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The Impact of Economic Pressure on Parent Positivity, Parenting, and Adolescent Positivity into Emerging Adulthood

Tricia K. Neppl, PhD [Assistant Professor],

Dept. of Human Development and Family Studies, Iowa State University, 4389 Palmer Suite 2356, Ames, IA 50011; phone: 515-294-8502

Shinyoung Jeon [Masters Student],

Dept. of Human Development and Family Studies, Iowa State University, 0084 LeBaron Hall, Ames, IA 50011; phone: 515-294-3177

Thomas J. Schofield, PhD [Assistant Professor], and

Dept. of Human Development and Family Studies, Iowa State University,4389 Palmer Suite 1360, Ames, IA 50011; phone: 515-294-6914

M. Brent Donnellan, PhD [Associate Professor]

Department of Psychology, Michigan State University, 316 Physics Road, Room 252A, East Lansing, MI 48824; phone: 517-432-8392

Tricia K. Neppl: tneppl@iastate.edu; Shinyoung Jeon: syjeon@iastate.edu; Thomas J. Schofield: tommy@iastate.edu; M. Brent Donnellan: donnel59@msu.edu

Abstract

The current study describes how positivity can be incorporated into the Family Stress Model to explain resilience to disrupted family processes in the face of economic distress. Prospective, longitudinal data came from 451 mothers, fathers, and youth participating from their adolescence through early adulthood. Assessments included observational and self-report measures. Information regarding economic pressure, parental positivity, and parenting were collected during early adolescence, positivity was collected in late adolescence and emerging adulthood. Results indicated that economic pressure was indirectly associated with adolescent positivity through parental positivity. Economic pressure was negatively associated with parent positivity, whereas parental positivity was positively associated with parenting. Moreover, parental positivity and parenting were both related to positivity in adolescence. Results suggest that personal resources linked to a positive outlook can foster nurturant parenting, even in times of economic strain. Such parenting seems to positively influence adolescent development into emerging adulthood.

Keywords

economic pressure;	positive parent	ing; positivi	ity	

Economic pressure and hardship places families at risk for multiple disadvantages (Conger, Conger, & Martin, 2010). Studies show that children growing up under conditions of

economic hardship are at increased risk of behavioral problems (Evans, 2002), a decrease in social competence (Bolger, Patterson, Thompson, & Kupersmidt, 1995), and lower cognitive abilities (Gershoff, Aber, Raver, & Lennon, 2007). According to the Family Stress Model (e.g., Conger & Conger, 2002), parenting is a key mediator between the experience of economic hardship and child outcomes. Thus, factors that help promote positive parenting may serve as protective factors that help foster resilience in youth whose families experience economic stress. The present study is in a unique position to integrate the Family Stress Model with perspectives from the resilience literature to clarify the relationship among economic hardship, positive family processes, and youth outcomes over time.

The term resilience often refers to "the ability to withstand and rebound from disruptive life challenges" (Walsh, 2012, p. 399) and thus involves processes that help foster positive adaptation during times of significant adversity (Masten, Cutuli, Herbers, & Reed, 2009). In other words, resilience refers to developmental processes rather than intrinsic attributes of individuals. Nonetheless, individual characteristics have been implicated in the process of resilience such as self-regulatory skills, cognitive ability, and achievement motivations (see Masten, 2001). The identification of individual level factors is consistent with early research that focused on those individuals who thrived despite family dysfunction (Walsh, 2012). However, it might be useful to broaden this approach by taking a family systems orientation in which both individual characteristics and family resources are viewed as contributors to the processes of resilience. For example, the combination of individual or personal attributes (i.e., self-efficacy, self-worth, and hope)and family attributes such as supportive, high quality parenting may lead to positive adaptation to risk (Masten et al., 2009; Walsh, 2012). Indeed, earlier findings from the longitudinal study used for the present analyses (Conger & Conger, 2002) have demonstrated evidence of resilience-promoting processes such as selfconfidence and effective family problem-solving skills that seem to increase positive adaption to economic adversity.

The positive psychology movement (Seligman & Csikszentmihalyi, 2000) has renewed interest in optimal functioning and positive psychological outcomes, topics that were often closely identified with humanistic psychology. This movement within psychological science emphasizes that individual qualities and social interactions can help foster adaptation and resilience (Masten et al., 2009). As it stands, a number of personal characteristics such as the disposition to approach life with a positive outlook, optimism, self-efficacy, and a general sense of satisfaction with life seem to facilitate instrumental competence. This cluster of related attributes has been called positivity (see Caprara et al., 2012). Conger and Donnellan (2007) extended previous work on the determinants of parenting (e.g., Belsky, 1984) and suggested that personal characteristics might promote positive parenting, even in the face of adverse socioeconomic conditions. The current study tests some of those conceptual arguments by integrating positivity into a family process model related to resilience using longitudinal data.

