

Relationships between maternal beliefs and reactions to children's negative emotions

Nilton C. dos Anjos Filho¹, Patrícia Alvarenga¹ and Carmem Beatriz Neufeld²

¹ Institute of Psychology, Federal University of Bahia (Universidade Federal da Bahia [UFBA])

² Department of Psychology, Faculty of Philosophy, Sciences and Letters of Ribeirão Preto, University of São Paulo (Universidade de São Paulo [USP])

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Authors' notes

Nilton C. dos Anjos Filho  <https://orcid.org/0000-0002-4901-2198>

Patrícia Alvarenga  <https://orcid.org/0000-0001-9079-4956>

Carmem Beatriz Neufeld  <https://orcid.org/0000-0003-1097-2973>

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Correspondence concerning this article should be addressed to a Nilton Correia dos Anjos Filho, Rua Aristides Novis, 197, Estrada de São Lázaro, Salvador, BA, Brazil. CEP 40210-730. *E-mail:* niltoncorreia_15@hotmail.com

Abstract

This study investigated relationships between maternal beliefs and responses to children's negative emotions. Thirty-three mothers with children aged between 6 and 7 years completed the Parents' Beliefs about Children's Emotions Questionnaire and the Coping with Children's Negative Emotions Scale. The analyses revealed that beliefs in the cost of positivity concerning the potential harm of positive emotions explained 18% of the variance in non-supportive reactions to children's expressions of negative emotions. Beliefs in the value of anger, regarding the recognition of its importance, explained 9% of the variance in supportive reactions to children's emotional expressions. Maternal cognitions regarding the value of positive and negative emotions help explain the mothers' behaviors toward children's emotional expressions. Therefore, encouraging parents to understand the role of emotions in child development is essential to promote effective parenting practices.

Keywords: parents' beliefs, emotion socialization, emotions, Theory of Modes, maternal practices

RELAÇÕES ENTRE CRENÇAS E REAÇÕES MATE- RNAS ÀS EMOÇÕES NEGATIVAS DOS FILHOS

Resumo

Este estudo investigou relações entre crenças e reações maternas às emoções negativas dos filhos. Trinta e três mães com crianças entre 6 e 7 anos de idade preencheram o Questionário de Crenças Parentais sobre as Emoções das Crianças e a Escala de Reações Parentais às Emoções Negativas dos Filhos. As análises mostraram que as crenças no custo da positividade, referentes ao potencial prejuízo que emoções positivas podem causar, explicaram 18% da variância nas reações não apoiadoras da expressão de emoções negativas dos filhos. As crenças no valor da raiva, relacionadas ao reconhecimento da importância dessa emoção, explicaram 9% da variância nas reações que apoiam a manifestação emocional infantil. As cognições maternas acerca do valor de emoções positivas e negativas ajudam a explicar o comportamento materno diante da expressão emocional dos filhos. Incentivar nos pais a compreensão das funções das emoções no desenvolvimento infantil é crucial para promover práticas parentais eficazes.

Palavras-chave: crenças parentais, socialização emocional, emoções, Teoria dos Modos, práticas maternas

RELACIONES ENTRE CREENCIAS Y REACCIONES MATE- RNAS A EMOCIONES NEGATIVAS DE NIÑOS

Resumen

Este estudio investigó las relaciones entre creencias y reacciones maternas a las emociones negativas de los niños. Treinta y tres madres con hijos de 6-7 años respondieron el Cuestionario de Creencias sobre las Emociones de los Niños y la Escala de Reacciones Parentales a las Emociones Negativas de los Hijos. Los análisis mostraron que las creencias sobre el costo de la positividad, que se refieren al daño potencial que pueden causar las emociones positivas, explicaron el 18% de la varianza en las reacciones que no apoyan la expresión de emociones negativas de los niños. Las creencias sobre el valor de la ira, relacionadas al reconocimiento de la importancia de esta emoción, explicaron el 9% de la varianza en las reacciones que apoyan la expresión emocional de los niños. Las cogniciones maternas sobre el valor de las emociones positivas y negativas ayudan a explicar la conducta de las madres hacia la expresión emocional de los niños. Estimular los padres a comprender el papel de las emociones en el desarrollo infantil es fundamental para promover prácticas parentales eficaces.

Palabras clave: creencias de los padres, socialización emocional, emociones, Teoría de Modos, prácticas maternas

Eisenberg et al. (1998) developed a heuristic theoretical model that defines emotion socialization as a process through which parents teach children to understand, express, and regulate their emotions and cope with other people's emotions. Since the proposed model, predictors of parenting practices concerning emotion socialization, relationships with childhood developmental outcomes, and mediation and moderation processes have been investigated (Eisenberg, 2020).

