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Emotional understanding in clinical and normal children in
correlation with mothers' emotional awareness and attitudes
toward children's expressiveness

par

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Sommaire

Cette étude a eu comme objectif d'évaluer la compréhension de l'ambivalence amour/colère et joie/tristesse, et de voir comment changent les sentiments de colère et de tristesse chez des enfants ayant des problèmes psychiatriques et des enfants normaux de deux âges, 7-8 ans et 10 et 11 ans. Le groupe clinique était composé de garçons ayant été référés aux unités psychiatriques de trois hôpitaux de la ville de Bogotá, Colombie (n=15 dans chaque groupe d'âge). Le groupe de contrôle comprenait des garçons fréquentant des écoles publiques de Bogotá et de ses arrondissements (n= 17 pour les enfants âgés entre 7 et 8 ans, et n= 16 pour ceux de 10 et 11 ans.) L'attitude des mères des enfants participant à l'étude (n=63) vis-à-vis de l'expression émotionnelle de leurs enfants, et leur niveau de conscience des sentiments furent aussi évalués et donnèrent lieu à des comparaisons entre les groupes. Les résultats confirment que la compréhension émotionnelle augmente avec l'âge. Ceci a été observé pour la plupart des variables analysées. Des différences significatives apparaissent entre le groupe clinique et le groupe de contrôle concernant la compréhension de comment l'émotion "colère" change. Aucune différence significative n'a été trouvée chez les mères des enfants cliniques comparées aux mères des enfants des groupes de contrôle concernant leurs attitudes envers

l'expression émotionnelle des enfants ou leur conscience des émotions. Cette étude représente un effort pour analyser la compréhension émotionnelle des enfants ayant un diagnostic psychiatrique et présente aussi de l'information sur un échantillon d'un pays de la Amérique Latine.

MOTS CLES : Développement émotionnel, compréhension des émotions, ambivalence, changement des sentiments, attitudes des parents, milieu socioéconomique défavorisé, Colombie.

Abstract

Children's understanding of ambivalence love/anger and happy/sad, and understanding of how angry and sad feelings change were examined in clinical and control children of two age groups, 7-8 and 10-11. The clinical group consisted of boys who had been referred to and diagnosed by psychiatric units at three major hospitals in Bogotá, Colombia (n= 15 in both age groups). The control group was drawn from boys attending public schools in Bogotá and surrounding areas (n =17 for the 7-8 and n= 16 for the 10-11). Mothers' attitudes toward children's emotional expression and their level of awareness of emotion were also examined (n= 63) and compared between groups. Results confirm a progression with age of emotional understanding for most of the variables examined, but the only significant difference between clinical and control children was in understanding of how angry feelings change. There were also no differences between mothers of clinical and control children in their attitudes toward emotional expression or in their emotional awareness. Parental variables were not significantly correlated with the children's variables. This study represents an effort to understand emotional cognition in clinically diagnosed children and presents information regarding a sample from a Latin American country.

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CHAPTER 1

LITERATURE REVIEW

Introduction

Feelings pervade the world of human beings: how we feel, how we know what we feel, when it is appropriate to feel one way or another, how to understand what others feel, how to express our feelings are only a few of the questions that we ask ourselves every day. Emotions are ever present and their influence on behavior has gained emphasis in psychology in recent years. Terms like "Emotional Intelligence" (Goleman, 1996; Lane, 2000) and "Emotional Competence" (Saarni, 1999) have been coined to reflect the importance to successful functioning of understanding and managing emotions. Piaget (1962, 1964/1971), even as centered in cognition as he was, recognized the importance of affectivity in the development of cognitive structures. He stated that affectivity has a complementary relationship with knowledge, an association that persists throughout all the stages of intellectual development.

Emotional understanding is an area of psychology in which the study of cognition and emotion come together. "Understanding" refers to the organization and content of ideas and concepts, while "emotional" refers to feeling and affect. The study of emotional understanding refers then to the exploration of the way individuals construct their ideas about emotions.

The concept of "emotional understanding" refers to a continuum of development from simple recognition to the inference of causality. Researchers were initially interested in younger children's ability to identify and name feelings depicted in pictures or drawings (for example Harter, 1982). Later studies asked children to describe situations that would cause different feelings (for example Harris, Olthof, Meerum Terwogt, & Hardman, 1987). Similarly, authors have presented children with brief stories and asked them to explain what the protagonist would feel and why (Donaldson and Westerman, 1986). Many different methods of study exist for emotional understanding. Some authors use more simplistic methods such as asking subjects to identify feelings depicted in drawings. Other authors use more complex methods, such as asking subjects to explain the emotions experienced by others. When presenting the studies we will indicate the particular method used by each author but use the general term "emotional understanding" in the same global way they do.

Early studies (Harter, 1982; Harris, Olthof, Meerum Terwogt, & Hardman, 1987; Nannis & Cowan, 1987) centered on children, building a model of the content and process by which human beings understand emotions. Subsequent research added information about the influences that impinge on such understanding. Gordon (1989),

for example, found that society and its various representatives in a child's life play a role in the development of emotional understanding. Most studies, however, have focused on a closer and more persistent influence: the individual's family. Researchers have assessed the relationship between family characteristics, such as parents' ideas and behavior around emotions, and the child's emotional understanding. The complexity of the interplay between families and children makes this task daunting, but some conclusions have been drawn which suggest that the family's emotional expression influences children's understanding of emotions.

Researchers have also extended their interest to other influences on emotional understanding, such as those derived from different psychological or developmental conditions. How children with disabilities, such as deaf children (Delvecchio, 1999), develop emotional understanding has been studied. Another condition that has attracted interest is emotional disturbance. Research has attempted to determine whether emotionally troubled children have a different understanding of emotions than children with no history of emotional disturbance.[1] These questions have been pursued to

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[1] Such studies include Gurucharri, Phelps and Selman (1984), Casey (1996), and Meerum Tergowt, Koops, Oosterhoff and Olthof (1986). These and other studies

gain further knowledge about psychopathological conditions and to advance and improve treatment of children's' emotional difficulties. However, research in this area has been scarce and results were not entirely conclusive.

The present study falls within this area as it intends to explore the emotional understanding of children with emotional and/or behavioral difficulties. It also investigates the relationship between emotional understanding and some aspects of the family's emotional behavior. In addition, this study looks at these issues within a Latin-American culture, rather than the North American and European cultures where most studies in the area have been conducted.

Development of Emotional Understanding

Emotional understanding refers to the cognitive representations a person has about feelings and emotional behavior (Meerum Tergowt & Olthof, 1989). The topic stimulated considerable interest in the decade of the 1980's. In addition to their inherent interest in knowing more about how such knowledge develops, researchers have also wanted to test the hypothesis that emotional

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of the understanding of emotions in children with emotional disturbance are cited throughout the present work.

knowledge is closely related to social cognition and behavior
(Denham, Zoller & Couchoud, 1994; Denham et al., 2002;
Bauminger, Edelsztein & Morash, 2005). It was thought that
increased emotional understanding would be associated with
positive social behavior (Zahn-Waxler, Cole, Lehman & Junker, 1991;
Saarni, 1999; Cassidy, Werner, Rourke & Zubernis, 2003). Clinically
oriented authors (Taylor & Harris, 1983; Taylor & Harris, 1984;
Gurucharri, Phelps, & Selman, 1984; Meerum Terwogt, Schene, &
Koops, 1990; Meerum Terwogt, 1990; Casey, 1991; Greenberg,
Kusche, & Speltz, 1991; Cook, Greenberg, & Kusche, 1994; Southam-
Gerow & Kendall, 2002) also suggested that emotional
understanding played a role in the emergence of psychopathological
behavior and its treatment. Thus, understanding how a subject
conceived of emotions might help understand disturbances in
emotional behavior.

The development of emotional understanding seems to be
influenced mainly by age (Selman, 1980; Harris, Olthof & Meerum
Terwogt, 1981; Harter, 1982; Taylor & Harris, 1984; Carroll &
Steward, 1984; Donaldson, 1984; Gnepp & Gould, 1985; Harter,
1986; Donaldson & Westerman, 1986; Harris, Olthof, Meerum
Terwogt, & Hardman, 1987; Harter & Buddin, 1987; Nannis &
Cowan, 1987). As children grow older their ability to understand a

greater number of differentiated emotions both in themselves and in others increases. They also become more sophisticated in their understanding of the circumstances and content regarding emotional issues. Harter (1982), for instance, asked 45 middle to middle-upper class children between 3 and 13 years of age to name as many different emotions as they could think of. She found that three-year-olds were able to name at least three basic emotions, "happy", "sad", and "mad" or "angry". Some were also able to name "scared" or "afraid". By seven years of age, children also mentioned "guilty", "proud", "jealous", and "worried", while older children (10 to 13 years old) could name "annoyed", "disappointed", and "anxious".

Demonstrating that children also increase their ability to link emotions with circumstances as they age, Harris, Olthof, Meerum Terwogt, and Hardman (1987) presented 20 different emotions to children of 5, 7, 10 and 14 years of age (20 in each group) and asked them to describe situations that would provoke the emotions. The authors confirmed that 5-year olds were able to accurately identify situations that would provoke emotions such as "afraid", "happy", "angry", and "shy", while by seven years of age they could also identify situations that would provoke emotions such as "guilty", "proud", "jealous", and "worried". Harris et al. (1987) concluded that children's accuracy in identifying different emotional

situations increases with age. This conclusion applied to both English and Dutch cultures and languages since their sample was drawn from schools in working and middle class neighborhoods in both countries. (The study is not clear about the number and characteristics of subjects from each country).

In a further intercultural study, Harris, Olthof, Meerum Terwogt and Hardman (1987) reproduced their study with 20 children from 6 to 10 and 12 to 14 years of age from a small Himalayan village in Eastern Nepal. They used 16 of the 20 emotional terms used in their previous study. Results from this research led them to conclude that accuracy in emotional recognition also increases with age in cultures other than the North American and European (Harris et al., 1987).

With age there is a progression of sophistication in the cues or situational aspects that children take into account to recognize emotions. Harris, Olthof, and Meerum Terwogt (1981) found that younger children (six years of age) would mention situational cues ("I would be happy when it is my birthday") more frequently when asked about how to detect their feelings[2]. Older children (11 to 15 years of age) referred to more internal mental states ("Then you think everything is fine"). Carroll and Steward (1984), who in their

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[2] "Sometimes you can have a feeling that you are happy/angry/afraid inside? How do you know you are happy/angry/afraid? What makes you notice it?"

study included sad feelings along with happy, angry and afraid feelings, obtained similar results in pre-school (4 to 5 years of age) and third graders (8 to 9 years of age). Younger children considered feelings as external and judged people's emotions according to their facial expression or their expressed emotion, while older children considered feelings more as internal states. Nannis and Cowan (1987) obtained a similar result using the same methodology, but exploring only one emotion: happy. These authors included older children (11 to 15 years of age) as well.

In addition to the increase in the number of emotions children recognize and the complexity of emotional situations they comprehend, age also brings a change in the understanding of the importance of controlling emotions and the strategies used or proposed for such control. By age seven, children express clearly that it is important to control physical aggression and negative feelings particularly when to express them might hurt another's feelings (Taylor and Harris, 1984). Strategies to control emotions also change from concrete and external to more internal or psychological. Children 5 or 6 years of age propose leaving a room to stop experiencing a negative feeling, for example, while 11- year-olds suggest "changing your thoughts" (Harris et al., 1981). Furthermore, children not only recognize the importance of

controlling emotions, but also expect self-control from other children. They reject a child who will "always show his or her real feelings" as well as those who will "almost never show his or her real feelings" (Saarni, 1988-1989).

As they grow older, children are also able to consider not only the evident or immediate aspects of an emotional situation, but can integrate or coordinate information previously given. In a study conducted by Gnepp and Gould (1985) with 192 subjects (48 kindergartens, 48 2nd graders, 48 5th graders and 48 college students) subjects were presented with six brief stories comprising two events where the first one (for example "Friend says "I don't like you anymore"") influences the evaluation of the second one ("Child sees friend on playground"). The authors found that young children of 5 to 7 years of age judged feelings according to situational circumstances: A child is happy when meeting a friend at a playground, or sad because his or her sweater is accidentally torn. Older children, 10 years of age, were able to give more personalized responses by considering the circumstances presented previously. For instance, a child might say he or she would be sad at seeing a friend because they had a fight recently, or happy for having torn his or her sweater because friends had made fun of it (Gnepp & Gould, 1985).

Although the overwhelming majority of studies demonstrate that age does play a major role in the development of emotional understanding, Casey (1993) did not find it so. This author conducted a study with 66 younger (n = 34, M age = 7.12) and older (n = 32, M age = 12.06) children. She used a structured interview that explored emotional understanding and emotional experience after the children received positive or negative peer feedback. For peer feedback, the children witnessed an exchange recorded on TV where it seemed that a peer was making positive ("Yes, I'd like to play with her [him]. She [he] looked friendly, she [he] looks nice, I like the way she [he] played the game") or negative comments ("No, I don't want to play with her [him], she [he] doesn't look friendly, she [he] doesn't look nice, and I don't like the way she [he] played the game") about the study subjects. Casey did not find significant differences between younger and older children regarding their ability to recall the emotion stimulus (what they remembered about what the other child had said about them) or their own facial expression. The children also did not differ significantly in the level of sophistication they demonstrated in explaining the emotions they had experienced. Explanations could be a simple statement of their feelings ("I felt happy"), a report of a facial or bodily reaction ("I started to smile"), a restatement of the affective characteristic of the

stimulus ("Because he said ugly things to me"), or a generalizing explanation ("Because it is embarrassing to see someone say these things like this about somebody else, much less about yourself"). It was predicted that younger children would refer to bodily reactions more often, while older children would refer to stimulus characteristics or generalizations. This, however, was not the case. Condition characteristics, such as whether positive or negative feedback had been heard, seemed to have a greater influence on the kinds of explanations children used, "with children in the negative [feedback] condition referring more commonly to the stimulus characteristics and those in the positive condition being more likely to refer to their facial or physical reaction" (Casey, 1993, p. 125). The author suggests that age differences might be less evident when subjects are asked about events that have just happened to them than when asked about theoretical situations or about feelings experienced by others, as most of the studies do. That is, while most studies have asked children how they would feel or how they think a child in a drawing or a story would feel, in an intellectual or theoretical manner, Casey's study explored feelings evoked by a real, recently experienced situation. This indicates that there might be a difference between discussing an imagined emotional situation and talking about a real (and emotionally charged) one.

Studies on emotional understanding often have one of two different theoretical orientations. Some of them (Saarni, 1979; Harris, Olthof & Meerum Terwogt, 1981; Harris, Olthof, Meerum Terwogt & Hardman, 1987; Casey, 1993) attempt to describe children's explanations or verbalization about feelings and to construct knowledge about emotional understanding from these descriptions. Structurally or Piaget-oriented authors, on the other hand (e.g., Selman [1980, 1981], Carroll & Steward [1984], Nannis & Cowan [1987]), conceptualize the development of emotional understanding as a set of stages or levels that children follow sequentially as they mature. Cowan (1982) and Nannis (1988), for instance, postulated that the understanding of emotions follows a pattern similar to that described by Piaget for cognitive development. They proposed that in early childhood (from 2 to 6 years of age), when "children pass through both the preconceptual (2 to 4 years of age) and intuitive (4 to 6 years of age) periods of the preoperational stage", a child's description of feelings would be concrete and external, with an "all or none quality" (e.g., "I hate you"). Children at these ages consider that feelings cannot be simulated or hidden and that they are caused by the circumstance or events that just preceded them. Between the ages of 7 and 9, when the concrete-operations stage starts and children develop abilities

such as conservation, grouping and establishing hierarchies, feelings are then conceived as internal though still "tied to concrete objects such as hearts, brains, and stomachs" (Nannis, 1988, p.36). At this age it is believed that feelings can be hidden and also last longer. Between 10 and 12 to 13 years, ages that overlap Piaget's formal-operations stage, Cowan (1982) and Nannis (1988) say children view feelings as internal processes, not tied to body parts or concrete objects, and controllable (either hidden or actively caused). The child at this age is able to coordinate different perspectives and multiple feelings toward the same object. In adolescence, when the formal-operations stage is reached, children can ponder their own emotions and those of others around them and are able to use logic to integrate the various perspectives of an emotional situation. According to Nannis (1988), adolescents view feelings "as part of a complex body of scientific knowledge", consider emotions to follow universal rules, and coordinate multiple perspectives on an emotional situation. Adolescents can think about their own thoughts and feelings and about how others would know what they think or feel, according to Nannis, because emotional understanding becomes more complicated with the adolescent's increased awareness of the complexity of emotional situations and also

because "they are apt to be precise and literal in their understanding of explanations".

Piaget assumed that cognitive development would culminate in adulthood. Emotional understanding would presumably reach its more mature and complex level in adulthood as well. Nevertheless, Piaget was aware that cognitive-emotional knowledge might lag behind the purely cognitive, "particularly because the experimentation and manipulation necessary for growth may be more difficult to arrange in social-emotional domains" (Cowan, 1982, p. 73).