An important conceptual question concerns the mechanism by which positivity should facilitate resilience in the face of economic challenges. One possibility draws on the insights offered by Patterson (2002). According to this perspective, the ability to attribute positive meanings to stressful situations is a key process related to family resilience. That is, how a

family successfully copes with adversity is related to subjective characteristics such as a sense of mastery and the evaluation of how difficult a stressful event will be. Such positive attributes may have so-called compensatory effects (Masten, 2001) whereby they help offset the risks associated with financial hardships. Thus, we propose that positivity may help individuals and their families interpret and cope with stressful conditions. However, relatively few studies have prospectively evaluated how parental positivity is related to family processes and adolescent development over time (Castro-Schilo et al., 2013). The present study addresses this gap by evaluating how parental positivity can be incorporated into the Family Stress Model to explain resilience to disrupted family processes in the face of economic distress.

Theoretical and Empirical Framework

Economic Pressure and its impact on the Family

The hypotheses for the current study derive from the Family Stress Model (FSM; Conger & Conger, 2002), a model originally designed to explain how financial adversity impacts families going through the agricultural economic recession in the late 1980s and since has extended to a range of economic situations and cultural contexts (see Conger et al., 2010). This theory proposes that economic pressure, defined as the perceived inability to pay for basic needs, the inability to make ends meet, and having to cut back on necessary expenses, leads to increased risk for parental distress. Parents who are distressed by their economic problems are unable to engage in developmentally supportive parenting practices marked by warmth, supportiveness, and involvement with their children. These kinds of impaired parenting behaviors, in turn, disrupt developmental outcomes for children. Consistent with the FSM, Mistry, Lowe, Benner, and Chien (2008) reported that mothers with difficulties affording basic needs had higher levels of distress which led to less parental control. This lack of control was related to decreases in adolescent positive behavior and increases in problematic behavior. Similarly, economic hardship was associated with lower self-esteem, higher distress, and less overall happiness in a long-term study of adolescents (Sobolewski & Amato, 2005).

Nonetheless, there is considerable variation in how families and children respond to economic hardship (Conger & Conger, 2002). Parents who are able to maintain their positive parenting skills, even in the face of adversity, might have children who are more resilient to the effects of economic pressure. Indeed, studies show that children raised by supportive parents are more likely to demonstrate greater psychosocial and academic competence (Neppl, Conger, Scaramella, & Ontai, 2009; Zhou et al., 2002). This raises interesting questions about the personal characteristics and resources that facilitate developmentally supportive parenting practices. Earlier findings from the ongoing longitudinal study used for the present analyses demonstrated that resilience to economic disparity was promoted by marital support and a sense of mastery(Conger & Conger, 2002). More recently, it was found that personal characteristics such as conscientiousness and low levels of neuroticism were important factors when considering how individuals and families adapt to challenging economic conditions (Donnellan, Conger, McAdams, & Neppl, 2009). Testing the FSM with a sample of Mexican-origin mothers, Taylor et al. (2012) found

that mothers who were more optimistic had fewer internalizing problems and demonstrated higher levels of nurturant and involved parenting. These positive parenting practices were associated with positive changes in their child's social development. Taken together, results of these studies highlight the important role for individual characteristics in the process of resilience to family economic hardship.

Positivity and Family Functioning

Positivity might be one kind of personal characteristic that facilitates adaptation and resilience to economic hardship. Positivity is a relatively enduring attribute defined as the dispositional tendency for an individual to view oneself, his/her life, and the future with confidence and a positive outlook. It is a higher-order construct that encompasses narrower constructs such as high levels of self-esteem, life satisfaction, and optimism that correspond to an individual's positive evaluation of his/her subjective experiences (Alessandri, Caprara, & Tisak, 2012; Caprara et al., 2012). These individual elements of positivity seem to contribute to functioning and developmentally important individual outcomes (see Caprara et al., 2012). For example, self-esteem or a high global self-regard (Harter, 1993) influences the development of important life outcomes such as relationship and job satisfaction, positive and negative affect, depression, and physical health (Orth, Robins, & Widaman, 2012). Optimism has been linked with better psychological adjustment, more constructive coping strategies, and even better physical health (e.g., Assad, Donnellan, & Conger, 2007; Carver, Scheier, & Segerstrom, 2010). Likewise, there is accumulating evidence that happiness and positive affect might lead to success in a range of critical outcomes such as close relationships, health, and success in the agentic contexts of life like work (Lyubomirsky, King, & Diener, 2005). In general, individuals who readily experience positive affect, display optimism, have a sense of self-confidence and mastery seem to have better life outcomes, consistent with our claim about the potential importance of positivity for family functioning, even in the face of adversity.