Specifically, emotion socialization may occur through different mechanisms and contexts, such as through the parents' responses to their children's emotions, particularly negative emotions, such as anger, frustration, sadness, and fear. According to Fabes et al. (2002), supportive responses are those that validate a child's emotion, seeking to reassure and help them understand what triggered it and find potential solutions for the problem, promoting the development of socioemotional competence (Havighurst & Kehoe, 2017). In turn, unsupportive responses invalidate, minimize, punish, or ignore a child's emotions and reveal the parents' discomfort when dealing with their children's emotional manifestations (Fabes et al., 2002). These practices do not promote emotional understanding or self-regulation and are correlated with externalizing and internalizing behavior problems among children (Havighurst & Kehoe, 2017).

Many factors affect the responses of parents when dealing with their children's emotional expressions, among which parental beliefs regarding children's emotions (Eisenberg et al., 1998; Halberstadt et al., 2013). Beliefs influence parents' responses, interactions, and how they express emotions. They may also reflect on less aware behaviors and attitudes that permeate routine interactions between parents and children (Eisenberg et al., 1998; Garrett-Peters et al., 2017).

When considering the effects of parental beliefs on child development, Gottman et al. (1996) developed the Parental Meta-Emotion Philosophy (PMEP). The authors propose an organized set of feelings and thoughts that parents have regarding their emotions and those of their children, which would configure parental meta-emotion philosophies or styles. According to the PMEP, both the parents' emotional and behavioral processes involving parenting influence children's emotional regulation. Therefore, parents who value their children's negative feelings understand that the situations that trigger a child's emotions are opportunities to get closer and support their child's development. These parents are more likely to be responsive, provide guidance and encourage emotional expressions than parents who do not value their children's feelings (Gottman et al., 1996). Katz et al. (2012) conducted a review and verified that parents with this meta-emotion style are more aware of their children's and their own emotions, especially low-intensity ones. Additionally, they generally validate and help their children to name feelings, understand what triggers them, and solve their problems, discussing objectives and strategies to cope with the situation that triggered a given emotion.

Later, studies corroborated the association between parental beliefs regarding the relevance of children's negative feelings and practices that support children's emotional expression. For instance, mothers who value positive and negative feelings more frequently express

supportive responses to their children's negative feelings (MacCormack et al., 2020). Mainly, beliefs that value the expression of anger among children were more positively correlated with supportive responses to children's negative feelings (Thomassin & Seddon, 2019; Halberstadt et al., 2013).

Lozada et al. (2016) assessed a specific type of parental response: encouraging children to express feelings. The authors found positive correlations between beliefs that value a child's expression of negative emotions and encouraging children to express this same type of feelings. However, Parker et al. (2012) reported that, even though parents with these beliefs value this emotional manifestation, they believe children should control their emotions and express them appropriately and in a socially acceptable manner. It is a relevant piece of information because specificities concerning the expression of negative emotions may influence parenting practices toward emotion socialization.

In turn, parents who believe that feelings, especially the negative ones, are potentially troublesome or harmful tend to ignore, punish, or deny their children's emotional expressions (Gottman et al., 1996; Halberstadt et al., 2013). The children's negative feelings often cause distress in these parents due to the notion that they may be painful and potentially harmful. It means that parents who hold this belief tend to present unsupportive responses when their children express emotions or try to rapidly modify their children's emotions (Gottman et al., 1996; Garrett-Peters et al., 2017).

Parents may also believe that a child's positive feelings, such as joy, enthusiasm, or expressions of love, may have negative consequences by rendering children "out of control" or more vulnerable to suffering (Garrett-Peters et al., 2017). According to Halberstadt et al. (2013), these beliefs align with the notion that feelings are dangerous or troublesome and they are referred to in the literature as the cost of positivity. The authors reported that parents with this belief less frequently express positive emotions in the family context and less frequently support their children's expression of negative emotions. From this same perspective, Lozada et al. (2016) verified that parents who believe in the potential of feelings to be harmful or cause problems less frequently named their own emotional experiences or those of their children.

Parental beliefs on children's feelings are mainly influenced by the sociocultural context. Raval and Walker (2019) propose that this set of beliefs is based on culture and guides parents' responses to children's feelings. In a recent study addressing the Emotional Socialization Model, Eisenberg (2020) emphasized the role of culture in the entire process due to the diversity of cultural norms that concern the expressiveness, discussion, and management of emotions. She considers that cultural factors, the child and parents' characteristics (including beliefs), and aspects of the specific context of emotional expression interact and predict emotion socialization practices. Cultural factors may also moderate the relationship between parenting emotion socialization practices, child emotional arousal, and child's response and the relationship between emotional arousal and child developmental outcomes (Eisenberg, 2020).