Many of the studies on emotional understanding have followed the structural model, describing sequential levels or stages for the acquisition of emotional understanding. The first of these models was proposed by Selman (1980, 1981), who studied the development of the area he called "Interpersonal Understanding". Interpersonal Understanding refers to a subject's development of concepts about four domains of interpersonal knowledge: Friendships, Peer Groups, Parent/Child Relationships, and Individuals. The Individuals domain (which refers to intrapsychic aspects) comprises four aspects of understanding: Subjectivity, Self-awareness, Personality, and Personality Changes. The first of these aspects, Subjectivity, is similar to what other authors term emotional

understanding. It encompasses the properties of thoughts, feelings and motives. The second aspect, self-awareness, refers to the individual's ability to "observe its own thoughts and actions". Personality refers to concepts that describe people, such as character traits ("What kind of a person do you think Molly is?"). Personality Changes refers to the understanding of how and why people change the way they are (Selman, 1980).

Selman (1980, 1981) and Gurucharri, Phelps and Selman (1984) used an open-ended clinical interview in which they presented their subjects with a "hypothetical interpersonal dilemma" depicted by illustrated stories. The stories were followed by questions about each of the proposed domains of Interpersonal Understanding. Each domain of Interpersonal Understanding was described as a sequence of five stages, each representing a more complex and complete understanding of the domain than the preceding stages. Selman validated his Interpersonal Understanding construct by conducting 225 interviews, some of them (48) with follow-ups two years later[3].

Other models built on Selman's description of the understanding of multiple feelings. These include Carroll and

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[3] Most of his sample was composed of white (192) subjects, males (179), from middle and upper middle class backgrounds (164).

Steward's (1984) study of the perception of feelings in one's self and in others and of how feelings can be hidden, Donaldson and Westerman's (1986) descriptions of ambivalence and how feelings change, and Nannis and Cowan's (1987) description of how feelings can be controlled. These models will be described in the following section.

Two areas of Emotional Understanding: Ambivalence and How Feelings Change

Among the many aspects of emotional understanding that researchers have chosen to study, two have drawn much attention. These are the understanding of multiple feelings, or ambivalence, and the understanding of how feelings change.

Ambivalence has been a central concept in psychoanalytical literature. Freud (1909) talked about it in his analysis of "Little Hans" and the "Ratman", pointing to the emotional turmoil caused by the conjunction of love and hate. Ambivalent feelings are considered to be part of normal development and the psychoanalytical literature considers that ambivalence is related to the development of object constancy and object relations and that it is involved in many of a person's significant relationships (Abraham, 1924; A. Freud, 1965;

Mahler, Pine & Bergman, 1975; Kernberg, Selzer, Koenisberg, Larr, & Appelbaum, 1989).

Additionally, what causes feelings and how to change them is a critical theme in psychotherapeutic interventions. Most treatment sessions touch on a person's emotional experience and on how to modify, influence or control it. Children's understanding of what causes feelings and the strategies for changing them is then an area of crucial interest for clinical practice and is therefore considered here as well.

Multiple Feelings and Ambivalence

The concept of multiple feelings and of ambivalence refers to the awareness that two or more different feelings can be present at the same time. Ambivalence also presupposes the understanding that these simultaneous feelings interact with and influence each other.

The hypothesis that older children have an easier understanding of the experience of multiple and conflicting feelings has been confirmed in a number of studies. For example, Harris (1983) presented stories depicting emotional conflict[4] to 48 children of 6 and 10 years of age and asked them to choose, prompted by

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[4] e.g.,, "Late one night there is a bark outside the door. It's Lassie, your dog. She has been lost all day and she has come home, but she has cut her ear in a fight."

drawings, the feelings the protagonist would experience. He found that children had a harder time acknowledging both emotions when they were presented simultaneously than when they were presented separately, though less so for the older than for the younger children. Similar results where found by Meerum Terwogt, Koops, Oosterhoff, and Olthof (1986) using the same methodology with Dutch children of the same ages. Meerum Terwogt and Olthof (1989) also found that experiencing opposing emotions influences the intensity children attribute to each of them. Young children in particular tend to attribute lower intensities to conflicting emotions as if experiencing multiple feelings would weaken one or both of them. Older children, however, were able to maintain high intensity for both feelings.

Olthof, Meerum Terwogt, Van Eck, and Koops, (1987) presented the same type of stories to 80 children of 6-7 and 11-13 years of age, but this time an emotionally charged situation provoking one feeling was followed by an emotionally charged situation that would raise an opposing feeling. The authors found that younger children tended to disregard the first emotion more frequently than older children. They were also less aware of the possibility of a prior emotion influencing a later one.

Most authors nevertheless have taken the structural approach to describe the acquisition of multiple feelings. For example Selman (1980) proposed that the understanding of Subjectivity[5] (the properties of thoughts, feelings and motives, as previously said) developed in five levels. At the first level, Level 0 (ages 3 to 5), the child thinks that only one feeling at a time is possible. At Level 1 (ages 5 to 11) there is a beginning of understanding that you can experience more than one feeling, but that each would be directed toward different situations and objects. At Level 2 (7 to 14 years of age) opposite feelings are considered to be experienced sequentially. At Level 3 (11 to 20) opposite feelings are considered as occurring simultaneously. Finally, at Level 4 (17 to 32+) opposite feelings toward the same object are integrated into a new qualitative emotional state, a mixture of the others but of a different quality than each of them.

Selman's model is a wide scheme encompassing vast ideas. It constitutes an interesting attempt to structure children's and adults' notions about interpersonal concepts. It has certainly sparked interest and led research in the area. As with all first proposals, however, the descriptions, particularly that of the domain of Individuals, need to be refined and more precise definitions of the

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[5] One part of the "Individuals" domain.

levels need to be worked out (his levels, for example, are attributed to a wide range of ages which overlap one another). Donaldson (1984) comments on Selman's work, stating that Subjectivity and the development of ambivalence constituted only a minor issue in the model. She adds that the measurement of ambivalence was based on only one combination of feelings (happy and sad) and that the stages were schematically and not clearly described. In summary, one can conclude that Selman's work is a wide-scope attempt at presenting a framework of information on which much work needs to be pursued. Nevertheless, it was the first attempt to organize knowledge of the area of interpersonal understanding into a developmental model.

Carroll and Steward's study (1984) explored children's understanding of feelings using Selman's structural model. Their research used a different procedure to assess understanding. Instead of using stories they asked children simple questions about whether they could feel, for instance, happy and sad at the same time. Carroll and Steward included three feelings combinations: "sad and mad", "sad and happy", and "mad and happy". The authors report that older children (3rd graders, n = 30) scored at higher levels of understanding of emotions than younger children (preschoolers, n = 30).

Harter and her colleagues (Harter, 1986; Harter & Buddin, 1987; Harter & Whitesell, 1989) proposed a completely different sequence for the progression of the understanding of multiple feelings. They considered both the valence (positive or negative) and target (the object, situation or person toward which they are directed) of feelings in establishing the levels of children's understanding. They assessed 126 children, ages 4 to 12, using two boards. Each board had two rectangles at the top where the children could place pictures representing feelings. The rectangles had arrows pointing down. In one of the boards there were two squares under the rectangles, representing two targets, and each rectangle had an arrow pointing to each one of the squares. The other board had just one square with both arrows pointed to it. Children were asked to place feelings of the same valence (both positive or both negative) or of different valence (one positive and one negative) in the squares. Thus, both feelings could be directed to the same target (just one square) or different targets (two squares). Valence of feelings and number of targets created four combinations of the experience of multiple feelings: same valence/different target, different valence/different target, same valence/same target, different valence/same target. All children were presented with the four combinations in random order. Once the children placed the

feelings (either of the same or different valence) on the rectangles at the top of both boards (one with one target and the one with different targets) they were asked to describe a situation where they had experienced both feelings at the "very same time". The authors then used a scalogram analysis to determine whether children's responses defined a scalable, developmental sequence. According to their research, children pass through five levels in their understanding of multiple feelings. At Level 0 (mean age = 5.2), children denied the possibility of experiencing different feelings simultaneously but indicated that they could be experienced one after the other ("You can be happy, and then sad"). At Level 1 (mean age = 7.3), two feelings could be experienced at the same time, but they have to be of the same valence (both positive or both negative) and both directed at the same target ("I was happy and proud that I hit a home run"). At Level 2 (mean age = 8.2), children could describe experiencing feelings directed at different targets, but both feelings must still be of the same valence ("I was bored because there was nothing to do, and mad because my mom punished me"). At level 3 (mean age = 10.1), children could accept the experience of feelings of different valences but they would direct them at different targets ("I was scared my mom was going to punish me for not cleaning my room, and happy that I was watching TV"). At Level

4 (mean age = 11.3), children could describe situations in which one could experience different feelings toward the same target at the same time ("I was glad that my grandmother was visiting us, but mad because she did not bring me a present") (Harter & Buddin, 1987). A later study (Whitesell & Harter, 1989) reported that children do not necessarily view experiencing opposing emotions as a clash. In only 44% of the situations children indicated that opposing emotions caused conflict. Children experienced conflict when the negative feeling was more intense than the positive, and when the feelings were considered more dissimilar (they were "really different").

Based on Selman's theory and his method of telling children stories and asking in-depth questions about them, Donaldson (Donaldson, 1984; Donaldson & Westerman, 1986) extended the study of ambivalence by adding love/anger to the happy/sad combination that Selman used. These authors proposed a slightly different sequence for the acquisition of the concept of multiple feelings. Their sequence is based on Selman's but they also investigated whether children would spontaneously mention the presence of conflicting feelings and if they believed that these feelings would stay separate or could mix and influence each other. They blended levels 3 and 4 of Selman's into one level, in which

conflicting feelings are conceived as simultaneous but also can be mixed. In their sequence, Level 0 children deny the occurrence of multiple feelings. At Level 1, multiple feelings, even contradictory ones, may occur, though children would mention them only when probed and deny they mix or influence each other. At Level 2, children accept the existence of multiple feelings but find it hard to reconcile them. At Level 3, children understand ambivalence, recognizing that opposite feelings can co-exist and influence each other. In their research they studied 60 children belonging to three age groups: 4-5 year-olds, 7-8 year-olds, and 10-11 year-olds (n = 20 in each group). Children were interviewed using two kinds of tape-recorded stories. In one story, the protagonist could be perceived as feeling happy and sad, and in the other as feeling angry and loving. The authors found, as expected, that older children had higher levels of understanding than younger ones. Of all the variables they took into account in the statistical analysis (age, order of presentation of the stories, socioeconomic status, sex, and verbal intelligence), age was the one most significantly related to the child's level of understanding of ambivalence (contributing R^2 = .70 for ambivalence happy/sad and R^2 = .61 for ambivalence love/anger in a hierarchical multiple regression analysis). Neither socioeconomic

status, sex nor verbal intelligence were significantly related to any of the two kinds of ambivalence.

Donaldson (1984) presents the most clearly delineated manual for the scoring of both ambivalence and of how feelings change. Her research presents a clear distinction in emotional understanding at three ages, from kindergarten to pre-adolescence.

Another procedure for assessing multiple feelings was introduced by Wintre and Vallance (1994). They added the dimension of intensity of emotion as an indicator of level of acquisition in emotional understanding. They asked children from 4 to 8 years of age (n = 80) how they would feel and how intense would be the feeling in situations that involved the emotions angry, happy, sad, scared, and loving (for example "your best friend moves away" or "you have a nightmare")[6]. They presented brief descriptions of 15 situations to the children and scored responses to each situation on a scale from A to D. At level A[7] only one emotion was reported. Level B was assigned to reports of multiple emotions of the same valence with maximum intensity. Level C was assigned to reports of multiple emotions of the same valence but with varying intensity. Level D was assigned to reports of opposite-valence

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[6] Other examples of these were: "you see a friend's baby kittens playing in the yard", "your pet dies", "some one calls you bad names".
[7] In the end no subjects were scored at Level A because all children who gave responses at Level A also gave at least one response at a higher level.

emotions with varying intensity. The authors conducted a scalogram analysis to test the developmental sequence of the four stages, integrating the three dimensions: intensity, multiple feelings, and valence. Their results indicated that the mean age of the children was higher at each level. Again, this study introduces a new methodology and another element (intensity) and considered five emotions (adding "loving" to the basic four: "happy", "sad", "mad", and "afraid"). According to their results, children acquire the notion of multiple feelings earlier than reported by other authors. At eight years of age at least some children scored at level D. It is hard, however, to compare this study with the previous ones because the method used by Wintre and Vallance did not elicit opposing feelings intrinsically. Rather, these researchers suggested the alternative feelings to the children after hearing their initial response. For example, if the child offered "'I would feel sad", the interviewer would then ask, "Would you also feel loving?" Their scoring was based on whether of not the child accepted their suggestion that they could experience other feelings as well as the first. This constitutes a different condition than asking children to produce situations where conflicting feelings occur, or to answer questions about stories where the protagonist experiences conflicting emotions.

In summary, research has established that as children grow older they are more able to recognize and integrate the experience of conflicting feelings. Different authors have proposed different sequences for this process as they take into account the valence, the intensity, the target of the feelings, or the ability of the child to recognize the feelings spontaneously. However, researchers have used a variety of methodologies to assess the understanding of multiple feelings, making it difficult to draw comparisons. It is possible that children give different answers when questioned about their own feelings than when asked about the feelings of others (it seems to be easier to understand others than to understand oneself). It is also easier to explain an answer to a given situation than to produce an example of an emotional conflict.

Most studies in the area have centered on preschoolers to pre-adolescents, probably because of their ability to express themselves verbally. Though emotional understanding is supposed to expand in adolescence and adulthood, few studies (Harris, Olthof & Meerum Terwogt, 1981; Harris, Olthof, Meerum Terwogt, & Hardman, 1987; Nannis & Cowan, 1987) have considered these ages and none have taken adulthood into account within a developmental framework[8].

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[8] We will review later the studies on adults on the subject of ambivalence.

Additionally, studies fail to link or explain what causes children to advance or stay behind in the sequences of development.

Feeling Change and Causes of Feelings

When studying the strategies children suggest they would use to change feelings authors have also looked into children's ideas of what causes feelings. The assumption is that the type of strategies to be used is connected to the ideas of what causes the emotions. Thus, most of the literature dealing with feeling change focuses on the development of children's ideas about what causes feelings.

Researchers have also taken different approaches to the question of children's understanding of the causes of emotion. Some studies examine the children's ability to consider emotions as a result of the circumstances that surround them and their ability to make attributions about others' behaviors and feelings. Other studies look upon children's concepts of the nature of emotions, looking into whether children consider feelings are the result of external or internal processes and the strategies for change would be used accordingly, such as changing facial expressions or diverting thoughts. These latter studies use two approaches one looks at the attributions about emotions and the other explores specific strategies children think can be used to change emotions.

a) Attributions: Research on emotional attribution is based on social cognition theories and focuses on attributions or beliefs about situations that cause emotions. In their review of the literature on this topic, Masters and Carlson (1984) concluded that children as young as three could accurately predict what emotions might be caused by different situations. This understanding is refined with age and with children's ability to integrate background information about the situation.

The research on children's attributions of causes of emotions suggests that young children predict emotions based on outcome (e. g., they would predict feeling happy if the outcome is positive). As they develop, however, children increasingly take other circumstances into account such as causal attributions (whether they think causes of behavior are internal or external to the individual), and tend to predict feelings of a more complex nature such as pride, guilt, gratitude, and anger (Graham & Weiner, 1986; Thompson, 1987).

Weiner and his associates (Weiner & Handel, 1985; Graham & Weiner, 1986) showed that the feelings children report when faced with rejection by a peer, for example, are influenced by the child's perception of the reasons for the rejection (internal or external) and by the child's perception of the power of the peer in the situation.

Thus, children from kindergarten to pre-adolescence considered that rejections caused by internal reasons (the peer did not like them because they were not good at games or the peer thought they cheated) led to feeling more hurt. Rejection also elicited more anger if the child perceived the peer to be in control of the situation (the other child decided to play with another friend or to stay home and watch T.V. rather than play with them) than when it was caused by a factor outside his influence (for example, the mother would not let her child play) (Weiner & Handel, 1985).

Graham and Weiner (1986) observed that while the emotional response linked to controllability of circumstances seemed to be consistent in children aged 5 to 11, the intensity of the reported feelings showed differences related to age. Older children (10 to 11 years of age) expressed more guilt when they perceived they were in control of a situation that caused harm to another child than when they believed they had had less control over it (e.g., they had tried to avoid hitting a small child). They also expressed more pride in themselves when they perceived internal reasons as the cause of achievement (they got good grades because they studied hard) than when they thought it was due to external causes (the test had been easy). Children also felt more grateful when they considered that the person who had done a good deed for them had more control of the

situation (e.g., he or she wished to do the deed) than when they felt that the person had been forced by circumstances to be nice. Younger children (5 to 7 years of age) showed little variability in the intensity of the guilt, pride or gratitude they reported.

