SC = Secondary Control DIS = Voluntary Disengagement * $p < .05$ ** $p < .01$

Table 8

Mother Involuntary Responses to Stress at Wave 1 Predicting Child Coping at Wave 2

Predictors	Child Primary Control Engagement		Child Secondary Control Engagement		Child Voluntary Disengagement		Child Involuntary Engagement		Child Involuntary Disengagement	
	β	ΔR	β	ΔR	β	ΔR	β	ΔR	β	ΔR
Step 1		.40**		.52**		.23**		.48**		.39**
Sex	.24*		-.15		.23		-.04		-.11	
Age	-.03		-.09		-.26*		.08		.23*	
Child W1	.58**		.72**		.25		.67**		.57**	
Step 2		.01		.01		.05		.01		.00
IE	-.12		-.13		.24		.08		.07	
ID	.07		.08		-.11		-.08		-.02	

Note: IE= Involuntary Engagement ID Involuntary Disengagement * $p < .05$ ** $p < .01$

PARENTAL MODELING OF COPING STRATEGIES

Appendix A

Responses to Stress Questionnaire – Child Version

Items are organized by subscale. The original item numbers from the measure are listed below.

Primary Control Engagement

- 2. I try to think of different ways to change or fix the problem.
- 5. I let someone know how I feel.
- 14. I get help from other people when I am trying to figure out how to deal with my feelings.
- 16. I do something to try to fix the problem or take action to change things.
- 21. I get sympathy, understanding, or support from someone.
- 31. I do something to calm myself down.

Secondary Control Engagement

- 6. I decide I'm okay the way I am, even though I'm not perfect.
- 9. I realize that I just have to live with things the way they are.
- 19. I think about happy things to take my mind off the problem or how I am feeling.
- 22. I tell myself that things could be worse.
- 26. I think about all the things I'm learning, or something good that will come from the problem.
- 34. I tell myself that everything will be all right.
- 35. I think of ways to laugh about it so that it won't seem so bad.
- 36. I imagine something really fun or exciting happening in my life.

Voluntary Disengagement

- 3. I wish that I were stronger, smarter, or more popular so that things would be different.
- 11. I try not to think about it, to forget all about it.
- 15. I wish that someone would just come and get me out of the mess.
- 17. I try to stay away from people and things that make me feel upset or remind me of the problem.
- 28. I say to myself, "This isn't real."
- 39. I try not to feel anything.
- 37. I try to believe it never happened.
- 40. I act like it never happened.
- 41. I wish that the problem would just go away, that everything would work itself out.

Involuntary Engagement

- 1. I feel sick to my stomach or get headaches.

- 4. I keep remembering what happened or can't stop thinking about what might happen.
- 8. I get really jumpy.
- 13. I keep thinking about the problem when I try to sleep, or I have bad dreams about it.
- 20. I keep thinking about how I am feeling.
- 24. Right away I feel really angry, sad, scared, or worried.
- 27. I keep thinking about what I did or said.
- 30. I get upset by things that don't usually bother me.

Involuntary Disengagement

- 7. I just have to get away, I can't stop myself.
- 10. I just can't be near anything that reminds me of the situation.
- 12. I really don't know what I feel.
- 18. I don't feel like myself, it's like I'm far away from everything.
- 23. My mind just goes blank, I can't think at all.
- 25. It's really hard for me to concentrate or pay attention.
- 29. I end up just lying around or sleeping a lot.
- 33. I can't seem to get around to doing things I am supposed to do.

Responses to Stress Questionnaire – Adult Version

Items are organized by subscale. The original item numbers from the measure are listed below.

Primary Control Engagement

- 3. I try to think of different ways to change the problem or fix the situation.
- 7. I let someone know how I feel.
- 17. I ask other people for help or for ideas about how to make the problem better.
- 20. I let my feelings out.
- 21. I get help from other people when I'm trying to figure out how to deal with my feelings.
- 24. I do something to try to fix the problem or take action to change things.
- 32. I get sympathy, understanding, or support from someone.
- 45. I do something to calm myself down when I'm having problems
- 48. I keep my feelings under control when I have to, then let them out when they won't make things worse.

Secondary Control Engagement

- 8. I decide I'm okay the way I am, even though I'm not perfect.

- 13. I realize that I just have to live with things the way they are.
- 19. I tell myself that I can get through this, or that I'll do better next time.
- 29. I just take things as they are, I go with the flow.
- 30. I think about happy things to take my mind off the problem or how I'm feeling.
- 34. I tell myself that things could be worse.
- 36. I tell myself that it doesn't matter, that it isn't a big deal.
- 39. I think about the things I'm learning from the situation, or something good that will come from it.
- 43. I keep my mind off problems by doing something fun.
- 50. I tell myself that everything will be all right.
- 52. I think of ways to laugh about it so that it won't seem so bad.
- 54. I imagine something really fun or exciting happening in my life.

Voluntary Disengagement

- 1. I **try** not to feel anything.
- 5. I wish that I were stronger, smarter, or more popular so that things would be different.
- 9. I act like the problems never happened.
- 11. I deal with the problem by wishing it would just go away, that everything would work itself out.
- 15. I **try** not to think about it, to forget all about it.
- 23. I wish that someone would just come and get me out of the mess.
- 27. I **try** to stay away from people and things that make me feel upset or remind me of the problem.
- 41. When something goes wrong, I say to myself "This isn't real."
- 56. I try to believe it never happened.

Involuntary Engagement

- 2. When I have problems I feel sick to my stomach or get headaches
- 6. I **keep remembering** what happened or **can't stop thinking** about what **might** happen.
- 12. I get really jumpy when I'm having problems
- 18. When I'm having problems, I **can't stop** thinking about them when I try to sleep, or I have bad dreams about them.
- 25. Thoughts about the problems just pop into my head.
- 26. When I have problems, I feel it in my body.
- 31. When problems come up, I **can't stop** thinking about how I am **feeling**.
- 33. When problems happen, I **can't** always control what I do
- 37. When I have problems **right away** I feel really angry, sad, scared, or worried
- 40. When I have problems I **can't stop** thinking about what I **did or said**.
- 44. When problems come up, I get upset by things that don't usually bother me

- 47. When I'm having a problem, sometimes I act without thinking
- 51. When I have problems, I **can't stop** thinking about **why** they happened to me.
- 53. My thoughts start racing when I'm having a tough time.
- 57. When I have problems, sometimes I **can't** control what I do or say.

Involuntary Disengagement

- 4. When problems happen I don't feel anything at all, it's like I have no feelings.
- 10. I just **have** to get away when I have problems, I can't stop myself.
- 14. When I have problems, I just **can't** be near anything that reminds me of the situation
- 16. When problems come up I really don't know what I feel.
- 22. I **just can't** get myself to face the situation.
- 28. I don't feel like myself when I have problems, it's like I'm far away from everything.
- 35. My mind just goes blank when I have problems, I can't think at all.
- 38. It's really hard for me to concentrate or pay attention when I have problems.
- 42. When I'm having problems I end up just lying around or sleeping a lot.
- 46. I just freeze when I have a problem, I **can't** do anything.
- 49. When problems happen I can't seem to get around to doing things I'm supposed to do.
- 55. When a rough situation happens, I can get so upset that I can't remember what happened or what I did.