This conception is similar to the cognitive model, specifically the Theory of Modes (Beck & Haigh, 2014; Beck et al., 2020). From this theoretical perspective, beliefs are defined as abstract representations of schemes' contents. Schemes are relatively stable and complex cognitive structures, though they may be flexible. These structures process information from an individual's external and internal environment, assigning meaning and associating information to emotional, behavioral, and motivational systems. Examples of beliefs are assumptions, expectations, meanings, rules, and assessments (Beck & Haigh, 2014). An individual's expectations and meaning attributions are beliefs fundamentally formed through exposure to a specific sociocultural context (Beck et al., 2020). Beliefs play an essential role in forming a mode, defined as a specific internal construct of personality and formed by a network composed of multiple relationships between affective, cognitive, motivational, and behavioral components (Beck & Haigh, 2014; Beck et al., 2020). A mode is activated by a specific situation with which an individual is trying to cope. Once activation is initiated, a chain reaction occurs, and the individual experiences all manifestations in a manner consistent with the activated mode (Beck et al., 2020). Hence, the parents' expectations regarding their children's emotions, which are beliefs influenced by the sociocultural context, play a central role in mode activation, including parental responses to children's emotional expressions.

In summary, the connection between the Theory of Modes (Beck & Haigh, 2014; Beck et al., 2020), PMEP (Gottman et al., 1996), and the Emotional Socialization Model (Eisenberg, 2020; Eisenberg et al., 1998) leads to the notion that the parents' beliefs (including their expectations and meanings they assign) regarding children's emotional processes mediate the relationship between their children's emotional expressiveness (the situation that triggered a mode) and parental responses to it. However, most studies addressing this topic were conducted in Asian or European countries or the United States; hence, it has been seldom investigated in Latin American countries (Halberstadt et al., 2020). Furthermore, only a small and growing number of studies address emotion socialization considering other cultures, ethnicity/races, socioeconomic classes, or nationalities. For instance, Halberstadt et al. (2020) investigated the beliefs of Mapuche and non-Mapuche parents and teachers regarding children's emotions. The findings revealed that the groups share some similarities regarding negative consequences when children's positive emotions are not under control.

In Brazil, the knowledge concerning parental beliefs of children's emotions is insufficient (Mendes et al., 2018). Additionally, understanding the association between the beliefs and responses of children's significant adults in the emotion socialization process seems essential to planning and improving interventions focused on the development of emotionally competent children. Therefore, this study's objective is to verify the relationship between beliefs on children's emotions and responses to children's negative emotions from the perspective of significant adults, specifically mothers. Two hypotheses were tested: a) scores representing the belief that anger is valuable are positively correlated to scores obtained in supportive reactions to children's emotional expressions and b) the scores representing beliefs in the cost of positivity

are positively correlated to scores obtained in non-supportive reactions to children's emotional expressions.

Method

Study design and participants

This is a correlational study. A convenient sample composed of 33 mothers was recruited in two private schools with tuitions up to BRL 660.00 located in Salvador, in the state of Bahia. The inclusion criterion was living in the same household as the child, and exclusion criteria were children having chronic diseases or genetic syndromes or the mother or child having severe mental disorders. The participants were between 24 and 45 years old [$M = 35.15$ ($SD = 5.19$)]. The mothers had 12.64 years of schooling on average ($SD = 2.31$), i.e., equivalent to high school. Regarding the children, 69.70% ($n = 23$) were girls and 30.30% ($n = 10$) were boys, aged between six and seven years [$M = 6.39$ ($SD = .49$)]. The families' monthly income was BRL 3,412.63 on average ($SD = 2,284.69$; $Md = 2,700.00$). Table 1 presents the sample's sociodemographic characteristics.

Table 1

Participants' sociodemographic characteristics

Variables	Categories	Values			
		<i>n</i>	%	<i>M</i>	<i>DP</i>
Mother's age (years)				35.15	5.19
Ethnicity/mother's race	Caucasian	3	9.10		
	Afrodescendant	20	60.60		
	Asian	0	0		
	Mixed race	9	27.30		
	Indigenous	1	3		
Mother's education (years)				12.64	2.31
Mother's occupation	Paid job	21	63.60		
	No paid job	10	30.30		
	On sick leave	2	6.10		
Mother's health problem	Yes	12	36.40		
	No	21	63.60		
Father's age (years)				39.94	7.92
Father's occupation	Paid job	25	75.80		
	No paid job	6	18.20		
	Not applicable ^a	2	6.10		

Table 1*Participants' sociodemographic characteristics (continuation)*

Variables	Categories	Values			
		<i>n</i>	%	<i>M</i>	<i>DP</i>
The mother lives with the child's father	Yes	20	60.60		
	No	11	33.30		
	Not applicable ¹	2	6.10		
Number of people living with the child				4.69	1.29
How long the mother lives with the child's father (years)				12.39	6.07
Family income (Brazilian reais)				3,412.63	2,284.69
Child's sex	Female	23	69.70		
	Male	10	30.30		
Child's age (years)				6.39	0.49
Child's age (months)				83.03	6.72
Ethnicity/child's race	Afrodescendant	12	36.40		
	Mixed race	12	36.40		
	Caucasian	6	18.20		
	Asian	2	6.10		
	Indigenous	1	3		

Note. *M*: mean; *SD*: standard deviation; *n* = 33; ¹ parents who passed away.