Thompson (1987) presented children with stories depicting situations that varied according to situational domain (achievement or moral), outcome (positive or negative) and causal attribution (effort, other or luck). He found that older children (5th graders, 10 to 11 years of age, n=24) would report more complex emotions, such as pride, guilt, gratitude, and anger ("causal attribution-dependent"), in response to how the protagonist would feel. Younger children (2nd graders, 8 to 9 years old, n = 24) responded with more outcome-dependent ("causal attribution-independent") emotional responses such as happy or sad when asked to justify the protagonist's feelings. Older children also gave more justifications relevant to the causes of the situation while younger children referred to the story outcome. The author also reports that while some emotions like grateful and angry, were consistently associated with their relevant causal attributions across age ranges others, such as pride and guilt, were linked to their appropriate causes by the group of older children. In a later work Thompson (1989) states that children go through three steps in their understanding of attribution-related

affects. In the earliest understanding, children give emotional responses based on outcome, which he calls *primary appraisals.* These are more simple or direct emotions, such as happy or sad, according to the result of the situation. In the second step, children are able to respond with complex emotions based on attributions. He calls these *secondary appraisals,* but cautions that children move back and forth between primary and secondary appraisals. He also states that these secondary appraisals are initially non-specific. In Thompson's third step, children are able to take into account "the specific attributional cues" related to particular emotions and to accomplish a more refined analysis of the situations and their consequences.

b) Strategies: Regarding the type of strategies children consider can be used for causing and changing emotions, researchers have observed that as children grow older they exhibit a change from believing that emotions are caused by external events to recognizing more internal causes. In their study about the understanding of feelings Harris, Olthof, and Meerum Terwogt (1981) asked 6, 11 and 15 year-olds about what strategies they could use to change their feelings. The authors report that younger children mentioned concrete strategies such as changing the situation (e.g., playing with friends) while older children suggested

cognitive strategies like "thinking about other things". A similar picture appeared when children suggested strategies to help other children change their emotions. Younger children offered "material nurturance" (giving, sharing, buying something), while older children suggested "verbal nurturance" (defined as giving reassurance or reasoning with the child in addition to material offerings). Though less frequently, older children also mentioned "helping strategies", (giving assistance or offering suggestions). Again, older children were more likely to take into account the context of the situation, whether it was social or non-social, than were younger subjects (McCoy & Masters, 1985).

Some authors have proposed a structural framework for the acquisition of the understanding of the causes of feelings on the same lines as for multiple feelings. They have described a progression that goes from external to internal causes and various studies have been conducted in the area. These authors differ in the number of levels they postulate or they focus on different aspects of the sequence of acquisition of the concept.

For example, Carroll and Steward (1984), in the study already mentioned on page 21, proposed a sequence of four levels for the acquisition of the concept of how feelings change. They indicated that at Level 0 the children either did not answer or denied

knowledge, while at level 1 emotional change was seen as being caused by a change of situation or an external bodily change ("You can move your face"). At Level 2, the emotional change was attributed to the changing of the behavior associated with the emotion (e. g., a child would stop being sad when he stopped crying). At Level 3, children could propose a strategy initiated by the subject on his/her own that would change the feeling ("Try to think of something to do to make you happy"). Again, older children in their study tended to give answers at level 3 more frequently than did the younger children.

Nannis (Nannis & Cowan, 1987; Nannis, 1988) proposed a sequence about experiencing happiness (the only emotion considered in her study). Her study shows that young children (mean age = 5.10, n = 17) considered that happiness was initially caused by external events. Older subjects (mean age = 8.10, n = 18) considered a bodily organ like the brain or the stomach as the cause of emotion. Sixth graders (mean age = 11.10, n = 17) mentioned an internal process as the cause of happiness, but would relate it to external events only. Ninth graders (mean age = 15.2, n = 18) conceived feelings as being caused by internal physiological processes and by internalizing experiences: "They start in your mind

and they flow out through you," one of her subjects answered (Nannis & Cowan, 1987, p. 42).

Donaldson and Westerman (1986), who also considered the dimension of causality in their study described in the multiple feelings section, hypothesized a four-level sequence, from 0 to 3, to study how children age 5 to 12 believe feelings could be changed. Their sequence starts at Level 0 with denial of knowledge about how feelings change. At Level 1 there is recognition of the influence that external events have on feelings. At level 2 there is identification of the influence that thoughts and memories have on feelings. At Level 3 children could recognize that feelings can also be caused just by thoughts, memories and attitudes, with feelings regarded as an inner process that can be controlled and influenced by the person who experiences them.

To summarize, children's thoughts about how feelings change have been studied from various points of view. Some of the studies (Graham & Weiner, 1986; Thompson, 1987) take into account children's growing ability to consider ideas about attributions and causes of behavior, indicating that, with age, children become more sensitive to these contributions and better able to consider the influence they have on emotions. Other studies (Carroll & Steward, 1984; Donaldson & Westerman, 1986; Nannis & Cowan, 1987) focus

on the strategies children use or perceive as influencing the changing of emotions.

Some of the latter studies are of particular interest for clinical purposes, providing evidence that children express belief in their ability to use specific strategies to change emotions. This is an important element in psychotherapy, which seeks to help clients learn to feel differently in negative situations and to manage negative emotions.

Emotional Understanding and Children's Cognitive Skills

Few studies have examined the relationship between emotional understanding and language ability, or verbal intelligence. The few that have done so yield contradictory results, some indicating that emotional understanding is related to verbal ability and some reporting that it is not.

Carroll and Steward (1984) for example, correlated emotional understanding with the subject's performance on two cognitive tasks of classification and conservation, as well as with verbal intelligence (measured with the Peabody Picture Vocabulary Test). Their subjects were 30 preschoolers (4 and 5 years of age) and 30 3rd graders (8 and 9 years of age). They observed that affective

understanding was positively related to scores on the cognitive tasks and also to verbal IQ: children with higher verbal intelligence obtained higher scores on the affective tasks.

Other studies have also found a significant positive relationship between emotional understanding and verbal ability in children of pre-school age (Hughes, Dunn, & White, 1998; Cutting & Dunn, 1999) and in older school-age subjects (Cook, Greenberg, & Kusche, 1994).

On the other hand, Donaldson and Westerman (1986), whose study was described on pages 24-25, found that Verbal Intelligence (measured using the Information, Vocabulary and Similarities subtests of the WPPSI and the WISC) did not account for a significant part of the variance of any of the variables of emotional understanding. Verbal IQ was also not significantly correlated with the understanding of ambivalence. However, the interaction of Verbal IQ and age was significant in the understanding of feeling change for both the oldest (10 to 12 year-olds, n = 20), and the youngest (4-5 year-olds, n = 20) children, but not for the middle range (7-8 year-olds, n = 20). Higher scores on the understanding of feelings change were significantly correlated with higher Verbal IQ in the older children (10 to 12 years of age).

Furthermore, in a study that will be reported on page 80, Southam-Gerow and Kendall (2000) report no correlation between emotional understanding and intelligence. The authors point to the small sample (n = 38, subjects varied from 7.5 to 15.3 years of age) as the reason for the conflict between this result and the published literature. Another factor might have been the wide age range of their subjects. These researchers also used as intelligence measures two of the WISC-III subtests, Vocabulary and Block Design. Though studies indicate that these are the subtests that load higher on the g (General Intelligence) factor (Kaufman, 1994) it may be that they are not as complete a measure of verbal intelligence as the ones used in other studies.

Bohnert (1999), whose research will be described on page 72-73, reported partly similar results: this author found no correlation between most of her measures of emotional understanding and the Block Design subtest in school aged children (mean age=9.1). However, developmental understanding of self was positively related with scores on the Vocabulary subtest and emotional understanding of feelings in self and in others were significantly related to verbal expression as measured by the Verbal Fluency subtest of the McCarthy Scales of Children's Abilities.

The small number of studies that examine the correlation between emotional understanding and intelligence show mixed results, some indicating that intelligence, particularly verbal intelligence, is positively related to emotional understanding, and others reporting that there is no relation between them. Furthermore, there is one study that has found significant relations with some aspects of verbal intelligence and not with other intelligence skills (Bohnert, 1999). This last result suggests that emotional understanding might not be related to cognitive ability as a composite score but to some aspects of intellectual ability. It might also be that different aspects of emotional understanding could be related to different aspects of verbal ability. Since studies have used different tests, and even different subtests of the Weschler Intelligence Scales, it is difficult to identify the reasons for the various results. This is a point that would require more investigation in order to be clarified.

Emotional Understanding of Specific Emotions

A few researchers have taken into account the possibility that the pace of development of understanding of certain emotions might differ from the pace for other emotions, and so have examined

emotions individually. This is in contrast to the standard practice of calculating a composite score for several different feelings. Some studies using this method have found, for instance, that preschoolers can identify "happy" early on, while "sad", "angry", and "afraid" come later (Gardner, Jones & Miner, 1994; Hughes, Dunn & White, 1998). Gardner et al. (1994) also found that different aspects of family socialization influenced a child's knowledge of individual feelings.

Older children find it easier to identify, describe and explain causes and consequences of "happiness" than of either "sadness" or "anger" (Shipman & Zeman, 1999). Some research also indicates that children find it harder to predict "loving" even if they understand and recognize it. Boys in particular tended to mention feeling "happy" in situations that would normally elicit a loving feeling, such as seeing a friend playing with baby kittens or being introduced to a baby (Wintre & Vallance, 1994).

On this subject, Stein and Levine (1999) write:

> "When children talk about the causes and consequences
> of basic emotions, each emotion carries with it specific
> conditions that do not occur in the representation of
> other emotions. The appraisals and wishes associated
> with happiness do not overlap with those associated

with the three negative emotions [sadness, anger and fear]" (p. 403).

Therefore, one might conclude that understanding and knowledge of diverse emotions should have differing paces of development. As already mentioned, however, few studies take an approach that allows a differential examination of emotions. Most research combines children's answers regarding different feelings into a composite score. This results in a lack of information from which to discern variable development in the understanding of specific emotions.

Family Influences on Emotional Understanding

As stated above, it has been hypothesized that the development of emotional understanding is influenced by inherent qualities of the individual, such as cognitive skills. In addition, authors frequently point to the influence of the environment in explaining how emotional understanding develops.

Gordon (1989) says that society determines the child's understanding of feelings in three ways. One is by creating a culture of norms, beliefs, vocabulary and ideas related to feelings. Another is by defining the standards for being "emotionally competent",

standards that children learn in their everyday interaction with caregivers. Finally, society influences emotional understanding by regulating children's exposure to emotions and by establishing when and how children are exposed to certain feelings; for example, in Western society there is still a reluctance to confront children with death and mourning.

Saarni (1989a, 2000) proposes that emotional experience is also influenced by the significance society and culture attribute to it. Her research suggests that society influences the expression and the interpretation of feelings in various ways. One is by direct socialization, approving or rejecting emotional expression, setting rules about what is and what is not appropriate to express, and when and where it can be expressed. Another way is by showing the child how others experience and interpret emotions. Lastly, society influences the child by communicating the expectations about emotions that society sets for its members.

This author points, as well, to the active roles parents play in this learning process. Parents often function as "coaches" teaching their children the what, how, and when of emotions. In addition, parents and children influence each other's emotional responses, modifying each other's feelings and emotional behavior, and children incorporate their parent's emotional behavior into their

own, reacting in a way similar to their parents when confronted with emotional situations (Saarni, 2000).

Saarni (1985,1989b) centered her research on the development of emotional self-control in social transactions, focusing on how parents' attitudes influenced their child's emotional behavior and on understanding how and when feelings could be expressed. The author developed a scale called Parent Attitude toward Children's Expressiveness Scale (PACES), a 20-item questionnaire intended "to elicit parents' expectations about their response to their own child's expressive behavior" (Saarni, 1989c, p. 2). The psychometric properties of this scale have been researched and published. Data from some of these studies show, for instance, that mothers tend to be more permissive than fathers[9] (that is, they obtain lower scores) and that parents who have more children tend to be less authoritarian[10] in their attitudes toward their children's emotional behavior.

In her first study, Saarni (1985) examined the relationship between the child's ideas about the importance of controlling one's emotions, the strategies to be used to achieve self-control, the

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[9] The author noted that as parents have more children they become more accepting, that is they obtain lower scores on the PACES. Women tend to be more accepting than men: mean score for women=37.21, SD=6.11; mean score for males=39.81, SD=7.2

[10] The author reports a negative correlation between PACES score and number of children.

circumstances in which it would be appropriate to do so, and his/her parents attitudes toward their child's emotional expression. Saarni questioned 32 children, from "an urban West Coast (USA) parochial school" aged 7 to 13 and their parents about their beliefs about how to achieve a balance between showing their feelings or not according to the responses they expected from others. Parents' perceptions of their own self-monitoring of feelings and the family's social climate were assessed as well. A stepwise regression showed that while age accounted for most of the variation in the children's understanding of emotional display (including justification, consequences and balance of expressive affective behavior) parental variables also affected the child's ideas about the need for self-control. Children whose mothers showed more controlling attitudes gave more elaborate explanations about when and why they would express their feelings. Furthermore, fathers' abilities and motivation to control their own emotional behavior contributed to their child's understanding about why emotional behavior should be controlled.

Some studies indicate a lack of relationship between parents' expression of and behavior toward feelings and their children's emotional understanding. For instance, children and parents do not agree on the strategies to exercise emotional control and do not agree either on the causes of their own feelings, according to Covell

and Abramovitch (1987). These authors explored the relationship between children's and parents' beliefs of causes of intrafamily emotions and the strategies that could be used to change them. One hundred and twenty-three children from middle class backgrounds, of three age groups (5 and 6, 7 and 9, and 10 and 15) responded to an open-ended questionnaire that asked them how they could tell whether their mothers were happy, sad or angry and if and how they could change the way their mothers felt. Fifty-four parents from a separate sampling pool were asked what caused their feelings of happiness, sadness and anger, how their children would know about the way they felt, whether children could change the parent's feeling, and if the parent could change their children's feeling. While parents more often suggested some kind of verbal behavior to change emotions, children, especially young children, proposed both verbal and material strategies, such as giving gifts or treats. Parents never suggested this last strategy. In addition, the authors found that there was little agreement regarding causes of feelings in the family. Children thought they were very frequently the cause of their mother's anger, while mothers attributed their anger to abstract causes such as injustice, violence, poverty, insensitivity and the state of the world. Children and parents also disagreed on the causes of the child's anger. Children more often attributed their anger to their

families and parents did not. While parents thought that family was the cause of their own happiness, children tended to judge events external to the family as the cause of happiness.

Other studies point to the relationship that a family's emotional expressiveness and parents' readiness to discuss feelings have with children's emotional understanding. These studies indicate that when parents are more emotionally expressive, are more ready to discuss their feelings, and to talk with their children about how to deal with them, children's emotional understanding is strengthened.

For instance, Kalliopuska (1985) studied the relationship between the child's ability to recognize emotional expressions and their parents' accuracy in appraising their partner's emotions. The author suggests that parents' appraisal of each other's emotional reactions is an indicator of the family' emotional communication. Kalliopuska found that when parents were unable to accurately predict each other's feelings, their pre-school girls were less skilled in recognizing emotions. She concluded, "These results support the supposition that parents' communication of emotion influence the development of their children's emotions" (p. 1177).

Another study with preschool children of both sexes (3 year-olds, n = 50) indicated that children who had more conversations

with their mothers about feelings, as observed at home for two periods of 1 hour and 15 minutes each, were better at labeling and identifying feelings in others when assessed seven months later (Dunn, Brown, Slomkowski, Tesla, & Youngblade, 1991). Dunsmore & Karn (2001) conducted a study of 115 mothers of middle to upper middle class background and their children of 4 to 6 years of age. They used puppets to depict stories eliciting emotional responses. This study found that mothers who thought it was important to talk to their children about emotions, and who believed that their children were ready to talk about feelings, had children more skilled in labeling and recognizing emotional expressions. The children in this study also were better able to predict stereotypical and non-stereotypical emotional responses (that is, responses that would be the same as or different from the one the child would have chosen if he were in the same situation as the puppet). Another study conducted with six-year-olds reiterates the positive influence that family talk about emotions has on the development of emotional understanding (Dunn, Brown, & Beardsall, 1991).

Emotional understanding seems to be influenced not only by the parents' readiness and ability to talk about feelings, but also by parenting practices and by the intensity of parents' emotional response to emotional behavior. Miller, Eisenberg, Fabes, Shell, and

Gular (1989) hypothesized that intense emotional reactions from the parents would contribute positively to the relation between parenting practices and children's emotional response to another child's distress. Subjects were 73 four to five year-olds and their mothers. In individual interviews mothers listened to nine audiotaped situations where one child caused distress or happiness to another child. They were then asked what they would say or do if the first child was hers and how strong their emotional reaction would be on a scale of one (slight response) to seven (extremely intense). Their responses to the child's behavior were coded into six parenting strategies: Inductive reasoning, Negative control, Situational definitions, Physical control, Prosocial suggestions, and Altruistic Responding. Their children were shown two films in which a child experienced a minor physical distress while playing and were asked to indicate their emotional reaction and its intensity by choosing a picture of the emotion (sad, happy, sorry or neutral) they would feel and a picture of how much they would experience that affect (a little bit, kind of, or very sad, happy or sorry). The authors found that both parenting strategies and parental emotional response affected the child's reported affect. Mothers who responded altruistically (saying they would check to see if the child were hurt) or offered prosocial suggestions (such as telling the child

to take turns with the toy), and who also reported reacting with feelings of lower intensity, had children who responded more empathically. In contrast, children expressed less empathy when mothers responded with very intense emotions and used negative control strategies (such as threats or negative comments about the child's behavior) or tried to explain the other child's point of view ("she is sad because you would not let her play with you").