In light of such general findings about positivity, we propose that positively oriented individuals should be better at dealing with stressors such as economic pressure as well as the challenges of parenthood. Indeed, Taylor, Larsen-Strife, Conger, Widaman, and Cutrona (2010) found that optimistic mothers demonstrated greater resilience to the negative impact of economic stress. In terms of parenting, Brody, Murry, Kim, and Brown (2002) found that mothers with high levels of self-esteem along with a more optimistic outlook on life were more likely to display competence-promoting parenting. These parenting behaviors, in turn, predicted child psychological adjustment. More recently, Castro-Schilo et al. (2013) found that optimistic mothers and fathers displayed more positive parenting, which was associated with their child's social competence. This work highlights the importance of examining models that include both mothers and fathers, as previous studies have often focused exclusively on mothers.

Besides the proposition that positivity might relate to parenting, it is possible that parents may play a significant role in the development of adolescent positivity. Schofield et al. (2012) examined the degree to which positive parental characteristics and positive parenting were associated with positive characteristics of adolescents. They found that positive

parental characteristics and positive parenting both predicted later adolescent positive characteristics. Moreover, there was an indirect relationship between parental positive characteristics and adolescent positive characteristics through positive parenting practices (Schofield et al., 2012). In other words, parenting seemed to be one conduit by which characteristics of parents were associated with the characteristics of their children.

The Present Investigation

The present investigation evaluated how parental positivity was related to observed parenting practices in the face of economic distress. We used data from a two-decade longitudinal study of a cohort of focal individuals and their families followed from their adolescence to adulthood. We measured family economic pressure, parental positivity, and positive parenting when the focal youth were in early adolescence. The positivity of the focal youth was then measured in late adolescence and emerging adulthood. This allows us to test longitudinal relations between parenting and youth outcomes. This is an important feature of the current study as relatively few studies have tested the associations between economic hardship, positivity, and parenting on adolescent development into early adulthood. In addition, whereas there is a tendency for previous developmental studies to primarily focus on mothers, we include both mothers and fathers in the current analyses (see also Castro-Schilo et al., 2013).

All told, the current study was designed to test the conceptual model depicted in Figure 1. There are at least two features of Figure 1 worth emphasizing. First, we test the prediction that parental positivity is related to positive parenting and the development of positivity in offspring during adolescence and emerging adulthood. We expected that mothers' and fathers' positivity would promote observed positive parenting which, in turn, would be related to adolescent positivity. Furthermore, we predicted that the adolescents' positivity would be directly associated with their positivity in emerging adulthood. Second, within the same model, we also tested whether life experiences in the form of economic pressure can act to diminish positivity by considering the impact of economic pressure on parental positivity. This prediction follows from recent theorizing about transactional associations between economic pressures and personal characteristics (e.g., Conger & Donnellan, 2007). Accordingly, we expected that economic pressure would be negatively related to parental positivity. The basic idea is that individual characteristics and life circumstances develop in concert through mutual influence processes. In the current study we thus suggest that positivity itself might be impacted by economic conditions.

Method

Participants

Data come from the Iowa Youth and Families Project (IYFP). In the IYFP, data from the family of origin (N=451) were collected annually from 1989 through 1992. Participants included the target adolescent (52% female), his/her parents, and a sibling within four years of age of the target adolescent. These two-parent families were originally recruited for a study of family economic stress in the rural Midwest. When interviewed in 1989, the target adolescent was in seventh grade (\underline{M} age = 12.7 years; 236 females, 215 males). Participants

were recruited from both public and private schools in eight rural Iowa counties. Due to the rural nature of the sample there were few minority families (approximately 1% of the population); therefore, all of the participants were Caucasian. Seventy-eight percent of the eligible families agreed to participate. The families were primarily lower middle- or middle-class. In 1989, parents averaged 13 years of schooling and had a median family income of \$33, 700. Families ranged in size from four to 13 members, with an average size of 4.94 members. Fathers' average age was 40 years, while mothers' average age was 38. In 1994, the families from the IYFP continued in another project, the Family Transitions Project (FTP). The same target adolescents participated in the FTP in order to follow their transition into adulthood. Beginning in 1995, the target adolescent (one year after completion of high school) participated in the study with his/her romantic partner. The FTP has followed the target youth from as early as 1989 through 2007 (M target age = 32 years), with a 90% retention rate.