Instruments

- *Sociodemographic Form*: this form was used to collect data and characterize the sample, including age, educational level, family income, number of children, children's sex, and other information concerning inclusion and exclusion criteria.
- *Parents' Beliefs about Children's Emotions Questionnaire (PBACE)*: it is composed of 33 items distributed into seven subscales. The parents rated their agreement on statements concerning beliefs on children's feelings on a six-point Likert scale (from 1 = totally disagree to 6 = totally agree). The original instrument assesses beliefs grouped into seven subscales: cost of positivity (measuring beliefs on the negative aspects of positive feelings), value of anger (assessing the degree to which parents accept and value their children's anger), manipulation (measuring beliefs regarding a child's power to use feelings to manipulate the environment and situations), parental knowledge (assessing beliefs regarding the importance of parents identifying their children's emotional experiences), control (measuring beliefs concerning children's control over their emotions), autonomy (assessing beliefs concerning the ability of children to learn and regulate their emotions), and stability (assessing beliefs concerning children's emotional stability throughout their development).

The score of each subscale is obtained by calculating the mean points obtained in the corresponding items. There is not a total score. The version adapted and validated to the Brazilian Portuguese language was used in this study (Anjos, 2019). Anjos (2019) verified the Brazilian version's internal consistency (Cronbach's alpha), and only two subscales presented satisfactory indexes: cost of positivity (.72) and value of anger (.65), these are the two subscales used in this study. The remaining indexes were parental knowledge (.62), autonomy (.57), manipulation (.56), control (.33), and stability (.32).

• *Coping with Children's Negative Emotions Scale (CCNES)*: it was developed by Fabes et al. (2002) and adapted to Portuguese by Lins et al. (2017). Parents are asked to report their responses to 12 hypothetical situations that may occur in the daily life of preschoolers and school-aged children involving emotions such as frustration and disappointment. Seven statements describing parental responses to children's negative emotional expressions follow each scenario. Each of them refers to one of the seven subscales: 1. distress reactions (parents experience distress when children express negative affect and manifest discomfort); 2. punitive reactions (parents punish or reprimand their children with the aim of reducing or even inhibiting the child's emotional expression); 3. minimization reactions (parents minimize the importance or seriousness of the situation or emotion expressed); 4. ignorance reactions (parents do not respond to their children's emotional manifestations); 5. expressive encouragement (parents encourage and validate their children's emotional expressions); 6. emotion-focused reactions (parents suggest strategies to help children cope with emotions); and 7. problem-focused reactions (parents use strategies to help children solve the situation that caused the negative emotions). The parents are asked to rate on a five-point Likert-type scale how likely they are to react in the way described in the item, ranging from never (1) to certainly (5). The score in each subscale is obtained by calculating the mean points obtained in the corresponding items (Lins et al., 2017). The different ways parents react to the children's negative emotions were grouped into two scales: supportive reactions (subscales 5 to 7) and non-supportive reactions (subscales 1 to 4). According to Lins et al. (2017), the instrument's internal consistency was satisfactory. The scale of non-supportive reactions to children's negative emotions obtained a Cronbach's alpha equal to .85, and the scale of supportive reactions to the children's negative emotions, a Cronbach's alpha equal to .80.

Data collection procedures

This study project was submitted to and approved by the Institutional Review Board of the Institute of Psychology of the Federal University of Bahia, according to Opinion Report No. 3,323,584. The mothers received an invitation to participate in the study sent with their

children's school diary, and posters and pamphlets were also distributed at the schools. After the participants accepted the invitation, data were collected on the school's premises according to the mothers' availability. All the instruments were applied individually in the format of an interview using a response card. The authors responsible for the assessment received proper training to administer the instruments.

Data analysis procedures

Data were analyzed using the Statistical Package for the Social Sciences (SPSS) software version 22.0. Exploratory analysis was initially performed, and the distribution of data was tested (Kolmogorov–Smirnov normality test). Outliers associated with CCNES or PBACE were identified and corrected. Specifically, outliers identified in the database were recoded to a higher or lower non-outlier, plus or minus one unit of measurement. However, the distribution of data in the reactions subscale that ignore the responses obtained with the CCNES remained asymmetrical. The Pearson's correlation test was performed between the normally distributed variables, and Spearman's correlation test was performed when asymmetrically distributed data were found. Then, simple regression analyses were performed.