Research also indicates that the emotional "tone" of the family and the parents' response to the child and his/her emotional expressions affects the child's emotional understanding. Gardner, Jones, and Miner (1984) predicted that negative emotion-socialization practices (general family conflict, maternal anger toward the child and discouragement of negative emotions) would be associated with lower levels of emotional knowledge. They measured 4 and 5 year-olds' (n = 46) emotional knowledge by their ability to label happy, sad, afraid and angry feelings, and by their ability to recognize the feelings others might experience in various situations. They measured family conflict with the conflict subscale of the Family Environment Scale, the maternal anger toward the child with the Parent Affect Test, and the maternal suppression of negative affect with the Discourages Emotional Expression scale. Their results indicate that mothers who express more anger toward

their children and who discourage the expression of negative emotions tend to have children who are less skilled in identifying angry situations, though they seem more skilled at recognizing sadness.

Furthermore, pre-school children whose mothers expressed more anger toward them not only talked less about feelings but also had a lower level of emotional understanding (Denham, Zoller, & Couchoud, 1994). These authors studied the contributions of mothers' emotional responses and conversations about emotions to their child's emotional understanding. They examined emotional labeling and emotions-situation knowledge (whether the child could identify what others would feel in emotional perspective-taking tasks) in 47 preschoolers and their mothers. Results indicate that mothers who used more emotion language, showed less negative emotional responsiveness and more positive emotional responsiveness had children with higher emotional understanding, while higher negative maternal expression was associated with lower emotional understanding.

Other authors examined the relationship between parental beliefs about feelings and children's emotional understanding. In a study by Dunsmore and Kahn (2001), 115 mothers responded to the Parents' Beliefs about Feelings Questionnaire and to the Self-

Expressiveness in the Family Questionnaire (a self-report measure that assesses the family's expression of emotions). The mothers' children (4 to 6 years of age, n=115) were asked to indicate what emotions would be experienced by a puppet in situations that could elicit happy, sad, angry or fear feelings. Results of the study indicate that mothers who believed that their children were not ready to talk about feelings and who did not express positive feelings had children who were less apt to predict expected emotional expressions.

Other studies, however, have not found connections between families' emotional behavior and children's emotional understanding. The study by Cassidy, Parke, Butkovsky, and Braungart (1992) is one of these. The authors examined the relationship between the emotional understanding of kindergarteners and first-graders (n=61) and the family's emotional expressiveness by observing their interaction during a game at a laboratory and assessing it through a questionnaire. They concluded that the family's positive and negative expressiveness both at home and in the laboratory were not related to any area of the child's emotional understanding, nor with the child's own emotional expressiveness. Only one of their correlations was significant: "mothers who reported more negative expressiveness [e.g.,

communicate negative emotions more often] in the home had children who reported expressing more emotions [actions and feelings mentioned by the child in response to photographs depicting happy, sad, angry and fear feelings]" (p. 611).

One of the most in-depth and broad studies of family emotional communication is the one reported by Gottman, Katz, and Hooven (1997). These authors proposed a model "to predict and understand" children's development that includes four domains: meta-emotion, parenting styles, the child's regulatory physiology and the child's regulation of emotion. Their goal was to assess the influence these four domains had on five aspects of children's functioning: child peer relationships, negative affectivity (or disposition to experience negative emotions), development of behavioral problems, physical health, and academic achievement combined with ability to focus attention.

Gottman, Katz, and Hooven (op. cit.) defined meta-emotion as the "Parents' awareness of specific emotions, their awareness of these emotions in their child, and their coaching of the emotion in their child" (p. 6). By "emotional coaching" they refer to the actions parents perform to teach their children how to talk about feelings, their acceptance of their child's feelings, and the assistance they

give their children in developing strategies and goals to deal with feelings.

Gottman and his colleagues observed and interviewed 56 families and their child of kindergarten age. They used a semi-structured interview with both parents to assess six variables of meta-emotion: parental awareness of their own sadness, parental awareness of child's sadness, coaching of sadness, parental awareness of own anger, parental awareness of child's anger, and coaching of anger. Some examples of their interview questions are: "How do you feel about being sad/angry?" "What would I see if I saw you sad/angry?" "How do you react to [the child] when (s)he is sad/angry?" "What are you trying to teach [the child] about sadness/anger?"

Parenting styles were determined by observing parent-child interactions in a structured situation where the parents were asked to get information from the child about a story he/she had heard previously and to teach him/her how to play a video game. The authors also collected urine samples to measure level of stress hormone, catecholamines, and cortisol. Heart rate and sweating level were also measured. Children's facial expressiveness, their reactions to emotional films and their ability to reproduce happy, angry, fear, distrust, and sad emotions was also assessed. Families were

interviewed a second time three years later (when the child was around eight years old) and outcomes on the developmental variables (peer relationships, behavioral problems, physical health, negative affectivity, and academic achievement) were evaluated via parents' and teachers' ratings. The authors suggest from their results on the concept of meta-emotion that the way parents feel about their own sadness and anger, the way they feel about their children's displays of sadness and anger and how they respond to these emotional behaviors is related to some types of peer interaction. For example, parental tendency to derogate feelings is related to more negative peer interaction and to expressing more negative affect in play. Meta-emotion, particularly the mother's, is negatively related to children's physical illness and is positively related to school achievement.

On the other hand, Gottman et al. (1997) found that meta-emotion was not significantly related to the child's emotional response to films designed to elicit happiness, anger, disgust, fear or sadness. In addition, meta-emotion was not related either to the parents' emotional expressiveness during couple interactions or during parent-child interaction. In fact, the few significant correlations found were all negative: parent's higher awareness of emotions and more frequent coaching practices correlated with

fewer facial expressions of emotions both of themselves and of their children, particularly for "sadness". Thus, meta-emotion does not appear to be clearly related to emotional expressiveness, though it does seem to be related to other areas of the child's functioning, such as peer relations, academic achievement, and physical health. The authors conclude that meta-emotion constitutes an important area of family functioning, more significant to the child's emotional development and competence than specific child-rearing practices, or the family's predominant affect.

In summary, many authors propose a relationship between the family's likelihood to discuss feelings with their children and to express feelings openly, and the child's ability to express and understand feelings. Studies have shown that parents and children agree, for example, on the situations in which feelings should be controlled (Saarni, 1989b) though not on the causes of emotion and strategies of control (Covell & Abromovitch, 1987). Studies have also indicated that parents who provide emotional structure and who talk to their children about feelings have children with enhanced or more developed emotional understanding (Gardner, Jones, & Miner, 1984; Dunsmore & Kahn, 2001). Nonetheless, the findings are not conclusive about the influence of family expressiveness and emotional tone. Some suggest relationships between these

behaviors and the child's emotional understanding, but others seem to offer contrasting results. It is worth noting that most studies have been done with pre-school children. Additionally, most of the studies have examined emotional understanding from the point of the child's ability to identify, discuss, and predict feelings in others. None have examined the relation of parenting practices of emotional behavior with other aspects of emotional understanding such as causes of emotion or multiple feelings.

Socio-Demographic Variables of the Family and Emotional Understanding

Very few authors have studied the relationship between parents' educational level or occupational status to children's emotional understanding. Those who have done so, however, predict a higher level of cognitive-emotional development in children from families from more favored backgrounds.

From a theoretical point of view, Cohn (1992) says that there are class differences in the awareness and in the emotional understanding of feelings, pointing toward a more developed awareness in more educated and better situated families. The author states, "We argue that in the absence of countervailing conditions, members of the upper classes are likely to have a more highly

differentiated set of [emotional] labels available to them, thereby allowing higher levels of self-understanding" (p. 3). According to Cohn, members of different socioeconomic classes have different parameters by which to judge what emotions are appropriate to a given situation and the intensity with which they should be expressed in that situation. The author further indicates three factors present in the middle-to-upper class milieu that *promote* emotional understanding which are usually absent within the lower class subculture. One of these factors is a cultural emphasis in the upper classes that values the expression of emotions. Middle class people tend to absorb and to identify with this value more easily than do the lower classes. A second factor is the possibility that the upper classes have contact with people from more diverse backgrounds and with more varied experiences. A third factor is that better-situated families usually experience less emotional distress. This presumes that as emotional distress becomes increasingly overwhelming, the more the person experiencing it tends to "wall themselves off" from the experience, thus creating a less conscious experience and fewer possibilities to talk about the emotions. This leads in turn to a less "differentiated and refined emotional vocabulary". Since members of the less-favored classes tend to experience more stress, Cohn presupposes that they would talk less

about their emotions and their emotional vocabulary would be more restricted.

The author also supposes that the feelings of powerlessness about life events that people from low-income classes often have extends to their emotions. This feeling of powerlessness also reduces their desire to think about their feelings, making them "less confident in the application of emotional labels", and less confident about what they feel and why. He states that this is in direct opposition to the experience of the upper classes, who are much more aware of emotions and develop a clearer knowledge of the importance of managing and working through feelings.

Studies done independently of and prior to Cohn's (1992) publication have arrived at similar conclusions, that low-income families are less emotionally expressive and more restrictive in their emotional experience than are middle-class families (Lambert, Hamers, & Frasure-Smith, 1979; Halberstadt, 1985). Nonetheless, little research has been done that has studied or described emotional understanding in low-income children and families.

Gardner, Jones, and Miner's study (1994) –mentioned in page 50- was one of these few. The authors concluded, "Low-income children display a pattern of emotional knowledge which is comparable to that of middle-income preschoolers (p. 634)". The

first author conducted another study (Gardner, 1996) in which she examined the relationship between emotional understanding (defined as emotional role taking, knowledge of rules for emotional displays and affective/moral attributions), prosocial behavior, and peer relationships in school-age children. A second goal of the study was to obtain descriptive information about low-income children's skills in emotional role taking and knowledge of rules for emotional display. Gardner contacted 40 3rd and 4th graders at a school from a working class, low-income neighborhood. She interviewed the children with 10 emotion-eliciting vignettes accompanied by drawings, wherein the facial expression of the protagonist was incongruent with the situation illustrated. Knowledge of rules for emotional display was assessed with seven emotion-eliciting stories accompanied by drawings with blank faces (children were asked how they thought the protagonist felt inside, what feeling he or she showed on the outside, and why would he/she hide his/her true feelings). Affective/moral attributions were also assessed via eight emotion vignettes wherein the story character observes a distressing event. As she had predicted, Gardner's results indicate that higher skills in emotional role taking and knowledge of emotional display rules are associated with higher scores in prosocial behavior and with more positive interactions with peers. Regarding her second

goal, Gardner concludes that children from low-income families respond to emotion-eliciting situations with the same emotions (they indicate more empathy and altruistic and aggressive responses rather that guilt or denial) as children from middle-class backgrounds. As do their peers from middle-class backgrounds, children from low-income families report prosocial rather than self-protective motives when explaining rules for emotional displays. The author concludes that the family's income level does not play a significant role in the development of affective understanding skills.

Other studies, however, point to some relationship between social class and emotional understanding. For example, Dunn, Brown, Slomkowski, Tesla, and Youngblade (1991) found that emotional understanding (defined as labeling of emotions and affective perspective taking[11]) in young children (n = 50, aged 1.3 to 6.3 years of age, mean age = 3.5 years) was positively related (r = .45, p < .05) to their father's occupational prestige (based on a scale from 15 to 88 points from the National Opinion Research Corporation) though not to mother's education. In another study, Cutting and Dunn (1999) report a significant relationship between

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[11] The affective perspective-taking task consists of the following: the child is presented with 16 vignettes of emotion-inducing situations ranging from getting a new bike to being punched by a sibling. The child is asked how does the protagonist feel. In half of the situations the protagonist then is presented as feeling the same way most people would feel and in the other half the protagonist expresses the opposite feeling that the interviewee's mother indicated the child being interviewed would feel.

the child's affective perspective taking and affective labeling and

mothers' education (r = .41 and r = .38, both p < .01) and

occupational level (r = .30 and r = .26, both p < .01) and fathers'

occupational level (r = .30 and r = .34, both p < .01). Affective

labeling (identification of feelings) was also positively related to

father's education (r = .31, p < .01) in children (n=128) aged 3.4 to

4.8 years (mean age=4.16). However, in both the latter and the

preceding studies, though family background variables were

significantly correlated with measures of emotional understanding,

multiple regression analysis indicated that its contribution to the

variance was not significant (R^2 = .04, p < .10, in Dunn et al., 1991

and R^2 = .04, n.s., in Cutting & Dunn, 1999). The authors concluded:

"Whereas factors such as parental education and occupational class

affect children's [social cognition], more proximal processes, such

as family interactions and discourse about feelings, may be

important for children's understanding of the causes of particular

emotional experiences" (Cutting & Dunn, 1999, p. 863).

Thus, it is not parental education or occupation per se that

seems to affect emotional understanding but the influence these

factors have on the parents' and children's behavior regarding

feelings.

For their part, Gottman et al. (1997) in the study described in pages 53-55 found that none of the variables of meta-emotion (feelings about feelings) were related to income and occupational status, but parental education was significantly related to awareness of feelings of anger in the child. Father's level of education was also positively related to coaching of anger.

Therefore, though it has been stated from a theoretical point of view that emotional understanding might be influenced by socioeconomic characteristics of the family, studies seem to yield conflicting results, with some indicating that socio-economics do not play a significant role and that low-income children perform in a manner similar to middle-class children. Moreover, while parents' educational level seems to be related to parenting practices about emotions and to facial emotional expression, it does not seem to be related to children's emotional understanding. Father's occupational status, however, does seem to be related to emotional understanding at least in some studies. It is important to keep in mind that the majority of studies on emotional understanding have been done on children from middle-income families and most researchers, with a few noted exceptions, have not considered socioeconomic variables. Only a few studies of emotional understanding, such as those of Gardner, Jones, and Miner (1994)

and Gardner (1996), have been done on families of low

socioeconomic status, or taken this variable into account in their

analyses (Dunn et al., 1991; Gottman et al., 1997).

Emotional Difficulties and Emotional Understanding

Psychopathology is an area in which emotional understanding

is considered to play a definitive role. Since researchers believe that

emotional understanding fosters and supports emotional behavior,

one would suppose that the development of emotional

understanding has been affected when problems arise in the area of

emotional behavior. However, the way these two might be related,

and whether deficits in emotional understanding are the cause of

problems in emotional development, is not clear. Cole, Michel, and

Teti (1994), for example, believe that emotion is a naturally

regulated process that adjusts the individual's functioning. This

regulatory function develops into patterns of regulation that in turn

develop and stabilize, over time, into characteristics of the

personality. However, circumstances within the individual or his

environment can alter these patterns. When this happens, emotion is

not effectively regulated and the individual's emotional development

or behavior ceases to meet the demands for his or her age or level

of development, often resulting in psychopathology. Cole et al.

(1994) indicate "emotion and emotion related events are critical

factors in the etiology of maladjustment and in therapeutic change"

(p. 74).

Saarni (1999, 2000) believes that emotional understanding

plays a major role in emotional behavior and in "emotional

competence", a term referring to the ability to demonstrate *self-*

efficacy in emotional situations. Self-efficacy refers to the person's

belief in his/her own ability to obtain what he/she is looking for in

social interactions. Saarni describes eight skills necessary for

emotional competence, all of which involve some aspect of

emotional understanding. These skills are: 1) awareness of one's

own emotions; 2) ability to discern and understand others'

emotions; 3) ability to use the vocabulary of emotion and

expression; 4) capacity for empathic involvement; 5) ability to

differentiate internal subjective emotional experience from external

emotional expression; 6) capacity for adaptive coping with aversive

emotions and distressing circumstances; 7) awareness of emotional

communication within relationships; and 8) capacity for emotional

self-efficacy (Saarni, 1999).

Saarni (1999) described the problems observed in children

with different psychopathologies as deficits in skills of emotional

competence. For example, she suggests that maltreated children and children of substance abusing mothers have problems with the awareness of feelings, or with understanding the emotional experience of others; autistic children, and those who suffer from Post-Traumatic Stress Disorder, sometimes also use poor emotional language; children who have witnessed family violence might have difficulty responding empathically to others' distress; lonely or socially rejected children could be described as having problems in decoding and encoding emotional behavior. Finally, children who experience depression and dysphoria could be said to experience lack of self-efficacy.

From the clinical point of view, Southam-Gerow and Kendall (2002) suggest that instead of being centered on particular situations or trying to change dysfunctional thinking, psychotherapy should focus on emotions. These authors recommend an "emotion-based approach" to psychotherapy in which the therapist should discuss emotions in general with the child, emphasize that emotions are not permanent, can be endured, and are not harmful by themselves. The authors point out four goals that studies on emotional understanding raise for the treatment of youth with emotional disturbance: 1) treatment should be directed to assisting youth in understanding and regulating their emotions, not to

avoiding emotional experience; 2) treatment should provide the child with a platform, an orientation, and a model to help him/her understand and manage emotion; 3) the assessment of emotional understanding should be included within the general assessment of the child with emotional problems and addressed in the treatment goals; 4) more efforts need to be made to develop specific treatments designed for particular "configurations" of emotional development.

Thus, authors have hypothesized that because emotions play such an important role in mental health and because many children who have mental health problems also have social problems, the development of emotional understanding might shed light on the understanding of these problems and lead to interventions that will help overcome them. Particularly in the last decade, many studies have been conducted to examine possible differences in the development of emotional understanding of children with behavioral problems or mental health diagnoses.

However, studies have not yielded results as straightforward as authors would have liked and they reflect the difficulties associated with working with clinical samples. Studies conducted to date assume diverse diagnosis procedures, lack control of variables deemed influential, such as verbal intelligence, and some do not

have a proper control sample with which to compare the answers of clinical children. As remarked in other sections, methods for assessing emotional understanding vary widely. The following sections discuss the available literature. The first section describes studies that examined children with behavioral difficulties in non-institutionalized settings. The second section considers studies with institutionalized, or severely disordered children. The last section discusses the only study found in the literature that examines children with anxiety disorders specifically.