The present study includes targets who participated from adolescence through early adulthood. The data were analyzed at the three developmental timepoints. The first was when the target adolescent was 13 years old (1989). The second period was during late adolescence when the target was 18 years old (1994). Finally, the last timepoint occurred when the target was in emerging adulthood at age 21 years (1997).

Procedures

When the target was an adolescent, all families of origin were visited twice in their homes each year by a trained interviewer. Each visit lasted approximately two hours, with the second visit occurring within two weeks of the first visit. During the first visit, each family member (mother, father, target adolescent, and sibling closest in age to the target) completed questionnaires pertaining to subjects such as individual characteristics and parenting. During the second visit, family members participated in structured interaction tasks that were videotaped. In the present analyses, observer ratings from the parent-adolescent discussion task were used. This task involved the adolescent and his or her parents engaging in a conversation about family rules, events, and problems which lasted 30 minutes. Trained observers coded the quality of these interactions using the Iowa Family Interaction Rating Scales (Melby et al., 1998) which have been shown to demonstrate adequate reliability and validity (Melby & Conger, 2001).

Beginning in 1995 the target adolescents, now adults, participated in data collection. Each target adult was visited biennially in their home by trained interviewers. During that visit, these adults completed a series of questionnaires on topics such as individual characteristics and coping. The means and standard deviations for all study variables are provided in Table 1.

Measures

Family economic pressure in early adolescence

Economic pressure was measured as a latent construct with three indicators: unmet material needs, can't make ends meet, and financial cutbacks (Conger & Conger, 2002). Each indicator for economic pressure was collected in 1989 when the adolescent was 13 years old.

Unmet material needs included six items asking both parents of the adolescent whether they had enough money to afford their home, clothing, furniture, car, food, and medical expenses. Each item ranged from 1 = strongly agree to 5 = strongly disagree. All items were summed for each parent, then averaged across mother and father responses with an alpha coefficient of .89.

The second indicator for economic pressure was not being able to make ends meet. This included asking both parents whether they had difficulty paying their bills (1 = a great deal of difficulty to 5 = no difficulty at all) and how much money they have left at the end of each month (1 = more than enough money left over to 4 = not enough to make ends meet). The first item was reverse coded and then both items were standardized and summed together for each parent, then averaged across mother and father responses. The correlation between the two items was .73.

The last indicator, financial cutbacks, consisted of 17 items which asked both parents whether they had made significant financial cutbacks in the past 12 months. Questions included items such as postponing medical or dental care, changing food shopping or eating habits to save money, and taking an extra job to help meet expenses. Each item was answered by 1 = yes or 0 = no. All items were summed together for each parent, then averaged across mother and father responses with adequate internal consistency (alpha = . 91).

Parental positivity in early adolescence

Maternal and paternal positivity was measured as a latent construct with three separate indicators: mastery, self-esteem, and positive emotion. Each indicator for parental positivity was collected in 1989 when the adolescent was typically 13 years old. For mastery (Perlin, Lieberman, Menaghan, & Mullan, 1981), each parent reported on how strongly they agreed with seven statements about themselves such as, "There is no way I can solve some of the problems I have, I often feel helpless in dealing with the problems in my life, and sometimes I feel that I am being pushed around in life." The above responses were on a five point scale, ranging from strongly agree to strongly disagree. All items were averaged together and coded to indicate high levels of self-mastery. Scores were internally consistent for both mothers (alpha = .77) and fathers (alpha = .75).

The second indicator for parental positivity was Rosenberg's (1965) self-esteem scale which included questions such as, "I am inclined to feel that I'm a failure, I do not have much to be proud of, and I feel useless at times." Responses ranged from 1 = strongly agree to 5 = strongly disagree. A total of 10self-reported items were combined for mothers (alpha = .88) and fathers (alpha = .85). All items were averaged and coded in order to reflect a high level of self-esteem.

The last indicator for positivity was the positive emotion scale from the NEO Personality Inventory (Costa & McCrae, 1985). Mothers and fathers were asked whether they had ever literally jumped for joy, were considered to be "light-hearted", and used words like "fantastic" or "sensational" to describe experiences. A total of 10 items were used ranging from 1 = strongly agree to 5 = strongly disagree. All items were averaged and coded to

indicate high levels of positive emotions. Scores were internally consistent for both mothers (alpha = .81) and fathers (alpha = .78).