Results

Descriptive analysis showed that the mothers obtained a mean equal to 3.65 ($SD = 1.28$; $CI = 3.19-4.10$) in the belief in the cost of positivity, slightly higher than the mean obtained in the belief in the value of anger, equal to 3.03 ($SD = .98$; $CI = 2.68-3.38$). An analysis of the CCNES considering the seven types of maternal reactions revealed that emotion-focused reactions obtained the highest mean ($M = 4.43$; $SD = .38$; $CI = 4.30-4.57$), while the lowest mean was obtained in reactions that ignore the children's emotional responses ($M = 1.48$; $SD = .37$; $CI = 1.34-1.61$). Regarding the different types of parental reactions, supportive reactions obtained the highest mean, 4.02 ($SD = .31$; $CI = 3.90-4.13$), while the mean concerning unsupportive reactions was 2.08 ($SD = .53$; $CI = 1.88-2.27$). Table 2 presents the means and standard deviations of each variable, confidence interval, and minimum and maximum values of the scores obtained in the PBACE and CCNES.

Table 2

Mean and standard deviation, confidence interval (95%), and minimum and maximum values concerning beliefs on children's emotions and reactions to children's negative emotional expressions

Variables	Mean (SD)	CI 95%	Minimum	Maximum
Maternal beliefs regarding children's emotions (PBACE)				
Positivity cost	3.65 (1.28)	(3.19-4.10)	1.00	6.00
Value of anger	3.03 (.98)	(2.68-3.38)	1.83	5.33
Maternal reactions to their children's negative emotional expressions (CCNES)				
Unsupportive reactions	2.08 (.53)	(1.88-2.27)	1.16	3.09
Punitive reactions	2.45 (.77)	(2.17-2.72)	1.00	4.33
Minimization reactions	2.28 (.85)	(1.97-2.58)	1.00	4.25
Distress reactions	2.25 (.82)	(1.95-2.54)	1.00	4.38
Ignorance reactions	1.48 (.37)	(1.34-1.61)	1.00	2.18
Supportive reactions	4.02 (.31)	(3.90-4.13)	3.33	4.61
Emotion-focused reactions	4.43 (.38)	(4.30-4.57)	3.67	5.00
Problem-focused reactions	4.40 (.33)	(4.29-4.52)	3.75	5.00
Expressive Encouragement	3.23 (.44)	(3.07-3.28)	2.42	4.33

Note. SD: standard deviation; CI 95%: 95% confidence interval; $n = 33$.

Table 3 presents the correlations between the mothers' beliefs and reactions to the children's negative emotional expressions.

Table 3

Correlations between the scores concerning beliefs on children's emotions and scores concerning reactions to children's negative emotional expressions

Variables	1	2	3	4	5	6	7	8	9	10	11
1. Punitive reactions	-										
2. Distress reactions	.59**	-									
3. Ignorance reactions ¹	.34*	.47**	-								
4. Minimization reactions	.76**	.77**	.51**	-							
5. Problem-focused reactions	.10	-.25	-.28	-.20	-						
6. Emotion-focused reactions	.26	.05	.18	.12	.47**	-					
7. Expressive encouragement	-.15	-.31	-.20	-.23	.48**	.34	-				
8. Supportive reactions	.08	-.23	-.07	-.12	.79**	.74**	.80**	-			
9. Unsupportive reactions	.84**	.83**	.62**	.93**	-.19	.20	-.28	-.11	-		
10. Belief in the cost of positivity	.47**	.27	.35*	.35*	.02	.17	.04	.11	.45**	-	
11. Belief in the value of anger	.18	.09	-.18	.16	.30	.00	.46**	.35*	.12	.44**	-

Note. ¹ Spearman's correlation analysis was carried out; * $p < .05$ ** $p < .01$; $n = 33$.

Positive correlations were found between the cost of positivity and the following subscales of unsupportive reactions: punitive reactions ($r = .47, p < .01$), minimization reactions ($r = .35, p < .05$), and ignorance reactions ($r = .35, p < .05$). The unsupportive reactions to children's negative emotions were positively correlated with the belief in the cost of positivity ($r = .45, p < .01$). Linear regression was performed with the results of the correlation analysis to verify whether beliefs in the cost of positivity would predict unsupportive reactions toward children's emotions. The predictive power of this set of beliefs was confirmed and explained 18% of the variance for unsupportive reactions [$F(1,31) = 8.05; p < .01$]. Each additional standard deviation for the belief in the cost of positivity caused an increase of .45 units of measure in unsupportive reactions ($\beta = .45; t = 2.83; p < .01$).

Additionally, a positive correlation was found between the belief in the value of anger and expressive encouragement ($r = .46, p < .01$). The belief in the value of anger was also positively correlated with supportive reactions ($r = .35, p < .05$). A simple linear regression analysis was performed to verify whether beliefs in the value of anger would significantly predict supportive reactions to children's negative emotions. The predictive power of this set of beliefs was confirmed and explained 9% of the variance in supportive reactions [$F(1,31) = 4.44; p = .04$]. Each additional standard deviation in the belief in the value of anger increased .35 units of measure in supportive reactions ($\beta = .35; t = 2.10; p = .04$).