Emotional Understanding in "Difficult to Manage Children"

To test the hypothesis that children higher in behavioral problems would demonstrate less emotional understanding, as well as to examine the influence of intellectual functioning in the relation between behavioral problems and emotional understanding, Cook, Greenberg, and Kusche (1994) interviewed 220 children aged 6 to 10 years. Using the subscales Aggressive and Externalizing of the Child Behavioral Checklist (Achenbach & Edelbrook, 1986), the children were classified as high, moderate or low in behavior problems. The child's ability to talk about his/her emotional experience was assessed by asking the children to describe times when they had felt specific emotions (happy, sad, mad, scared, love,

proud, guilty, jealous, nervous/anxious, and lonely). The child's ability to identify emotions in themselves and in others was also evaluated (How do you know when you are feeling happy/sad/mad/scared/jealous? How do you know when other people are feeling happy/sad/mad/scared/jealous?). Cook et al. found that the group with high scores on behavior problems had more difficulty providing appropriate examples of personal experiences of the first five feelings (happy, sad, mad, scared, jealous) than the groups moderate or low in behavioral problems. Both the high and the moderate groups gave fewer appropriate examples of their emotional experience of "nervous/anxious" and "lonely". The group high in behavior problems also had more inappropriate responses for the feelings "happy" and "sad", and both the high and the moderate had higher percentages of inappropriate responses for "proud" and "nervous". Additionally, the high problem group had lower understanding of the cues used to recognize emotions, though a later analysis showed that this last result was associated with differences in Verbal IQ between the samples and not with their behavioral condition.

Casey (1996) reports two studies that yield descriptive information about differences between aggressive and non-aggressive children regarding emotional expression, emotional

appraisal, and control of emotional behavior. These studies indicate in general that aggressive children present with deficits in all three areas.

In one of these studies (Casey & Scholsser, 1994), the authors examined emotional responses and understanding in laboratory situations comparing diagnosed and non-diagnosed children aged 7 to 14. Diagnosed subjects (n=30) were children who had scores at or above the 96th percentile on the Aggression subscale of the Child Behavioral Checklist and had received a diagnosis of an externalizing disorder (most children had Oppositional Defiant Disorder, three had Attention Deficit Hyperactivity Disorder and one had ADHD plus Major Depressive Disorder). Non-diagnosed subjects (n = 30, matched by age and gender) were children who had obtained scores below the 70th percentile on the Aggression scale of the Achenbach and who had no diagnosable disorder. In the study, children were exposed to positive or negative peer feedback. Results showed that diagnosed children responded differently than non-diagnosed children to positive peer feedback. Aggressive children displayed more negative emotions, were weaker at recalling an emotional event, had a harder time explaining how they knew what they were feeling, were less aware of their emotional responses and facial

expressions, and their negative emotions lasted longer than in non-diagnosed children.

A second unpublished study (Casey, Hill, Witherington, Wiecek, & Greer, 1994, cited by Casey, 1996) compared the ability of aggressive children and non-aggressive children to recognize emotion. Results indicate that non-aggressive children were better at recognizing feelings in social situations than children who had been diagnosed with Oppositional Defiant Disorder. These children seemed unable to take into account social cues to help themselves identify emotions.

Hughes, Dunn, and White (1998) examined 40 four-year-olds (mean age = 4.3 ranging from 3.6 to 4.6) of both sexes whose mothers had rated their behavior above the 90th percentile on the Strengths and Difficulties Questionnaire (SDQ; Goodman, 1997) and who exhibited problems on the Hyperactivity and Conduct Problems subscales. They compared this "difficult to manage" sample with a group of control children whose mothers had given them scores below the 50th percentile on the same subscales. They matched each clinical child with a control child of the same gender, age ($\pm$ 2 months), and the school or nursery they were attending. These researchers found that the "difficult to manage" children were less skilled in predicting someone's feelings in both ambiguous and

unambiguous situations. Findings were statistically significant even when age, verbal ability and family variables were taken into account. The authors also assessed three executive functions of the brain: working memory and planning, inhibition of maladaptive preponderant responses, and self-monitoring/attentional flexibility. Hughes et al. measured each function with two tasks each. For working memory they employed an auditory sequencing task using a storybook, and a visual-patterns copying task called "the Tower of London". For inhibition of maladaptive preponderant responses they used "the detour-reaching box", a box that requires two types of responses according to two light cues, and "Luria's handgame", where the child is supposed to respond with a hand gesture different from the one modeled by the experimenter. Attentional flexibility was measured with a set-shifting task with cards and with a color pattern-reproduction task. Authors found that the "hard to manage" children did not differ significantly from their control counterpart in cognitive functioning. Thus, although difficult to manage children were less skilled in emotion-related tasks, there was no difference in cognition-related ones.

On the opposite side, Bohnert (1999) also studied school age children whose mothers had given them high ratings on aggressive behavior on the CBCL (Child Behavior Check List, Achenbach &

Edelbrook, 1986) and compared them with children rated low on the same behavior problems with regard to their emotional understanding and emotional appraisal following a disappointment-inducing situation. Bohnert found few differences between the groups. Aggressive children had more difficulty talking about feelings and rarely indicated that they would respond with anger when faced with disappointment. They also showed less correspondence between the emotions they reported and the expressions observed on their faces. All other comparisons were not significant and the author concluded that there was no difference in emotional functioning between aggressive and non-aggressive children.

In summary, some studies on emotional understanding of children with Externalizing and Aggressive Disorders show that aggressive children differ from non-aggressive children in some points of emotional understanding, such as their ability to identify some feelings, particularly in social situations, to accurately predict feelings, and in their responses to stressful events evoking negative feelings. However, one study (Bohnert, 1999) indicates that there might not be differences between aggressive and non-aggressive children in terms of emotional functioning. These later results seem difficult to explain as they contradict previous findings, particularly

those of Cook et al. (1994). Both studies used the same procedure to select clinical subjects. Bohnert, however, examined different aspects of emotional understanding.

Emotional Understanding in Institutionalized and Special Education

Children

Studies with more severely disturbed children report significant differences between clinical children and children without psychiatric problems. For example, Gurucharri, Phelps, and Selman (1984) studied 17 boys who attended schools for children with emotional and behavioral problems who presented a wide range of psychopathologies, "including personality disorders, affective illnesses, developmental disturbances, psychosomatic illnesses, conduct disorders, and learning disabilities" (p. 29). Their hypothesis was that troubled children, that is, children who had interpersonal problems, would lag in their interpersonal understanding compared with children who did not exhibit such problems. The boys were compared at three points in time: initial assessment (2 were in 1st and 2nd grade at the time, 7 were in 3rd and 4th grade, and 8 were in 5th and 6th grade), two years later (when the boys where in 3rd to 8th grade) and six years later (when they were in 7th to 12th grade) with a matched subject of the same age, race, socioeconomic status, and

psychometric intelligence, using the Interpersonal Understanding Interview developed by Selman (1980). This interview presents two dilemmas, one about friendship and one about loyalty to the peer group. The authors report that although at each follow-up assessment both groups were more advanced in their level of understanding than previously measured, the clinical children were consistently lower in interpersonal understanding that their matched control peers. The researchers indicate, however, that the clinical sample gradually approached the level obtained by the normal sample, suggesting that, at least in their study, the emotionally disturbed children might recover during adolescence or that level of interpersonal understanding is not a differentiating factor at that age.

Also taking a sample identified with psychiatric diagnosis, Taylor and Harris (1983, 1984) conducted two studies with maladjusted boys of school age who, as in the Gurucharri, Phelps and Selman (1984) study, attended special schools for the behaviorally disturbed. In their first study, they compared 36 boys of 7-8 and 10-11 years of age with 36 boys of about the same ages attending regular schools. They found no difference in the children's ideas about duration, memory, and variability of feelings of different intensity. Both groups reported that the effects of emotion faded

with time, that people react with different levels of emotion, that emotional reactions tend to persist for some time, and that an intense emotion will make an event easier to recall. Nevertheless, in their second study, also with boys of the same age and conditions, they found that maladjusted boys made fewer spontaneous references to strategies to control emotions when provoked[12], even if they knew the rules, particularly for physical aggression. A drawback in their studies is that the boys in the control group came from a middle-class school, while the authors describe the clinical sample as children attending special schools serving "a broader social class intake" (Taylor & Harris, 1984, p. 141). This brings up questions about differences being due to other factors, such as social class or verbal intelligence, neither of which was considered in the analysis.

On the other hand, Meerum Terwogt (1990) compared disordered children's responses about understanding of multiple emotions with the responses of a normal sample, which had been collected for a previously mentioned study (Meerum Tergowt, Koops, Oosterhoff, & Olthof, 1986). Children in the "disordered group" (n=80) came from institutions for children with emotional and behavioral problems. Sixty percent of them (48) had been diagnosed with mood or anxiety disorders, 20% (16) of them were diagnosed

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[12] They were asked what they would feel and do if "a boy younger and smaller than you came up and kicked you in the leg" (Taylor and Harris, 1984, p. 143).

with conduct disorders and the rest had "major emotional

problems"[13]. There were two age groups, 7 (n = 40) and 10 (n = 40),

of both sexes, though there were more girls than boys in the older

group and slightly more boys than girls in the younger group. The

method of assessment for this study was the same as the one used

in their former study with normal children. Children were presented

with 12 short stories in which the child protagonist experienced two

different emotions at the same time and were asked how they would

feel if he or she were the child in the story. They were also asked

how intense the feeling would be. The four feelings were presented

one at a time ("Would you feel sad/afraid/angry/happy?"). Children

were asked if they would experience any of the other feelings after

their initial selection so they were always aware, or reminded, of the

possibilities of other feelings. The author reports no differences

between the groups regarding the understanding of multiple

feelings. However, children from the clinical sample gave more

negative answers and gave more extreme responses, either denying

feelings completely or mentioning a higher number of feelings.

Clinical children also rated feelings as more intense than non-clinical

children had done. Thus, the author concludes that though clinical

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[13] The author indicates that giving diagnoses according to the DSM was not a common practice in Holland at the time of the study and he states: "The actual criterion for selection was the overall judgment of the residing psychologist that a child suffered from major emotional problems" (p. 61).

children "acknowledged emotions as frequently as normal children did" there are differences in the qualities they attribute to feelings, perceiving them as more negative, intense and extreme.

In another study, Meerum Terwogt, Schene, and Koops (1990) studied 96 children of three age groups (7, 11 and 15 years of age) from a residential setting. Again the authors ran into trouble with finding accurate diagnoses and used the residing psychologist's criterion that the children suffered from major emotional problems, with 40% of them also having behavioral problems. The method of study was the same as the study by Harris, Olthof, and Meerum Terwogt (1981), reported in pages 8-9, in which children were asked seven sets of questions regarding identification of feelings in self and in others ("How do you know you are happy/angry/afraid?" "Could you ever be happy/angry/afraid, but not know that you are happy/angry/afraid?" "Imagine that you are with your friend or with your father and mother and they are happy/angry/afraid. Could it ever happen that you do not know that they are happy/angry/afraid? How could that happen?"), strategies for self-control ("Could you pretend to be happy/not angry/not afraid? How?" "Of course, it would be better if you were really happy/really not angry/really not afraid. Could you do anything to make sure that you were really happy/really not angry/really not afraid? What?"), and consequences

of emotions ("If you are happy/angry/afraid, what do you think about other people? Do you find them nicer or not so nice or it doesn't make any difference?" "Imagine that it's been a nice/nasty day and that you are happy/angry/afraid and then, at school, you have to make a drawing. Is it easier or harder to do the drawing or doesn't it make a difference?"). As in the study reported previously by the first author (Meerum Terwogt, 1990), institutionalized children's responses were compared to a sample of normal children previously collected (apparently 10 years before). While the authors did not find differences regarding how to recognize feelings, they indicate that institutionalized children were less aware of their emotions and of those of others, particularly positive feelings. When asked to explain their answers children most often indicated that they had not "paid attention" suggesting "the disordered children were reluctant to analyze the situation at length" (p. 67). Institutionalized older children, especially the 15-year-old group, considered that it was harder to induce a positive emotion and that attempts to change negative emotions, such as sadness, were more likely to fail. Institutionalized children considered that a positive mood made no difference in oneself or in others, while control children indicated that a positive mood would make a person "nicer" or easier to do the drawing. It seems questionable in both studies to

compare two samples studied at different times and collected for different purposes. Furthermore, the age groups were not the same; the group of youngest children in the institutionalized sample was one year older than the group of youngest children in the control sample and the standard deviations for age were larger. There were more boys than girls in the youngest clinical group, and more girls than boys in the oldest clinical group. The institutionalized children also came from a lower socioeconomic background than the normal sample: 90% belonged to the low income level while only 50% of the control subjects were of low socioeconomic status.

Emotional Understanding in Children with Anxiety Disorders

There is only one study in the published literature regarding emotional understanding in children with internalizing disorders. Southam-Gerow and Kendall (2000) studied 17 children, 8 girls and 9 boys, of ages 7.5 to 14, with a primary diagnosis of anxiety disorders who were clients at an anxiety disorder treatment clinic. They found that anxious children had a less developed understanding of hiding feelings (How do you hide your feelings? How do others hide their feelings from you?), and of changing feelings (Can you change your feelings? How?) than normal children did. They did not find differences between the groups about cues for

detecting emotions (How do you know when you are feeling...?), or in the understanding of multiple feelings (Can you feel [sad and mad] at the same time?).[14]

To summarize, results regarding emotional understanding in clinical children are inconclusive, with some studies indicating differences in at least some areas and others not finding any. Lack of conclusive results may be due in part to the difficulties of working with clinical children, to the variety of the samples, or to the different aspects of mental health problems. However, these limited results also emphasize the complexity of this area of study, which certainly needs more work and definition. The studies reviewed reflect the difficulties of working with clinical samples in which there are a wide variety, in some studies more than others, of diagnoses and clinical conditions. In addition, some authors do not assess for verbal intelligence, a variable generally considered to be significant. Clinical samples in some of the studies reported come from different socioeconomic strata than the control samples. All this undoubtedly biases the results and obscures the relationship between psychopathology and emotional understanding.

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[14] Four combinations were used: sad and mad, happy and sad, calm and nervous, love and angry. The scores for each combination were summed up to form a composite score.

Emotional Awareness

The studies discussed thus far have been on emotional understanding in children. Lane and his associates (Lane & Schwartz, 1987; Lane, Quinlan, Schwartz, Walker, & Zeitlin, 1990; Lane, 2000) have studied emotional behavior and cognition in adults. These authors conducted research on an area of study they called "emotional awareness", defined as a cognitive ability "to recognize and describe emotion in oneself and others" (Lane, 2000). Lane and Schwartz (1987) and Lane (2000) propose that emotional awareness also follows a developmental process such as that described for the understanding of multiple feelings. Though they do not define their field of study as the understanding of ambivalence, this concept is the central piece in their research since they state that the ability to perceive ambivalence indicates higher emotional awareness. Consciousness of ambivalence is supposed to be reached in later adolescence or young adulthood. Lane's studies indicate, however, that not all adults have the same level of consciousness of the possibility of people simultaneously experiencing opposing feelings.

Lane (2000) explains that there are individual differences in the way people are aware of feelings in themselves and in others, and that these differences result from differences in the integration

of the cognitive representations a person uses to process external or internal information. The author relates emotional awareness to emotional intelligence, a popular term that indicates the ability of an individual to "use emotional information in a constructive and adaptive manner" (p. 171). According to Lane the more differentiated and integrated a level of emotional awareness an individual has the greater would be his ability to adapt to life. Emotional awareness, also referred to as emotional experience, is assessed through a subject's responses to how he (or she) would feel in interpersonal situations that usually provoke conflicting feelings. The author further states "the way language is used to describe emotion modifies what one knows about emotion and how emotion is consciously experienced." (p. 174).

Based upon Piaget's theories of cognitive development, Lane and Schwartz (1987) proposed a model for the development of emotional awareness, or emotional experience. Lane and Schwartz suggest that emotional awareness follows a cognitive-developmental sequence of five structural levels, indicating that the individual's level of emotional awareness could be assessed by presenting the individual with emotion-evoking situations and asking how would he/she feel in them. The first level of emotional awareness is the *Sensorimotor-Reflexive*; at this level, emotions are perceived as

bodily sensations and there is no awareness of the emotional experience of others. Level 2 is called *Sensorimotor-Enactive*, indicating that the person might be aware of both bodily sensations and of tendencies to action but there is no consciousness yet of specific feelings. A common response at this level would be "I feel bad", which indicates a global state without any specific quality. The awareness of the emotions of others is limited at this stage. The third level is termed *Preoperational* and the authors indicate that at this level there is an awareness of individual feelings but emotions are limited, tend to have an either/or quality. The person can only describe one feeling at a time and is able to address only part of the experience. The fourth level of emotional awareness is called *Concrete-Operational*. At this level the person has acquired the capacity to recognize differentiated feelings and mixtures of feelings. That is, the person at this level recognizes multiple feelings in him or herself and he or she is also aware of the emotions of the other, but this emotional experience is yet perceived as one-dimensional (i.e., the other only experiences one feeling). Level 5 is called *Formal Operational*. At this level, "There is now the capacity to mix or blend feelings of varying qualities and intensities into new patterns, even though such patterns have never been modeled or described by others" (p. 138). The person can now perceive this

"differentiated, multidimensional experience" in others as well as in his/her self, and sees his/her feelings as separate from those of the others. The authors indicate that each level represents a progression from the previous one, and that the higher the emotional level a person attains the more appropriate and attuned to the social world is his/her emotional behavior.