Positive parenting in early adolescence

Observer ratings were used to assess each parent's warmth, communication, listener responsiveness, assertiveness, and prosocial behavior toward the target youth as well as the relationship quality between the parent and his/her adolescent during the family discussion task. Data on the discussion task was collected in 1989 when the adolescent was 13 years old. Each rating was scored on a 9-point scale, ranging from low (no evidence of the behavior) to high (the behavior is highly characteristic of the parent). Each scale was used as a separate indicator for the latent construct. Warmth measures appreciation, praise, care, concern, or support for the adolescent. Communication entails the use of reason, explanation, and solicitation of the adolescent's point of view in a neutral or positive manner. Listener responsiveness involves attending to and validating the verbalizations of the adolescent through the use of nonverbal and verbal assents. Assertiveness measures the manner and style of presentation in terms of expressing oneself confidently and positively, while exhibiting patience with the responses of the youth. Prosocial behavior is the extent to which the parent relates effectively to his/her adolescent. It includes cooperation, sensitivity, helpfulness, and willingness to change behavior for the adolescent. Relationship quality measures a warm, open, happy, and emotionally satisfying relationship between the parent and adolescent.

During the family discussion task, parents and their adolescents discussed questions from a series of cards labeled specifically for either the parent or the teenager. Parents and children took turns reading questions related to subjects such as school activities, family rules, and parental discipline. The person reading the card was instructed to read each question out loud and give his or her answers first. The rest of the family members were instructed to give their individual answers next and then everyone discussed together about the answers that were given. They were to go on to the next card once they felt they had said everything they wanted to about each question. Scores were averaged across each parent and were internally consistent (alpha = .88 for mother; alpha = .90 for father) and demonstrated acceptable inter-rater reliability (.94).

Positivity in late adolescence

Adolescent positivity was assessed through self-report in 1994 when the target was, on average, 18 years old. Positivity was measured as a latent construct with four indicators: mastery, self-esteem, life satisfaction, and coping. Adolescent mastery and self-esteem were assessed with the same measures as used with their parents. Mastery (Perlin, et al., 1981) was assessed with seven items measured on a five point scale ranging from strongly agree to strongly disagree. Item responses were averaged (alpha = .83). Adolescents also completed Rosenberg's (1965) self-esteem scale. Responses ranged from 1 = strongly agree to 5 = strongly disagree. A total of 10 items were averaged together (alpha = .90).

Life satisfaction (adapted from Diener, Emmons, Larsen, & Griffin, 1985) included five items, which asked whether the adolescent was satisfied with his/her life the way it is, if

he/she was happy with the way things were in his/her life, if he/she would relive his/her life in the same way, whether he/she had gotten the important things in life that he/she wanted, and if his/her life was close to ideal. Each item ranged from 1 = strongly disagree to 5 = strongly agree and were averaged together (alpha = .86).

Coping (Conger, 1993) consisted of four items asking the adolescent when he/she had a problem, how much does he/she try to figure out the cause and do something about it, try to forget about it, try to do things that will keep him/her from thinking about it, and try to talk to other people about it. Each item ranged from 1 = strongly disagree to 5 = strongly agree. All items were coded to indicate high levels of coping and averaged (alpha = .50).

Positivity in emerging adulthood

Positivity when the adolescents were in emerging adulthood was assessed through self-report in 1997 at an average age of 21 years. Positivity was measured as a latent construct with four indicators: mastery (alpha = .83), self-esteem (alpha = .90), life satisfaction (alpha = .82), and coping (alpha = .54). All indicators were assessed with the same measures used in late adolescence.

It should be noted that for parent positivity, Mastery, Self-Esteem, and Positive Emotions were used as measures in the model. For adolescents and young adults, Mastery, Self-Esteem, and Life Satisfaction and Coping were used. We included Positive Emotions for parents because Life Satisfaction and Coping was not available in the early years of the study. However, we believe that both the adolescent and parent constructs reflect the higher-order construct of positivity. For example, the Positive Emotions scale and the Satisfaction with Life Scale are correlated (Schimmack, Oishi, Furr, & Funder, 2014). In fact, the Positive Emotion NEO facet scale is the strongest Extraversion-related correlate of Life Satisfaction.

Control variables

The control variables included parent per capita income, mother and father education (0 = kindergarten to 20 = education beyond a master's degree), and adolescent gender (0 = male), 1 = female).