Discussion

This study aimed to examine the relationship between maternal beliefs on children's emotions and reactions to children's negative emotional expressions. The results show a relationship between parental cognitive and behavioral dimensions.

The first hypothesis was corroborated. It predicted that scores obtained in beliefs in the value of anger would be positively correlated to scores obtained in supportive reactions to children's emotional expressions. The regression analysis confirmed the predictive value of this belief. This finding supports the assumption that when mothers and fathers believe that their children's emotions are valuable, they are more likely to promote an emotionally positive family environment (Halberstadt et al., 2013; Thomassin & Seddon, 2019; MacCormack et al., 2020), encouraging emotional exteriorization (Lozada et al., 2016).

According to the PMEP (Gottman et al., 1996), Emotion Socialization (Eisenberg, 2020; Eisenberg et al., 1998), and the Theory of Modes (Beck & Haigh, 2014; Beck et al., 2020), these beliefs are more likely to determine a maternal interest in children's emotional experiences and promote active engagement in the children's emotional state. Mothers legitimize children's emotions using different strategies, from simply validating feelings to helping children solve the problems that triggered a given emotion (Garrett-Peters et al., 2017). Thus, a child expressing anger or any other negative emotion would activate the mother's meta-emotion mode or philosophy that recognizes the function and importance of this internal state for children's development. Supportive reactions compatible with beliefs derive from this style or mode, influenced

by individual, cultural, and contextual factors. Consequently, children are encouraged to express themselves emotionally and perceive the benefits of experiencing and manifesting negative emotions. It is a valuable opportunity for children to practice skills such as emotional identification and understanding and developing the ability to self-regulate.

Another critical piece of information concerns the children's sex. Approximately two-thirds of the children were female. There is evidence that mothers perceive the expression of anger on the part of girls as more acceptable than that of boys (Thomassin & Seddon, 2019). Therefore, it is likely that the gender of most of the children favored beliefs in the value of anger and supportive emotion socialization practices. From this perspective, there is evidence that the mothers' reactions to their children's emotions were influenced by the type of emotion the children experience (Eisenberg et al., 1998; Halberstadt et al., 2013). Hence, in this study, the specificity of the belief that was associated with supportive reactions in the present study, that is, belief in the value of anger, indicates that future studies are needed to assess the role of maternal beliefs in valuing other negative emotions, such as fear and sorrow.

The second hypothesis was also confirmed. Scores concerning maternal beliefs in the potential harm of manifesting pleasant emotions (e.g., joy, pride etc.) were positively correlated with unsupportive reactions toward children's negative emotions. The regression analysis ratified that this set of beliefs predicts unsupportive reactions. This finding supports the idea that parents who perceive children's emotions to be potentially troublesome or harmful are more likely to engage in behaviors attempting to modify their children's emotional state by ignoring, minimizing, punishing, or showing distress (Halberstadt et al., 2013; Lozada et al., 2016; Parker et al., 2012).

The correlation between beliefs in the cost of positivity and unsupportive reactions may be explained by the intensity with which children express positive emotions, as noted by Garrett-Peters et al. (2017). Additionally, parental beliefs concerning the danger and problems caused by emotions were correlated to unsupportive reactions, that is, unsupportive reactions were an attempt to regulate children's emotional expressions that indicated an intense or recurrent experience (Lozada et al., 2016). Thus, the PMEP (Gottman et al., 1996), Emotion Socialization (Eisenberg, 2020; Eisenberg et al., 1998), and the Theory of Modes (Beck & Haigh, 2014; Beck et al., 2020) support the hypothesis that in the face of a child's intense positive emotional expression, the mothers would activate the belief that this kind of strong arousal represents a potential problem. The negative emotions the mothers would experience themselves after activating this mode or meta-emotion philosophy, influenced by situational and cultural aspects, would lead mothers to inhibit or restrain children's emotional responses with unsupportive reactions.

Therefore, when parents believe that their children's emotions are potentially harmful or troublesome, they convey to children that emotions should be avoided (Garrett-Peters et al., 2017). For this reason, they may talk less frequently with their children about emotional experiences and hide their own emotions, causing a family environment that prevents children from

learning important skills concerning emotional understanding. This parental pattern may also elicit emotions, such as guilt, leading children to learn dysfunctional coping to deal with intense emotions, whether negative or positive.

Together, these findings indicate the relevance of maternal beliefs and the Theory of Modes (Beck & Haigh, 2014; Beck et al., 2020) to understand the process of child emotion socialization. When a child expresses a negative emotion, the mother's mode is activated to cope with the situation. Therefore, event information processing and the production of a reaction will occur through the cognitive scheme that comprises beliefs (expectations and meanings), which may either establish the value of negative emotions or focus on their potential to cause problems. The mode is an integrated network of components. Thus, the mother will present a complex and synchronous response to her child's demand, exhibiting emotional, cognitive, motivational, and behavioral reactions, whose most salient aspect will be a behavioral one: a supportive or unsupportive reaction.