To measure this ability in adults, Lane and his colleagues developed the "Levels of Emotional Awareness Scale" (LEAS). This scale comprises 20 everyday-life interpersonal situations to which the responder indicates how he/she would feel and how he/she thinks the other person would feel. The researchers conducted several studies to determine the scale's interrater reliability and internal validity, as well as its usefulness as a measurement instrument (Lane, Reiman et al., 1998, cited by Lane, 2000). For example, a study with college students (Lane, Quinlan, Schwartz, Walker, & Zeitlin, 1990) determined that the LEAS assessed contents different from other scales of psychological maturity and social desirability. It also established that the LEAS was not merely a measure of verbal ability since the scores were not related to the number of words used in the answers.

Lane has thereby characterized the cognition of multiple feelings in adults as "awareness of emotion". Studies indicate that as

early as adolescence (Selman, 1980; Nannis & Cowan, 1987), there is an understanding of the existence and implications of conflicting feelings. However, it has also been observed that adults have varying abilities to recognize different emotions in themselves and others. In other words, emotional awareness does not necessarily develop with age. Some adults experience feelings in a very basic manner, referring to them as actions or simple emotions, while others are able to recognize the complexity of experiencing simultaneous contradictory emotions both in themselves and in others (Lane, 2000).

To conclude, though some developmentally oriented authors such as Selman (1980) examined emotional understanding from childhood and included adulthood in their studies, this area of study seems not to have been sufficiently pursued in research on developmental psychology or clinical child psychology. In fact, studies have explored parental beliefs, attitudes about emotions, family emotional expressiveness, and family discourse about emotions, but none have specifically addressed parental emotional understanding. Furthermore, no study has related parental emotional understanding or emotional awareness to children's emotional understanding.

Summary

Authors who have studied emotional understanding in children have concluded that as children age their emotional understanding becomes more refined. They are not only able to detect and explain more complex feelings, but are capable of taking preceding circumstances into account and to indicate situations where emotional expression is appropriate or not. Older children report more mature strategies to achieve emotional control.

Researchers have examined different aspects of emotional understanding, such as identification, prediction, hiding and controlling of emotion. Two aspects of emotional understanding, however, have drawn particular attention because of their connection to clinical practice and treatment of emotional difficulties. These are the understanding of multiple feelings and of causality of feelings. Most research in the area has adopted a structural point of view, describing emotional understanding as a progression of levels, each more complex than the one before. Studies indicate that as they mature, children are able to understand that multiple and contradictory feelings can be experienced in one situation and that they mix and interact. They are also able to comprehend that feelings are influenced by thoughts and memories

and that one can use these strategies to change emotions, or that feelings can intrude upon and affect your mood, even after the event that initially provoked them has long passed.

The study of emotional understanding, however, has been plagued by inconsistency in the procedures and the strategies exercised to elicit emotional knowledge. For example, some authors have used interviews with plain and direct questions about the subject's own feelings, while others have used more-or-less elaborated stories about situations experienced by others. Researchers have also used different scoring criteria or categories to assign levels to children's responses. Some studies analyze different feelings separately, but the majority make a composite score of all the ones explored. Some authors have studied large numbers of children and found that development follows a scalable sequence. Others have measured children in homogeneous age groups (e.g., 5-6, 7-8, 9-11) and also shown that emotional understanding increases with age. Among all the studies and scoring criteria, Donaldson and Westerman (1986) seem to have developed the most clear and comprehensive manual to score children's responses to structured interviews based on children's ideas regarding a protagonist's feelings in a story. An added advantage of their method is that each feeling can be examined separately.

Studies have also indicated that emotional understanding seems to be influenced by some characteristics of the subject, such as verbal intelligence, as well as by family characteristics. For example, family expressiveness and readiness to talk about emotions, as well as the parents' expression of positive and negative feelings, have been associated with emotional understanding in children. Thus, parenting practices and family attitudes that foster controlled emotional expressions have been related to a child's better understanding of the need to manage emotions. Other studies in the area, however, do not show clear-cut results and have not found relationships between parents' and children's expressiveness or between parents' and children's attributions of causes of feelings. Authors have further examined the influence of other family characteristics, such as parents' education and occupation. These studies give conflicting information, with some indicating that these variables have an influence on emotional understanding, while others suggest that children from different socioeconomic backgrounds show the same rate of development in emotional understanding. There is, however, a dearth of studies with subjects from low socioeconomic backgrounds. Most samples have been taken from middle-class subjects.

Interest in the development of emotional understanding has extended beyond the field of developmental psychology to the field of clinical child psychology and psychopathology. This is because emotional understanding has been related to social and emotional competence. Studies have pursued the emotional understanding of children with emotional difficulties. Some of the research indicates that children with some kind of psychopathology present delayed emotional understanding, at least in some areas. However, investigations of psychopathology and emotional understanding are few, and many suffer from methodological difficulties. Most studies for example, lack an adequate control group or do not take differing ages into account. Authors vary in their criteria for selecting clinical children, some studying children who have been psychiatrically diagnosed, others merely selecting children with many problem behaviors but attending regular school. Some researchers do not control for important variables such as verbal intelligence. There are also areas of emotional understanding that have not been studied.

A separate line of study has pursued the awareness of emotion in adults, correlating it with the ability to experience and understand feelings. Studies in this area indicate that adults have differing levels of emotional awareness and that higher emotional awareness is related to better knowledge of feelings. Some authors

postulate that the ability to comprehend ambivalence marks higher emotional awareness. This is an interesting view of emotional understanding in adults, but no study has correlated it with emotional understanding in children. Most studies on the effects of family characteristics have centered on the family's talk about emotions and on the family's emotional expression, but none have centered on other aspects such as emotional awareness or the emotional experience of the parents.

The Present Study

The present study examines a clinical sample drawn from psychiatric units of three general hospitals in the city of Bogotá, Colombia. One of the goals was to investigate whether there were differences between children diagnosed with psychiatric disorders and children without such diagnoses regarding their understanding of the experience of two simultaneous and opposite feelings and of how feelings change. These particular issues were chosen because they represent very significant clinical aspects in children with emotional difficulties.

The relationship between the children's emotional understanding of these aspects and their mothers' emotional

understanding was also explored. Two aspects were chosen, mothers' attitudes toward their children's emotional behavior and mothers' emotional awareness.

In this study, the emotional understanding of each pair of multiple feelings or of each negative feeling was analyzed separately instead of adding them to make a composite score as has been done in most studies. The object was to explore the group differences for each separate aspect of emotional understanding, and also to investigate if the children understood both sets of conflicting feelings similarly.

Another objective was to explore not only the emotional understanding of children, but to correlate that understanding with some aspects of their parents' emotional experience not examined in previous studies, such as their attitudes toward emotional expression in their children and their awareness of their own emotions.

The final goal of this study was to present a descriptive picture of the emotional understanding of children from Colombia and to explore whether children 7 to 11 years of age presented the same rate of development in their emotional understanding as children of the same age in North American and European cultures.

Hypotheses

Hypothesis 1: There will be significant differences between the clinical and the control groups of children in their level of understanding of ambivalence between happy/sad, ambivalence between love/anger, changing sad feelings and changing angry feelings. The clinical group will have a significantly lower level of understanding of each of these.

Hypothesis 2: There will be significant differences between the two age groups regarding the level of understanding of each of the variables of emotional understanding. Younger children will have a significantly lower level of understanding than older children.

Hypothesis 3: There will be a significant difference between the mothers of the clinical children and the mothers of the control children regarding their levels of emotional awareness and their attitudes toward children's expressiveness. Parents of emotionally disturbed children will have a lower level of emotional awareness than parents of control children. In addition, parents of emotionally disturbed children will demonstrate more extreme attitudes toward children's expressiveness, either being more permissive or more

authoritarian, while parents of control children will demonstrate moderate attitudes toward children's emotional behavior.

Hypothesis 4: There will be a significant relationship between the variables of children's emotional understanding and the mother's emotional awareness and attitudes toward emotional expression. A higher level on the variables of children's emotional understanding will be related with parents' higher awareness of emotion and with more moderate (not as authoritarian or permissive) attitudes toward children's expressiveness.

Hypothesis 5: There will be a significant correlation among all the variables of emotional understanding: ambivalence between happy/sad, ambivalence between love/anger, changing sad feelings, and changing angry feelings.

CHAPTER 2

METHOD

We will now describe the subjects, the instruments and the procedure of the study.

Subjects

The sample included 63 male children and their 63 mothers. Only male children were selected because males are more prevalent in the behavior-disordered populations from which the clinical sample was drawn. In addition, using both genders would have further complicated the study by introducing another variable. The samples consisted of two different age groups: 7- and 8-year-olds and 10- and 11-year-olds assigned either to the clinical or control groups. The clinical group was comprised of boys referred for emotional and/or behavioral problems[15]; the control group was comprised of normal children, that is, non-referred, or children without expressed or evident mental health problems.

The two age groups are consistent with the Piagetian stages of early concrete operational (the younger group) and late concrete operational (older group) and were hypothesized to have different levels of understanding on the variables "ambivalence" and "feeling change". There were 32 boys in the younger age group and 31 in the

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[15] Four of the subjects seemed to have only emotional problems while the rest of the sample presented behavioral symptoms or a combination of disruptive and non-disruptive behavioral symptoms.

older. Fifteen boys of each age group (a total of 30) were from the clinical sample. Of the control group, 17 were 7-8 years of age, and 16 were 10-11 years old for a total of 33 controls.

Most of the boys in the clinical condition were selected from day treatment centers in hospitals in the city of Bogotá, Colombia. Currently two government hospitals provide this kind of service: one in the southeast part of the city and another in the southwest. Both serve low-income clients in heavily populated areas of the city. The children's day treatment service serves a relatively stable population of 40 to 60 children, providing psychological assessment, occupational and language therapy, counseling and psychiatric services. Children are usually assessed at intake by the psychiatrist and, according to his or her assessment, grouped into three main categories: "neurotics", "developmentally delayed", or "psychotics" (this last group includes children with schizophrenia, autism, delusions, and those children otherwise out of contact with reality). Only children from the first category who were living with their mothers or a mother substitute were considered for the study. Three of the boys from the clinical sample came from another psychiatric service, a university hospital serving the south central area of Bogotá, between the other two hospitals. This unit is mainly comprised of a child psychiatrist and his students (residents in

psychiatry), who see clients and assign a diagnosis, prescribe medication if needed, and refer them to outside services if required. These boys were receiving treatment at other agencies that did not have a psychiatrist on site and thus had to be referred out for psychiatric evaluations and follow-ups.

Psychiatrists at the three programs used different classification systems for attributing diagnoses, according to each hospital registration system. The hospital in the south central part of the city used the 4th edition of the American Diagnostic and Statistical Manual (DSM-IV) for diagnoses, such as Attention Deficit/Hyperactivity Disorder (ADHD), Obsessive Compulsive Disorder (OCD), or Oppositional Defiant Disorder (ODD). Being more officially part of the government health system the other two hospitals used the international classification system International Classification of Diseases-9th Revision (ICD-9) for diagnosis, using terms such as "Disturbance" and "Neurosis".

Thus, the majority of subjects had a diagnosis of "Conduct Disorder", or "Disturbance of Conduct", either alone or with dual diagnoses such as "Neurotic Disorder", "Disturbance of Emotions", "Learning Disabilities", or "Impulse Control Disorder" (n = 22, thus 73.3%); and others were "ADHD and ODD" (n = 4, which is 13.3%). The rest (n = 4) had diagnoses such as "Neurotic Disorder",

"Neurosis", "Anxiety Disorder", or "Disturbance of Emotions" (See

Table 1 for a list of all the diagnoses).

Table 1

Children's Diagnoses in Both Clinical Groups

Diagnosis	Younger[a] n=15	Older[b] n=15
Adjustment Reaction with predominant disturbance of conduct	1	
Anxiety Disorder		1
Attention Deficit Disorder/Oppositional Defiant Disorder	1	2
Attention Deficit Disorder/Oppositional Defiant Disorder/Dysthymia secondary to Anxiety Disorder		1
Behavior Disturbance and Unhappiness	1	1
Conduct Disorder, aggressive type	1	2
Disturbance of Conduct with Learning Difficulties	1	
Disturbance of Conduct, not otherwise classified	3	4
Disturbance of Emotions specific to childhood and adolescence	1	
Impulse Control Disorder and Conduct Disorder	1	
Mixed Disturbance of Conduct and Emotions	2	1
Neurosis		1
Neurotic Disorder	1	
Neurotic Disorder with Disturbance of Conduct	1	
Undersocialized Conduct Disorder	1	2

[a] Children aged 7-8   [b] Children aged 10-11

Children in the control group came from three public schools; two of them within the city in about the same area covered by the hospital in the south east part of the city, the other in a small town called Chía, about 15 kilometers to the north of Bogotá. Though a rural town until recently, Chía is becoming part of the suburbs, and most of its residents travel daily to and from the city. Children in the control group were selected either by the school counselors or by their teachers. The teachers had been instructed to choose children who, to their knowledge, did not have emotional or behavioral problems at home or at school. They were also asked to select average students, that is, not those at the top of their class, nor from the lowest range of achievement. In addition, they were asked to select children living with their mothers or a stable mother surrogate.

Children's Verbal IQ was measured using four verbal subscales of the WISC-R. Only Verbal Intelligence was measured in order to avoid making the whole procedure too long for the children. It was determined that Verbal Intelligence was the component most relevant to the study since the assessment of emotional understanding is done verbally.

The subjects' Verbal IQ varied from 69 to 111, with the majority of subjects in the Average range (51%), and the Low-

Average range (32%). (See Table 2 for the VIQ distribution of the sample and for VIQ averages for each group).

Table 2

Number of Subjects by Ranges of Verbal IQ and VIQ Averages for Each Group

VIQ Range	Control (n=33)		Clinical (n=30)		Total
	Younger[a] (n=17)	Older[b] (n=16)	Younger[a] (n=15)	Older[b] (n=15)	
VIQ = 69		1		1	2
VIQ 70-79		2	2	3	7
VIQ 80-89	7	3	4	6	20
VIQ 90-109	9	10	8	5	32
VIQ = 111	1		1		2
Average VIQ	95.4	91.1	92.6	85.9	91.42

[a] Children aged 7-8
[b] Children aged 10-11

A univariate Analysis of Variance was done to search for differences between the groups for Verbal IQ. This analysis indicated that there were no significant differences in groups according to status (Clinical/Control) [F (1/59) = 1.96, p = ns] or age (Younger/Older) [F (1/59) = 3.68, p = ns] (See Table 3 for specifics of this statistical analysis).

Table 3

Analysis of Variance for Verbal Intelligence

	df	F	p	η²
Status	1	1.966	.166	.166
Age	1	3.689	.060	.060
Age X Status	1	.193	.662	.662
Error	59	(127.81)		

Note: Data in parenthesis indicates means square value

The 63 mothers or mother surrogates of the children were interviewed. (Three of the boys lived with their grandmothers because the mother abandoned the family when the child was very young). Most families belonged to a low socioeconomic class, with

family income falling around the monthly "minimal wage"[16]. Thus, more than half of the sample (65.0%) had a total income of the minimal wage. About a third earned twice this amount (23.8%) and only a few (11.1%) made more than three minimal wages (See table 4 for distribution of incomes).

Table 4

Distribution of Incomes

Income	Control		Clinical		%
	Younger[a] (n=17)	Older[b] (n=16)	Younger[a] (n=15)	Older[b] (n=15)	
One minimal wage	9	9	13	10	65.0
Two minimal wages	5	5	2	3	23.8
Three or more minimal wages	3	2	0	2	11.1

[a] Children 7-8 years of age   [b] Children aged 10-11

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[16] "Minimal wage" is an economic measure used by the Colombian government to indicate socioeconomic status: one minimal wage refers to a family earning one salary at the lowest government approved monthly rate. Two "minimal wages" refers to a family earning the double of this monthly rate.

With regard to education, half of the mothers or mother surrogates had completed only the primary levels (53.9%), while a quarter had attended some high school years (25.3%). A smaller percentage (14.2%) either had graduated from high school or had had some technological training. Only one of them had obtained a college degree and three others had taken some college-level classes (See Table 5 for this information).

Table 5

Distribution of Educational Levels

Education	Control		Clinical		%
	Younger[a]	Older[b]	Younger[a]	Older[b]	
	(n=17)	(n=16)	(n=15)	(n=15)	(N=63)
Elementary	8	8	11	7	53.9
Secondary	4	6	2	4	25.3
High school graduates/Techno-logical degree	4	2	2	1	14.2
Some years of college education	1			3	6.3

[a] Children 7-8 years of age   [b] Children aged 10-11

Regarding occupation, about half of the mothers or grandmothers were stay-at-home mothers (52.3%); about a third of them were employed in manual labor jobs (33.3%); and the others had some clerical or blue-collar employment (7.9%). One of them was a college student and two had white-collar jobs (See Table 6 for number of subjects and percentages in each category according to group).