Results

Structural Equation Models

We used Mplus Version 7 (Muthén & Muthén, 2012) to estimate each model using full information maximum likelihood estimation (Allison, 2003) rather than deleting cases with any missing data. We went through a series of nested model tests (see Table 2), and settled on the most appropriate model based on statistical and conceptual grounds. For example, Model 1a allows all seven factors to correlate freely and freely estimates all factor loadings separately for mothers and fathers. Model 1b tests whether mother and father latent variables can be constrained to have equivalent measurement models. Model 1c tests our primary hypotheses by trimming the structural model, allowing only within-time correlations and paths predicted by our theoretical model. Model 1d tests whether the hypothesized paths

differ in magnitude between mothers and fathers. For example, the regression weight of the paths from mother parenting to adolescent positivity was constrained to the same values as the regression weights associated with the paths from father parenting to adolescent positivity. In the interests of parsimony, Model 1e sets to zero all nonsignificant paths. Based on the nonsignificant drop in fit for each of these models, Model 1e was selected as the final and most parsimonious representation of study findings. We initially examined the possible moderating role of adolescent gender on these associations by fitting these models in a multiple-group framework. Because none of the structural paths varied significantly by adolescent gender, what follows are results based on the overall sample. In other words, we found no compelling evidence that adolescent gender moderated the associations in question.

Information regarding the measurement model from Model 1e is presented in Table 2. Standardized loadings of manifest indicators onto latent factors ranged from .41 to .96 (see Table 1 for all factor loadings). For example, standardized loadings for the three indicators of economic pressure were .79 for 'unmet material needs,' .88 for 'can't make ends meet,' and .78 for 'financial cutbacks.' As loadings for parent positivity and positive parenting were equated across parents in Model 1b (see Table 2), the unstandardized loading are equal for mothers and fathers.

Correlations among the seven latent factors derived from Model 1e are presented in Table 3. Economic pressure was negatively correlated with adolescent positivity (r= -.16, p< .05). Parent positivity was positively correlated with positive parenting (r = .14, p< .05 for fathers; r = .17, p< .05 for mothers) and adolescent positivity was positively correlated with parent positivity (r = .09, p< .05 for fathers; r = .18, p< .05 for mothers). In addition, adolescent positivity was positively correlated with positivity during early adulthood (r= .67, p< .05).

Figure 2 contains the paths and coefficients associated with Model 1e, with within-time correlations among latent variables omitted from the figure for the sake of clarity. Although the correlation between economic pressure and adolescent positivity was statistically significant, it became nonsignificant after accounting for the associations between parent variables and adolescent positivity. Instead, economic pressure was indirectly associated with adolescent positivity through parent positivity (b = -.04, 95% CI: -.16 to -.03).

Economic pressure was associated with parent positivity (β = -.35, SE = .04), which was in turn associated with positive parenting (β = .15, SE = .04). Adolescent positivity was predicted by both parent positivity (β = .12, SE = .04), as well as positive parenting (β = .07, SE = .03). Because of the constraints mentioned previously, the coefficients were equal for mothers and fathers. Adolescent positivity was associated with later positivity in emerging adulthood (β = .67, SE = .03). There was a direct association from economic pressure to positivity in emerging adulthood (β = -.10, SE = .04). The model was also tested with the inclusion of economic pressure during late adolescence, using the same constructs as indicators of economic pressure as were used for the early adolescent variable. Results showed that economic pressure during early adolescence was related to economic pressure during late adolescence (β = .79, p < .001) pointing to the consistency of economic

conditions across time. In addition, neither mother nor father positivity was associated with late adolescent economic pressure suggesting that positivity did not exacerbate or attenuate economic conditions for the G1 parents. In terms of control variables, father positive parenting was related to father education (β =.20, SE = .05) and mother education (β =.12, SE = .05). Mother positive parenting was related to mother education (β =.25, SE = .05).

Discussion

This investigation evaluated how parental positivity can be incorporated into the Family Stress Model to test how this latent personal characteristic was associated with positive parenting and the development of adolescent positivity in the context of economic pressure. Our model is broadly consistent with the family resilience framework which indicates that both individual attributes and family resources help promote positive adaptation to adversity or resilience. This study therefore adds to the sparse literature that has examined the role of parental positivity within the context of economic pressure, positive parenting, and positive youth outcomes.

As hypothesized, parental positivity and positive parenting during early adolescence were related to late adolescent positivity, which was related to positivity during emerging adulthood. Moreover, family economic pressure as experienced in early adolescence was significantly associated with adolescent positivity five years later although this direct relationship was no longer significant after accounting for the associations between the other variables in the model. This suggests that economic pressure was indirectly associated with adolescent positivity through mother and father positivity. The analyses also revealed that economic pressure was negatively associated with parent positivity, a finding consistent with recent transactional models suggesting that economic conditions and personal characteristics are often reciprocally related in a dynamic developmental process (Conger & Donellan, 2007).