Even though the most salient or observable aspects of supportive or unsupportive reactions are the behavioral responses, all the remaining components, such as beliefs, motivations, and emotional and physiological responses that accompany a mother's actions, play a role in the activated mode, keeping and reinforcing it. Therefore, this study's results support the importance of promoting emotionally competent children by improving parents' or caregivers' practices. Interventions should emphasize strategies to modify all these components, especially beliefs on children's emotions. For instance, discussions that encourage the belief that expressing anger can be helpful to solve the problem and challenge the notion that expressing anger may cause additional problems are essential to establish more functional modes to promote children's emotion socialization. As beliefs are also associated with motivations (e.g., feeling like spanking the child) and physiological reactions (e.g., increased heart rate when seeing their children angry), it is interesting to promote discussions to sensitize fathers and mothers about subtle reactions that can also promote dysfunctional modes. When parents understand that the distress experienced when a child is expressing anger is related to the belief that "anger is potentially harmful", they are more likely to contain their impulsive unsupportive reactions and adopt a supportive approach, helping children to describe and understand the situation.

Therefore, we advocate that interventions intended to promote emotion socialization in the family context should adopt cognitive structuring strategies that consider the complex network of components that interact to establish modes (Beck et al., 2020). Cognitive restructuring makes the entire mode more flexible (Beck & Haigh, 2014). Hence, when beliefs on emotions become more flexible, and new behavioral repertoires and emotional regulation are learned, individuals are highly likely to change the way they relate to their contexts because the adaptation process impacted the content of the mode as a whole, since all the mode instances are interconnected and influence each other (Beck et al., 2020).

It is also essential to recognize the role of social and cultural variables in this process. Even though these aspects were not assessed in this study, it is likely that belonging to a

specific sociocultural group influences all the elements in the cognition–emotion–behavior tripod, feeding back and reinforcing the parents' functioning modes. For example, as parents belong to a sociocultural group, they assimilate beliefs regarding their parental objectives, which, consequently, guide their reactions to conform to the community to which they belong, which may include family members, co-workers, the media, among others (Cole & Tan, 2015). Surely, interventions adopting a cognitive perspective to promote emotion socialization in the family context should also consider the role of these influences in mother and father's modes.

This study has limitations. First, Halberstadt et al. (2020) draw attention to the risk of assessing parental beliefs using questionnaires, such as the one adopted in this study. The instrument's statements may not be precisely equivalent to the respondents' cognitions, since they may want to provide the "right answer", leading to a mismatch between their answers and beliefs regarding children's emotions. Second, regarding CCNES, higher scores were found for supportive reactions. The mothers may have considered this group of reactions socially acceptable, resulting in a more significant agreement to hypothetical situations. Hence, using instruments more sensitive to contextual, individual, and cultural aspects, with open-ended questions, for instance, seems to be essential to confirm and contribute to this study's findings. Finally, another limiting element concerns sample size, which decreased the analysis' statistical power.

In summary, this study's findings revealed that maternal beliefs concerning children's emotions help explain how mothers conduct their children's emotion socialization process. Therefore, the conclusion is that it is vital to address the parents' belief systems regarding children's emotions in clinical and psychoeducational interventions. In addition to facilitating the understanding of the importance of negative emotions for child development, interventions should focus on changing the complex network of relationships between cognitive, emotional, motivational, and behavioral aspects underlying the parents' unsupportive reactions to children's emotional expressions. It also requires an analysis of individual, contextual, and cultural aspects that characterize families. To achieve this level of theoretical and technical complexity, considering the PMEP (Gottman et al., 1996), Emotional Socialization (Eisenberg et al., 1998; Eisenberg, 2020), and the Theory of Modes (Beck & Haigh, 2014; Beck et al., 2020) is a promising path.