Table 6

Distribution of Occupations

Occupation	Control		Clinical		%
	Younger[a] (n=17)	Older[b] (n=16)	Younger[a] (n=15)	Older[b] (n=15)	(n=63)
At-home	10	6	9	8	52.3
Manual laborers	4	9	5	3	33.3
Clerical/Secretarial	2	1	1	1	7.9
Other	1			3	6.3

[a] Children ages 7-8 [b] Children ages 10-11

A chi-square analysis was conducted to examine if there were significant differences between the clinical and the control groups regarding this demographic variables. Results indicate that differences were not significant regarding income, $\chi^2(2, N = 63) = 5.486$, $p = 0.64$, ns; education, $\chi^2(3, N = 63) = 1.444$, ns; occupation, $\chi^2(3, N = 63) = 1.619$, ns.

Instruments

Four types of instruments were used in the study; two for the children and two for the mothers. Children's Verbal IQ was assessed with the four subtests of the WISC-R that cluster in the Verbal Comprehension factor: Information, Similarities, Comprehension and Vocabulary. The WISC-R scale was used instead of the newer WISC-III version because it was the test used at the two government hospitals; also, it has a well known and commonly used Spanish translation.

Children's understanding of Ambivalence and of Feeling Change was assessed during a structured interview in which two stories about children and their pets were read to them and they answered an established set of questions about the protagonist's

feelings. The Kitten Story (Historia del Gato) assessed the understanding of Happy and Sad feelings. The Puppy Story (Historia del Perro) assessed the feelings of Anger and Love. Both stories were taken from Donaldson's study (Donaldson, 1984; Donaldson & Westerman, 1986) and used with permission.

According to Donaldson (1984), both stories were written specifically for her study. The Kitten Story is based on Selman's Puppy Story, which was designed for his study on the development of subjectivity (Selman, 1980). In the Kitten Story version, the protagonist (Billy) is given a kitten for his birthday to replace one he has recently lost. The story is supposed to assess the conflict between the sadness of losing a loved pet and the happiness of getting a new one. The Puppy story taps the conflict between feeling love for a pet and anger at the pet for having destroyed a cherished work, and it was developed by Donaldson (1984) for her own study.

Each story has two parts. In the first part one feeling is presented: the child is sad because his kitten has been lost (Kitten Story) or loves his dog very much after it found a ball the child had lost (Puppy Story). Questions about the subjects' understanding of the protagonist's feelings follow (for example, "How does Bill [or Mike] feel?" "Why does he feel ___?"). The second part of the story introduces the conflicting feeling. In the Kitten story the child gets a

new pet, which makes him happy, and in the Puppy story the puppy destroys the child's work, which makes him angry. Questions about the conflicting feelings are then posed (for example, "What does Mike feel now?" "Could Billy feel something else besides ___?"). The last part of the questions taps into the subjects' ideas about whether children can change their own feelings and how they can do so (For example: "What makes angry feelings go away?" "Is there something Billy could do to make the sad feelings go away?"). The procedure includes a brief introduction to the task and a debriefing during which they are thanked for their participation and can ask questions if they wish.

In order to facilitate identification the protagonists in both stories were boys of the same age as the subjects. Questions about feelings were not introduced until subjects demonstrated a clear understanding of the content of the story, either by relating it in their own words, or by answering questions about it. Since both stories were originally in English, they were translated into Spanish. Once translated, they were checked with children of the same ages to validate for understanding and phrasing (See Appendix A for the Spanish version of the interviews followed by the English version). Double translations were performed by a graduate-level, bilingual mental health professional to assure the commonality of the

language used. With the exception of some local terms the overall sense of the texts were similar.

Both Understanding of Ambivalence and Understanding of Feeling Change are scored on a scale of 0 to 3, where 0 is the lowest level and 3 is the highest. Thus, for Ambivalence, level 0 means the child denies that two feelings can simultaneously coexist. ("How does Billy feel with his new cat?" "Happy…because he has another cat." "Can Billy feel something else?" "No.") At level 1, multiple and even contradictory feelings may exist, but children only mention them when probed ("Do you think that in addition to feeling happy for his new cat, Billy could also be a little sad?" "Yes, a little, little bit."), and there is no interaction between them. ("What happened with the love?" "It's gone." "Did it disappear completely?" "Yes.") At level 2, the child acknowledges that multiple feelings exist but finds it hard to bring them together. ("Could Billy feel something else?" "Yes, sad because his cat did not show up." "Does Billy feel happy and sad at the same time or first one and then the other?" "First sad and then happy." "Does the sadness of having lost Snowball mix with the happiness for the new cat, or they stay separate?" "They stay separate.") At level 3, the child recognizes and understands ambivalence (for example, "[Billy] is sad because he lost his cat and angry because his mother left the window open… He feels both at

the same time." "I am angry with my dog but I love him at the same time"). For Understanding of Feeling Change, level 0 is the lowest level where children deny knowledge of any kind of strategy for changing feeling states. ("What makes sad feelings go away?" "I don't know.") Level 1 refers to the concept that feelings come and go according to external events and circumstances. ([Billy will stop being sad "if he gets another cat.") At level 2 there is awareness that feelings are affected by thoughts and memories although they may be passive ones. ("What makes angry feelings go away?" "To forget them." "Is there something children could do to stop feeling angry?" "Stop thinking about the past, move forward". "Once the anger is gone, will it come back?" "No.") Finally, at the highest level, level 3, the child recognizes that feelings come and go according to inner processes (thoughts, memories, and attitudes) that one can elicit actively. ("[Children] can play and think about other things, not about the anger." "What would make sad feelings come back?" "The memories.")

Scoring is based on a descriptive manual developed by Donaldson (1984). Each story receives one score for Ambivalence and one score for Feeling Change, so each subject obtained a total of four scores: Ambivalence Happy/Sad (Amb HS), Ambivalence

Love/Anger (Amb LA), Feeling Change Happy/Sad (FCh HS), and Feeling Change Love/Anger (FCh LA).

Even though it has the drawback of using frequent probes which might suggest the answers, Donaldson and Westerman's interview (1986) was chosen for several reasons. Firstly, the procedure assesses two pairs of conflicting feelings, which might shed light on differences in the cognitive development of ambivalence according to the type of feelings involved. Secondly, it provides a manual for scoring the child's level of understanding since the questions are very specific and rules for scoring are precisely delineated. Thirdly, their interview does not rely on spontaneous verbal production, a requirement that might have handicapped some children, particularly those from the clinical population. Fourthly, Donaldson and Westerman report good reliabilities, an interrater validity of .86 for understanding of Ambivalence Happy/Sad and .79 for understanding of Ambivalence Love/Anger. The interrater validity for Feeling Change assessment was .95 and .94 for Feeling Change Happy/Sad and Feeling Change Love/Anger, respectively.

Mothers' attitudes toward the expression of feelings were assessed with the Parent Attitude toward Children's Expressiveness Scale (PACES), a scale developed by Saarni (1985). This scale consists

of 20 situations tapping parents' reactions to their child's emotional manifestations both positive (like happiness or curiosity) and negative (fear, shame, anger, sadness). Each question has four alternative answers and the parent must choose one. The alternatives are scored from 1 to 4, where 1 equals the most permissive attitude towards a child's emotional expressiveness and 4 represents the most restrictive or controlling one. A total score is obtained adding the 20 individual scores, so each parent received one total score for PACES (ranging from 20 to 80). This scale was also translated into Spanish (See Appendix B for the Spanish and English versions). As with the children's interview, it was later translated back into English. Saarni's scale is reported as highly reliable (r = .77) on test-retest and on interrater reliability (71%) (Saarni, 1985). For construct validity it was correlated with the Family Environment Scale (Moos, 1974, cited by Saarni, 1985) and was used to compare the attitudes of parents with those of graduate students. Saarni reports that the PACES was highly correlated with the Family Environment Scale and also indicates that the scale significantly differentiated parents from non-parents in regards to their attitudes toward children's emotional expression.

The mothers' awareness of emotions was assessed using the Levels of Emotional Awareness Scale (LEAS) (Lane & Schwartz, 1987;

Lane, Quinlan, Schwartz, Walker & Zeitlin, 1990). The LEAS is based on a hierarchical developmental model that proposes that emotional experience is organized along increasing levels of complexity, including whether emotion is experienced as a somatic (bodily sensation), a somatopsychic (action, tendency), or a psychic state (feeling). It also includes whether emotion is perceived as differentiated and integrated (single emotions, blends of emotions and combinations of blends). The level of structure of the emotional experience is reflected in the verbal descriptions of emotions a person gives in response to how she/he would feel in standardized emotion-evoking situations. The scale also consists of 20 scenarios or situations that might elicit either positive emotions (like a sweetheart coming home or the boss saying that work was excellent), or complex negative feelings (being informed about a parent's death or a friend getting the award one worked for). In each situation there is another person involved whose presence elicits opposing emotions and the subject is asked to indicate what he/she thinks the other person might be feeling (this is the "other" emotional state, while his/her own feelings are the "self" emotions).

Each item is scored then on a six-level basis, from 0 to 5, with Level 0 representing the lowest level of awareness, where feelings are denied or the person gives responses that reflect judgments

(e.g., "I don't know, it's his work", "Indifferent", "I would not give it importance"). Level 1 indicates when a person's answers refer to physical feelings (e.g.,, "I would be relaxed", "I would feel pain"), and Level 2, refers to actions (e.g., "I would feel like running") or global states not specifically emotional (e.g., "I would feel good", "bad because I am afraid of the dental drill", "He is helping"). Level 3 refers to the expression of specific, well-differentiated emotions (e.g., "happy", "he would be happy for making me feel good", "the neighbor would feel embarrassed and a little guilty"), and Level 4 is scored when the subjects describe opposing or qualitatively differentiated emotions "I feel angry but it's not the other person's fault", "She feels satisfaction for herself and sad for me", "She feels she has problems and will feel better after talking to me"). Each scenario receives three separate ratings: 1) self, 2) other and 3) total. "Self" refers to what the person describes he/she would feel, and "other" indicates what he/she describes the other person would feel. The "total" score for each item is the higher of these two. A score of level 5 is given to an item when both scores, "self" and "other", are rated at level 4, if they meet the other criteria for that level (the reactions of both individuals are clearly different from each other and the respondent specifies clearly what part of the situation accounts for each emotion). The scores of each of the 20 situations

are added and a global score (ranging from 0 to a maximum of 100) is given to the subject. The LEAS has a scoring manual that indicates the guidelines for scoring at each level and a glossary of emotion words or expressions that correspond with them.

The authors of the LEAS scale report high interjudge reliability (.84) and intratest homogeneity (.81). They also indicate that the scale showed discriminant validity with other measures of repression and emotions (Lane et al., 1990).

For this study, the 20 situations were translated into Spanish (see Appendix C for both the Spanish and the English versions) and some minor adaptations were done (like changing a pizza meal for a "lechona", a very greasy pork dish). One situation (#6, where the respondent is supposed to "see a man standing on the other side of the guardrail") required explanations for almost all subjects (i.e., it had to be explained that the person might be thinking of jumping down).

Though both the PACES and the LEAS scales were designed to be answered by subjects independently (marking or writing their answers), because of the low educational level of a good number of the mothers, we read each situation to them and wrote their answers verbatim (for the LEAS) or marked the alternative (in the PACES).

Procedure

All the interviews were done in two periods of time, the first ranging from April to November in 1995, and the second from February to August of the year 2000. Thirty-four subjects were interviewed in the first period (22 control subjects and 12 clinical). Of these, 19 were in the younger group and 15 were in the older group. Twenty-nine subjects were assessed during the second period (11 control and 18 clinical)[17]. Of these, 14 were in the younger group and 15 in the older.

Subjects for the clinical groups were selected according to the information recorded at the psychiatric services. Boys who were the required ages, and whose symptoms corresponded to the "emotional difficulties" or "neurotic" categories were selected. The mothers were then contacted by phone and asked to participate in the study. They were informed that the study was separate and independent of the services they were receiving at the hospital and that their participation was entirely voluntary. If they agreed to come to the interview and allow their child to participate, appointments were made. The appointments were coordinated with the day and time

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[17] Some socio-political circumstances forced this researcher to stop data collection at the time such as the social insecurity prevalent in Colombia and the economic instability that has ensued.

when the child received services at the hospital, in order to not cause an additional trip for the family. The mother and child were interviewed separately but simultaneously. The writer did all the children's interviews, while an assistant interviewed the mothers. During the first period of the data collection, a psychologist did the parent interviews, while in the second period a sociologist did them. Both persons were experienced in working with parents of difficult children. Answers were recorded verbatim in interview formats.

The pet stories were presented to the children. They were told that they would be listening to two recorded stories about two boys of their age and the boys' pets. After hearing the stories, questions would be asked about what they thought the boy in the story would feel, emphasizing that there were no right or wrong answers. They were encouraged to ask for help if they did not remember some part of the story. Some children were presented with the Puppy story first, others with the Kitten story first, in a random order. Once the interview was finished, the children were thanked for their help and encouraged to ask questions about the experience. Very few of them did. The four verbal WISC-R subtests were then administered in order.

The mothers were told that the researchers were interested in how children understood feelings. They were told that their son

would be listening to some stories and would be asked questions about them. Then they were told that we were also interested in how mothers perceived feelings and that they would be asked two kinds of questions for which there were no right or wrong answers. The scales were administered in random order. Some subjects were administered the PACES first, others the LEAS. For the PACES, mothers were given the alternative of marking their choices on their own (the interviewer would read each question and its multiple-choice answers), or they could indicate their answer and have the interviewer mark it for them. Very few of them chose the first option.

The children's teachers selected children for the control groups according to the criteria described above. Teachers asked the parents to participate in the study. They explained that someone outside the school staff was doing research for purposes independent of school functioning and of the children's learning process. Participation was voluntary. The mothers were interviewed at the schools simultaneously with their child. Again, the author did the children's interviews while an assistant interviewed the mothers.

The scoring of the children's interview gave a single score for each variable of emotional understanding: an Ambivalence Happy/Sad score (Amb HS), a Feeling Change Happy/Sad score (FCh HS), a Ambivalence Love/Anger score (Amb LA) and a Feeling

Change Love/Anger score (FCh LA). The WISC-R verbal subtests were combined to give a Verbal Intelligence IQ[18]. The PACES gives an overall score of attitudes by adding the individual scores of the 20 questions and the LEAS also gives an overall score of emotional awareness by adding the individual scores obtained in each of the 20 questions. In the end, seven types of data were available for each mother-child dyad. The author scored both the WISC-R verbal subtests and the PACES scale. For the scoring of the interviews, each child and mother pair was given a code number. Thus, no information about age, group status, or socioeconomic status appeared in the papers to be scored.

Two independent scorers (each with a professional degree in Psychology[19]) blind to the study hypotheses scored the pet stories responses and the LEAS. They were also blind to the condition of the subjects (age or group) and to the relationship of the adults to the children (that is, they did not know what mother's interview corresponded to what child). After they had scored all forms, they compared their scores. At first, inter-scorer agreements were low. In the Ambivalence Happy/Sad the interscore agreement was 44.44%, in Ambivalence Love/Anger it was 42.85%, Feeling Change

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[18] The Manual provides a table to determine IQs when only 4 subtests have been administered.
[19] The bachelor of Psychology program in Colombia is a five-year educational program leading to a professional degree: "Psychologist".

Happy/Sad was 57.14% and in Feeling Change Love/Anger it reached 73.01%. Thus, the higher percentage of agreement was for the measure of Feeling Change Love/Anger, and the lower for Ambivalence Love/Anger. For the LEAS, the initial agreement was 65.07%. Although they had both received the same training, one of scorers followed the scoring instructions to the letter, using the English-Spanish translation as closely as possible, while the other tried to get a global sense of what the adult or child was expressing. The scorers then revised their scores together and discussed their disagreements until they reached consensus for each child and adult interview. Consent was easily reached in most cases, since it usually involved pointing out some phrase that had not been attended to, or a more accurate translation of an English word.

CHAPTER 3

RESULTS

We will now present the results of the study. Because the data was collected at two different time points, five years apart, our first concern was that the subjects be similar on most socio-demographic variables and in regard to Verbal Intelligence. Thus, statistical analyses were conducted to examine if there were significant differences between the two groups regarding socio-demographic variables, Verbal IQ and the variables of emotional understanding in children as well as the parental variables. Once it was determined that there was no significant differences between the two groups regarding all these aspects, statistical analyses (ANOVAs) were done to examine significant differences between the groups by age and status. Finally, a correlation analysis was done to explore the relationships between the all the variables examined in the study.

Results Regarding Differences Between the Samples Taken at the Two Times of Data Collection

In order to determine if the sample assessed in 1995 was similar to the sample taken in 2000 with regard to income, education and occupation, a chi-square analysis was done on these socio-demographic characteristics. The sample was divided according to "Time" defined as a variable with two values: "first time" (subjects assessed in 1995) and "second time" (those assessed in

2000). A separate chi-square analysis was done for each aspect, income, education and occupation, categorized as described in the preceding chapter. Results of these analyses were not significant: income, χ^2 (2, $N = 63$) = 3.427, ns; education, χ^2 (3, $N = 63$) = 2.982, ns; occupation, χ^2 (3, $N = 63$) = 2.283, ns.