Altogether, the current results support the notion that the combination of individual and family resilience processes lead to positive adaptation to risk. Specifically, we found that parental positive attributes are associated with positive parenting which seems to facilitate adolescent positive adaptation into young adulthood. Consistent with insights in Patterson (2002), the current findings suggest that if parents have the personal resources to cope in the face of economic pressure, they may be able to maintain positive parenting skills that lead to positive outcomes for adolescents over time. The results also replicate and extend previous studies examining the effects of positive parental disposition on positive parenting and child outcomes (Brody et al., 2002; Castro-Schilo et al., 2013; Taylor et al., 2010; Taylor et al., 2012). In particular, the current study helps to expand previous studies that have often focused exclusively on mothers to show that path coefficients are essentially identical for both mothers and fathers. This attests to a similarity in parenting processes for mothers and fathers and further underscores the importance of examining models that include both mothers and fathers in family research.

It is worth emphasizing that these results suggest that adolescents who have positive parents may be more likely to develop a similar positive disposition themselves. Research shows

that optimistic and positive individuals have better psychological adjustment to stressful life circumstances (Carver et al., 2010). Thus, children who are exposed to parents who maintain a positive outlook may be more likely to display a similar level of positivity. This positivity may in turn help adolescents adapt to future challenges and stressful life events such as future exposure to economic pressure. This idea highlights the utility of taking a developmental approach to understanding those personal characteristics implicated in the processes that facilitate resilience.

We should also acknowledge that there are alternative explanations for some of the present findings. The first is the possibility that shared genetic factors between parents and offspring helps to explain some of the observed associations. Genetic factors might be passed directly from parent to offspring. Indeed, in a sample of twins, results from a multivariate genetic analysis revealed that a common genetic factor explained the covariation between self-esteem, life satisfaction, and optimism (Caprara et al., 2009). Likewise, genetically influenced individual differences of adolescents might elicit certain kinds of parenting practices thereby modifying the direction of influence in Figure 1. Thus, future research should explore the genetic influence of both parents and children in the context of economic pressure, parenting, and child outcomes.

There are several limitations to this study worthy of comment. First, the data are correlational. In order to provide a more adequate test of model effects, quasi-experimental or experimental data are needed. One option would be to directly intervene to promote positive personal characteristics to see if this generates subsequent changes in parenting and adolescent outcomes. Second, the lack of racial, ethnic, and geographic sample diversity may limit the generalizability of results. The results are encouraging, however, as they are consistent with results from a study using a more diverse sample (Taylor et al., 2012). Finally, future research should include early adolescent measures of positivity which would provide a more stringent test of associations between early adolescent parenting and later child characteristics. We were limited in our ability to incorporate such measures in the current study because all of the indicators of positivity were not available at earlier waves.

In closing, the current results suggest that a positive orientation may contribute to those parenting practices that seem to be associated with the development of adolescent positive development even into early adulthood. In short, positivity might be a personal characteristic that serves as an adaptive resource for those parents dealing with economic problems. This is an important insight with potential applied implications. It seems reasonable that prevention and intervention programs designed to promote healthy development should draw on the research evidence that identifies factors that contribute to resilience and effective family functioning (Masten et al., 2009). Thus, the current study suggests that efforts to bolster positivity might be worthwhile. Moreover, the current results hint at the possibility that efforts to enhance parental positivity might contribute to the development of positivity in the next generation. These kinds of basic research findings can motivate clinicians and policy makers to use and develop effective educational and preventive interventions designed to promote positivity.

Indeed, there are current interventions designed to promote positivity. For example, programs that utilize the family resilience framework target key processes such as having a positive outlook and providing parental nurturance during times of stress (Walsh, 2012) or the use of positive psychotherapy which teaches people who are at risk to be positive (see Seligman, Rashid, & Parks, 2006). By increasing positivity and supportive parenting, the present findings illustrate that such intervention efforts may help to foster long lasting positive developmental outcomes for adolescents exposed to economic hardship. The current results hint that an emphasis on accentuating positive personal characteristics might be one viable path toward a positive adaptation in the face of economic adversity. On the other hand, we emphasize that positivity is but one angle for interventions and that more direct antipoverty programs are also important avenues for helping families cope with economic adversity. This is consistent with our findings that economic pressure is negatively associated with positivity, thereby suggesting that socioeconomic conditions might negatively impact those personal characteristics that facilitate personal resilience. In other words, direct efforts to alleviate economic pressure might also help foster positivity. Moreover, we found no indication that parental positivity was associated with future economic pressure in a set of supplementary analyses suggesting that a more potent pathway is probably from economic pressure to parental positivity rather than the other way around. In short, there is no single solution for addressing the complex issues facing families in economic crisis but the current work suggests that positivity is one consideration because it appears to foster positive parenting in the face of adversity.