References

- Anjos, N. C. dos., Filho. (2019). *O papel das crenças maternas sobre as emoções das crianças na socialização emocional dos filhos* [Unpublished Master's dissertation]. Universidade Federal da Bahia.
- Beck, A. T., Finkel, M. R., & Beck, J. S. (2020). The theory of modes: Applications to schizophrenia and other psychological conditions. *Cognitive Therapy and Research*, 45, 391–400. <https://doi.org/10.1007/s10608-020-10098-0>
- Beck, A. T., & Haigh, E. A. P. (2014). Advances in cognitive theory and therapy: The generic cognitive model. *Annual Review of Clinical Psychology*, 10, 1–24. <https://doi.org/10.1146/annurev-clinpsy-032813-153734>
- Cole, P. M., & Tan, P. Z. (2015). Emotion socialization from a cultural perspective. In J. E. Grusec, & P. D. Hastings (Eds.), *Handbook of socialization: Theory and research* (2 ed., pp. 516–542).
- Eisenberg, N. (2020). Findings, issues, and new directions for research on emotion socialization. *Developmental Psychology*, 56(3), 664–670. <https://doi.org/10.1037/dev0000906>
- Eisenberg, N., Cumberland, A., & Spinrad, T. L. (1998). Parental socialization of emotion. *Psychological Inquiry*, 9(4), 241–273. https://doi.org/10.1207/s15327965plio904_1
- Fabes, R. A., Poulin, R. E., Eisenberg, N., & Madden-Derdich, D. A. (2002). The coping with Children's Negative Emotions Scale (CCNES): Psychometric properties and relations with children's emotional competence. *Marriage & Family Review*, 34(3–4), 285–310. https://doi.org/10.1300/J002v34n03_05
- Garrett-Peters, P. T., Castro, V. L., & Halberstadt, A. G. (2017). Parents' beliefs about children's emotions, children's emotion understanding, and classroom adjustment in middle childhood. *Social Development*, 26(3), 575–590. <https://doi.org/10.1111/sode.12222>
- Gottman, J. M., Katz, L. F., & Hooven, C. (1996). Parental meta-emotion philosophy and the emotional life of families: Theoretical models and preliminary data. *Journal of Family Psychology*, 10(3), 243–268. <https://doi.org/10.1037//0893-3200.10.3.243>
- Halberstadt, A. G., Dunsmore, J. C., Bryant, A., Parker, A. E., Beale, K. S., & Thompson, J. A. (2013). Development and validation of the parents' beliefs about children's emotions questionnaire. *Psychological Assessment*, 25(4), 1195–1210. <https://doi.org/10.1037/a0033695>
- Halberstadt, A. G., Oertwig, D., & Riquelme, E. H. (2020). Beliefs about children's emotions in Chile. *Frontiers in Psychology*, 11(34), 1–9. <https://doi.org/10.3389/fpsyg.2020.00034>
- Havighurst, S., & Kehoe, C. (2017). The role of parental emotion regulation in parent emotion socialization: Implications for intervention. In K. Deater-Deckard, & Robin Panneton (Eds.), *Parental stress and early child development: Adaptive and maladaptive outcomes* (pp. 285–307). Springer. https://doi.org/10.1007/978-3-319-55376-4_12
- Katz, L. F., Maliken, A. C., & Stettler, N. M. (2012). Parental meta-emotion philosophy: A review of research and theoretical framework. *Child Development Perspectives*, 6(4), 417–422. <https://doi.org/10.1111/j.1750-8606.2012.00244.x>
- Lins, T., Alvarenga, P., Mendes, D. M. L. F., & Pessôa, L. F. (2017). Adaptação brasileira da *Coping with Children's Negative Emotions Scale* (CCNES). *Avaliação Psicológica*, 16(2), 196–204. <https://doi.org/10.15689/AP.2017.1602.10>
- Lozada, F. T., Halberstadt, A. G., Craig, A. B., Dennis, P. A., & Dunsmore, J. C. (2016). Parents' beliefs about children's emotions and parents' emotion-related conversations with their children. *Journal of Child and Family Studies*, 25(5), 1525–1538. <https://doi.org/10.1007/s10826-015-0325-1>
- MacCormack, J. K., Castro, V. L., Halberstadt, A. G., & Rogers, M. L. (2020). Mothers' interoceptive knowledge predicts children's emotion regulation and social skills in middle childhood. *Social Development*, 29(2), 578–599. <https://doi.org/10.1111/sode.12418>
- Mendes, D. M. L. F., Pires, P. P., & Fioravanti, A. C. M. (2018). Escala Crenças Parentais sobre Competência Emocional em Crianças (COMPE): Propriedades psicométricas. *Trends in Psychology*, 26(4), 1819–1832. <https://doi.org/10.9788/tp2018.4-05pt>

- Parker, A. E., Halberstadt, A. G., Dunsmore, J. C., Townley, G., Bryant, A., Jr., Thompson, J. A., & Beale, K. S. (2012). "Emotions are a window into one's heart": A qualitative analysis of parental beliefs about children's emotions across three ethnic groups. *Monographs of the Society for Research in Child Development*, 77(3), 1–144. <https://doi.org/10.1111/j.1540-5834.2012.00676.x>
- Raval, V. V., & Walker, B. L. (2019). Unpacking 'culture': Caregiver socialization of emotion and child functioning in diverse families. *Developmental Review*, 51, 146–174. <https://doi.org/10.1016/j.dr.2018.11.001>
- Thomassin, K., & Seddon, J. A. (2019). Implicit attitudes about gender and emotion are associated with mothers' but not fathers' emotion socialization. *Canadian Journal of Behavioural Science*, 51(4), 254–260. <https://doi.org/10.1037/cbs0000142>

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