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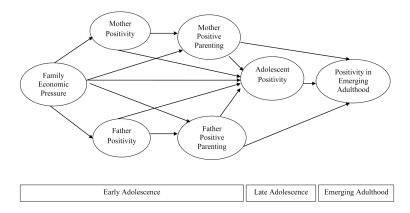


Figure 1. Conceptual Model

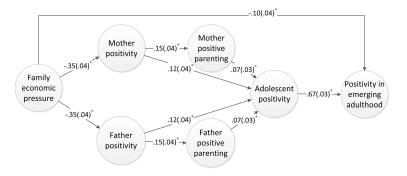


Figure 2. Coefficients from Model 1e Note. *p < .05

 $\label{thm:continuous} \begin{tabular}{ll} \textbf{Table 1} \\ \textbf{Descriptive Statistics for Study Variables (N = 451)} \\ \end{tabular}$

Variables	М	SD	λ	Std. λ
Economic Pressure				
Cut backs	5.18	3.81	.52	.79
Material needs	14.69	4.12	.60	.88
Ends meet	.00	1.65	.51	.78
Parental Positivity				
Father mastery	3.81	.53	.37	.72
Father self-esteem	4.02	.51	.42	.86
Father positive emotion	3.57	.53	.31	.61
Mother mastery	3.78	.56	.37	.71
Mother self-esteem	3.97	.57	.42	.81
Mother positive emotion	3.80	.56	.31	.62
Observed Parenting				
Father positive parenting	2.95	.61	.63	.96
Mother positive parenting	3.15	.56	.63	.96
Adolescent Positivity				
Mastery	3.89	.64	.53	.84
Self-esteem	3.93	.66	.62	.95
Life satisfaction	.80	.21	.40	.55
Coping skills	3.60	.55	.25	.46
Emerging Adult Positivity	,			
Mastery	3.92	.63	.53	.83
Self-esteem	3.99	.67	.62	.92
Life satisfaction	3.40	.76	.40	.52
Coping skills	3.72	.59	.25	.41
Control Variables				
Parent per capita income	37698.9	25795.2	-	-
Father education level	13.48	2.13	-	-
Mother education level	13.28	1.65	-	-

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Table 2

Comparisons of Fit Between Nested Models

Model	× ₂	ф	RMSEA	χ^2 df RMSEA CI TLI χ^2 df p	TLI	χ^{2}	ф	þ
1a. 7-factor model, factors freely correlated	280.5 158	158	.038	.031045 .941	.941	,		
1b. Model 1a, with constraints in Λ	290.3	166	.037	.030044 .943 9.8 8	.943	8.6	∞	.28
1c. Model 1b, with restricted pattern of regression weights in ${\it B}$	298.9 173	173	.036	.029043 .945 8.6 7	.945	8.6	7	.27
1d. Model 1c, with invariance of regression weights across parents in ${\cal B}$	303.9 179	179	.035	.028042 .947 5.0 5	.947	5.0	5	4.
1e. Model 1d, setting to zero nonsignificant weights in B	309.1 182	182	.035	.029042 .947 5.2 5 .39	.947	5.2	5	.39

Note. RMSEA = root mean square error of approximation; CI = confidence interval of the RMSEA value; TLI = Tucker-Lewis index; χ 2 = change in chi-square from the immediately preceding model; df = change in degrees of freedom from the immediately preceding model; p = probability associated with the $\chi 2$ value. Page 19

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Table 3

Correlations between the Latent Variables Used in Analyses

Study constructs	1	7	3	4	S)	9	7	∞	6	10
1. Economic pressure										
2. Paternal positivity	.35*	1								
3. Maternal positivity	.33*	60.								
4. Father positive parenting	13*	*41:	80.							
5. Mother positive parenting	16*	.02	.17*	*74.						
6. Adolescent positivity	16*	60:	.18	.16*	.07					
7. Emerging adult positivity	*61	60.	.16*	.01	04	*67	,			
8. Parent per capita income	51*	.24	⁷ 60.	.12*	.15*	.01	80.	1		
9. Father education level	25*	.15*	80.	.28*	*41.	.10*	80.	.25*		
10. Mother education level	26*	,00°	.18*	.21*	.25*	.12*	$.10^{\dagger}$.32*	*94.	
11. Adolescent gender	90:-	.01	.03	04	04	05	03	.01	90.	.02

Note. $\uparrow p < .10,$ * p < .05

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