A t-test comparing the results of both Time groups, the First Time, assessed in 1995, and the Second Time, assessed in 2000, was also done for each of the dependent variables: the four variables of children's emotional understanding (Amb HS, Amb LA, FCh HS, FCh LA), the two mother variables (Emotional Awareness and Attitude toward Children's Expressiveness) and the children's Verbal IQ. Results of these analyses are presented in Table 7 along with the means and standard deviations of both groups. They indicate that Verbal IQ was significantly higher in the group assessed in the year 2000. This point will be considered again in the latter part of our analysis when we examine the correlations between the variables. There were no other significant differences between the two groups for any of the dependant variables.

Table 7

Mean Scores, Standard Deviations and t-test Results for Each

Dependant Variable for Both Time Groups

Dependent Variable	First Time n = 34		Second Time n = 29				
	M	SD	M	SD	t	df	p
Amb HS	1.08	.86	1.20	.90	-.53	61	.59
Amb LA	.88	.76	.86	.78	.10	61	.91
FCh HS	1.26	.70	1.27	.59	-.06	61	.94
FCh LA	1.17	.57	1.24	.57	-.44	61	.65
PACES	50.47	7.81	49.00	7.16	.77	61	.44
LEAS	51.94	4.84	53.06	5.39	-.87	61	.38
VIQ	87.55	11.29	95.96	10.30	-3.06	61	.003**

Note: Amb HS = Ambivalence Happy/Sad; LA = Ambivalence Love/Anger; FCh HS = Feeling Change Happy/Sad; FCh LA = Feeling Change Love/Anger; PACES = Parent Attitude toward Children's Expressiveness; LEAS = Levels of Emotional Awareness; VIQ = Verbal Intelligence.
**p <.01

Results Regarding the Variables of Emotional Understanding

The first hypothesis of this study was that children with emotional or behavioral problems would have a lower understanding of ambivalence and of how feelings change. The results, however, do not support this hypothesis. The second hypothesis referred to differences according to age. Most of the variables (except one, Feeling Change Happy/Sad) showed significant differences between age groups, thus mostly confirming this hypothesis. The following information illustrates these conclusions.

Results regarding the Variable Understanding of Ambivalence Happy/Sad (Amb HS)

The Ambivalence Happy/Sad score evaluated the children's ability to recognize the conflict between happy and sad feelings in a situation where a child has lost a pet and received a new one. As already explained, subjects' answers were scored on an ordinal scale from Level 0 to Level 3, according to the depth of their understanding of the ambivalence experienced by the child in the story. Descriptive information for the results of the dependant variable "Ambivalence Happy/Sad" is presented in Table 8.

Table 8

Means and Standard Deviations of Scores Obtained by Each Group

on the Variable Ambivalence Happy/Sad

Group	M	SD	n
Control			
Younger[a]	1.05	1.02	17
Older[b]	1.56	.51	16
Clinical			
Younger[a]	.67	.82	15
Older[b]	1.26	.88	15
Control (both ages)	1.30	.84	33
Clinical (both ages)	.97	.89	30
Younger[a] (both status)	.87	.94	32
Older[b] (both status)	1.41	.71	31

[a] = Children ages 7-8. [b] = Children ages 10-11.

The above table indicates that there are differences (for significant differences, see Table 10) in the scores of Younger (7 and 8 year-old) and Older (10 and 11 year-old) children in both Clinical and Control groups. The table also shows that the standard deviations of the Control/Older children are smaller that those of the

other groups. Table 9 shows the number and percentage of subjects that scored at each level grouped by status and by age.

Table 9

Number and Percentage of Subjects who Scored at Each Level of Understanding of Ambivalence Happy/Sad (Percentages are in parentheses)

	Control		Clinical		
	Younger[a]	Older[b]	Younger[a]	Older[b]	n^c
Level 0	7	0	8	4	19
(%)	(41.2)		(53.3)	(26.7)	(30.2)
Level 1	3	7	4	3	17
(%)	(17.6)	(43.8)	(26.7)	(20)	(20)
Level 2	6	9	3	8	26
(%)	(35.3)	(56.3)	(20)	(53.3)	(41.3)
Level 3	1				1
(%)	(5.9)				(1.6)

[a] = Children aged 7-8; n = 17 for control status and n = 15 for clinical status.
[b] = Children aged 10-11; n = 16 for control status and n = 15 for clinical status.
[c] = N = 63.

Of the total sample, about half of the subjects (41.3%) scored on level 2, meaning that they are able to coordinate conflicting feelings, and only one subject (from the Control/Young group) reached level 3 of understanding of ambivalence, indicating that he not only recognized spontaneously the possibility of experiencing two opposite feelings at the same time, but also that these feelings would mix and influence each other. More subjects of the Younger (n = 15) than the Older group (n = 4) were given a score of 0, as were more Clinical (n = 12) than Control subjects (n = 7).

The hypothesis that Clinical subjects would have a lower level of understanding of ambivalence happy/sad was not supported. Univariate analysis of variance shows that Status was not a significant source of variance in this variable [F (1/59) = 2.665, p = .108] (See Table 10).

Table 10

Sources of Variance due to Status, Age and their Interaction in the Variable Ambivalence Happy/Sad

Source	df	F	p	η²	Observed Power
Status	1	2.66	.10	.04	.36
Age	1	6.85	.01**	.10	.73
Status X Age	1	.052	.82	.00	.05
Error	59				

**p <.01

On the other hand, age was a significant source of variance [F (1/59) = 6.859, p = .01], which supports one part of the second hypothesis that older children would have a higher level of understanding of ambivalence happy/sad. The interaction between Status and Age was not significant [F (1/59) = .052, p = .820].

Results for "Ambivalence Love/Anger" (Amb LA)

Table 11 presents descriptive information for the dependant variable "Ambivalence Love/Anger" and shows an important

difference between the mean scores of Younger and Older children in both Clinical and Control groups.

Table 11

Means and Standard Deviations of scores of Ambivalence Love/Anger for Clinical and Control, Younger and Older Children

Group	M	SD	n
Control			
Younger[a]	.76	.56	17
Older[b]	1.00	.52	16
Clinical			
Younger[a]	.60	.91	15
Older[b]	1.13	.99	15
Control (both ages)	.88	.54	33
Clinical (both ages)	.87	.97	30
Younger[a] (both status)	.69	.74	32
Older[b] (both status)	1.06	.77	31

[a] = Children ages 7-8.   [b] = Children ages 10-11.

However, there is no significant difference between the mean scores of Control and Clinical children (see Table 13). For this variable Clinical subjects had larger standard deviations than Control subjects, indicating more variability in their scores.

Table 12 presents the number and percentage of subjects in each group who scored at each level. Only one subject (of the Clinical/Younger group) obtained a score of Level 3 on this variable. Most of the subjects' responses were scored on level 0 (thus not recognizing the presence of conflicting feelings in the situation), or Level 1 (meaning that they were able to coordinate contrasting feelings only after being probed).

Table 12

Number and Percentage of Subjects at Each Level of Development of

Understanding for Ambivalence Love/Anger (Percentages are in

parentheses)

	Control		Clinical		
	Younger[a]	Older[b]	Younger[a]	Older[b]	n[c]
Level 0	5	2	9	6	22
(%)	(29.4)	(12.5)	(60)	(40)	(34.9)
Level 1	11	12	4	1	28
(%)	(64.7)	(75)	(26.7)	(6.7)	(44.4)
Level 2	1	2	1	8	12
(%)	(5.9)	(12.5)	(6.7)	(53.3)	(19)
Level 3			1		1
(%)			(6.7)		(1.6)

[a] = Children aged 7-8; n = 17 for control status and n = 15 for clinical status.
[b] = Children aged 10-11; n = 16 for control status and n = 15 for clinical status.
[c] = N = 63.

The Univariate ANOVA for this variable does not show significant differences according to Status [$F_{(1/59)}$ =. 007, p = .935], but does indicate that Age gives differences that are significant [$F_{(1/59)}$ = 3.980, p = .05]. The interaction between

Status and Age was not significant [F (1/59) = .598, p = .442] (See Table 13).

Table 13

Sources of Variance due to Status, Age and their Interaction in the Variable Ambivalence Love/Anger

Source	df	F	p	η²	Observed Power
Status	1	.007	.93	.00	.05
Age	1	3.98	.05*	.06	.50
Status X Age	1	.59	.44	.01	.11
Error	59				

*p < .05

Results for "Feeling Change Happy/Sad" (FCh HS)

Tables 14 and 15 present descriptive data for the variable "Feeling Change Happy/Sad". Few differences are visible in the groups' means, but large differences appear in the standard

deviations of the Older children groups, particularly for the Clinical children, indicating that there was more variability in their scores as is also evident in Table 15.

Table 14

Means and Standard Deviations of all Groups for the Variable Feeling Change Happy/Sad

Group	M	SD	n
Control			
Younger[a]	1.06	.43	17
Older[b]	1.37	.72	16
Clinical			
Younger[a]	1.20	.41	15
Older[b]	1.46	.91	15
Control (both ages)	1.21	.60	33
Clinical (both ages)	1.33	.71	30
Younger[a] (both status)	1.12	.42	32
Older[b] (both status)	1.42	.81	31

[a] = Children ages 7-8. [b] = Children ages 10-11.

Most subjects (n = 41) were found to be at Level 1 of understanding of how feelings change (when the subject believes that feelings come and go in response to external events and circumstances). Only three subjects in the whole sample (of the Clinical/Older group) reached Level 3 on this variable (meaning that the child understands that negative feelings come and go in response to memories, thoughts and attitudes).

Table 15

Percentage of Children in Each Group that Scored at Each Level of Understanding on Feeling Change Happy/Sad

	Control		Clinical		
	Younger[a]	Older[b]	Younger[a]	Older[b]	n^c
Level O	1	2		1	4
(%)	(5.9)	(12.5)		(6.7)	(6.3)
Level 1	14	6	12	9	41
(%)	(82.4)	(37.5)	(80)	(60)	(65.1)
Level 2	2	8	3	2	15
(%)	(11.8)	(50)	(20)	(13.3)	(23.8)
Level 3				3	3
(%)				(20)	(4.8)

[a] = Children aged 7-8; n = 17 for control status and n = 15 for clinical status.
[b] = Children aged 10-11; n = 16 for control status and n = 15 for clinical status.
[c] = N = 63.

Most subjects of the Control group were at Level 1 (n = 20),

and some at Level 2 (n = 10), while Clinical children were mainly at

Level 1 (n = 21). Three of the Clinical children scored on Level 3

suggesting that Clinical subjects presented more variability in their

development of understanding, particularly the Clinical/Older group.

Analysis of Variance on this variable shows that neither

Status [F (1/59) = .506, p = .480], nor Age [F (1/59) = 3.17, p = .08]

represented significant sources of variance (See Table 16.)

Table 16

*Sources of Variance due to Status, Age and their Interaction in the
Variable Feeling Change Happy/Sad*

Source	df	F	p	η^2	Observed Power
Status	1	.50	.48	.009	.10
Age	1	3.17	.08	.051	.41
Status X Age	1	.02	.88	.00	.05
Error	59				

Results for "Feeling Change Love/Anger" (FCh LA)

Tables 17 and 18 present the descriptive information of the last children's dependant variable FCh LA. There are differences in the mean scores of Control and Clinical children, as well as between those of Younger and Older children (See Table 19).

Table 17

Means and Standard Deviations of Scores on the Variable Feeling Change Love/Anger for all Groups According to Status and Age

Group	M	SD	n
Control			
Younger[a]	1.23	.44	17
Older[b]	1.50	.52	16
Clinical			
Younger[a]	.86	.51	15
Older[b]	1.20	.67	15
Control (both ages)	1.36	.49	33
Clinical (both ages)	1.03	.61	30
Younger[a] (both status)	1.06	.50	32
Older[b] (both status)	1.35	.60	31

[a] = Children ages 7-8. [b] = Children ages 10-11.

As with Feeling Change Happy/Sad, most of the subjects scored on level 1 (n = 40) and a few scored on level 2 (n = 18), indicating that there is a beginning awareness that thoughts and memories affect the coming and going of feeling states. None reached level 3 on this variable, which suggests that using strategies such as thoughts or memories to change angry feelings might be more difficult to appreciate than using such strategies to change sad ones.

Table 18

Number and Percentage of Children that Scored at Each Level of

Understanding of Feeling Change Love/Anger

	Control		Clinical		
	Younger[a]	Older[b]	Younger[a]	Older[b]	n^c
Level O			3	2	5
(%)			(20	(6.7)	(7.9)
Level 1	13	8	11	8	40
(%)	(76.5)	(50)	(73.3)	(60)	(63.5)
Level 2	4	8	1	5	18
(%)	(23.5)	(50)	(6.7)	(13.3)	(28.6)
Level 3					
(%)					

[a] = Children aged 7-8; n = 17 for control status and n = 15 for clinical status.
[b] = Children aged 10-11; n = 16 for control status and n = 15 for clinical status.
[c] = N = 63.

In contrast with the other three variables, both Status and Age

represented significant sources of variance in FCh LA as shown on

Table 19. The interaction was not significant.

Table 19

Sources of Variance due to Status, Age and their Interaction in the

Variable Feeling Change Love/Anger

Source	df	F	p	η²	Observed Power
Status	1	6.02	.017*	.009	.67
Age	1	1.40	.032*	.051	.58
Status X Age	1	.063	.80	.00	.05
Error	59				

* *p* < .05

In summary, the hypothesis that children in the Clinical group would have a lower level of understanding of emotion than Control children was only supported in the Feeling Change Love/Anger variable of emotional understanding. This was the only variable where status was a significant source of variance. The hypothesis that older children would have a higher level of understanding than younger children was supported by most of the analyses. For three of the cognitive emotional variables (Ambivalence Happy/Sad, Ambivalence Love/Anger, and Feeling Change Love/Anger) age was

a significant source of variance. However, scores for the variable Feeling Change Happy/Sad did not show significant differences for Age.

Results for the Mothers' Variables

The third hypothesis of this study proposed that mothers of Clinical children would have a lower level of emotional awareness and would demonstrate either more permissive or more authoritarian attitudes towards children's emotional expression than mothers of control children. There were not significant differences among the groups for either of these variables.

The Parent Attitude Toward Children's Expressiveness Scale (PACES)

The PACES score is a measure of permissive versus controlling attitudes of parents when confronted with their children's emotional expression in different situations. Scores on this scale can range from 20 (more permissive) to 80 (more controlling). On the PACES scale, mothers of younger children (both control and clinical) were slightly more permissive than mothers of older children (see Table 20 for mean scores and standard deviations for all groups).

Table 20

Mean Scores and Standard Deviations on the Parent Attitude Toward

Children's Expressiveness Scale (PACES)

Group	M	SD	n
Control			
Younger[a]	47.3	8.6	17
Older[b]	51.3	5.9	16
Clinical			
Younger[a]	49.4	5.6	15
Older[b]	51.4	9.1	15
Control (both ages)	49.2	7.6	33
Clinical (both ages)	50.4	7.5	30
Younger[a] (both status)	48.3	7.3	32
Older[b] (both status)	51.3	7.5	31

[a] = Children ages 7-8. [b] = Children ages 10-11.

Univariate ANOVAs showed that neither Status nor Age were

significant sources of variance for this variable (see Table 21).

Table 21

Sources of Variance due to Status, Age and their Interaction in the

Variable Parent Attitude Toward Children's Expressiveness Scale

Source	df	F	p	η²	Observed Power
Status	1	.337	.56	.00	.08
Age	1	2.54	.11	.04	.35
Status X Age	1	.28	.59	.00	.08
Error	59				

The Levels of Emotional Awareness Scale (LEAS)

The LEAS score reflects mothers' level of awareness of emotion. The scores range from 0 (very low) to 100 (very high). Table 22 shows the means and standard deviations of the scores obtained by the sample.

Table 22

Means and Standard Deviations for the Levels of Emotional

Awareness Scale (LEAS)

Group	M	SD	n
Control			
Younger[a]	54.1	4.7	17
Older[b]	52.3	6.0	16
Clinical			
Younger[a]	52.0	6.2	15
Older[b]	51.8	3.1	15
Control (both ages)	53.2	5.4	33
Clinical (both ages)	51.9	4.9	30
Younger[a] (both status)	53.1	5.5	32
Older[b] (both status)	52.0	4.7	31

[a] = Children ages 7-8. [b] = Children ages 10-11.

Most of the mothers' responses to the individual questions
were scored as Level 2 (which is given to answers that refer to
feelings as actions or as vague conscious states, like "good" or
"bad"), or Level 3 (attributed to responses that recognize the
presence of one feeling in situations that usually evoke conflicting

feelings), suggesting a very low level of emotional awareness in the whole group.

As with the PACES scale, LEAS scores on this sample did not show significant differences either by Age or by Status (See Table 23).

Table 23

Sources of Variance due to Status, Age and their Interaction in the Levels of Emotional Awareness Scale (LEAS)

Source	df	F	p	η^2	Observed Power
Status	1	.95	.33	.01	.15
Age	1	.62	.43	.00	.11
Status X Age	1	.34	.56	.01	.15
Error	59				

In summary, the hypothesis that mothers of Clinical children would have a lower awareness of emotion and would have more extreme attitudes towards their children's expressiveness than mothers of Control children (either would be more permissive or

more authoritarian) was not supported by the results of this study. Neither Status (control or clinical), nor Age (younger or older children) resulted in significant differences in the scores of either parental variable.

Results Regarding the Relationships Among Variables

The fourth hypothesis of this study was that there would be a significant relationship between the mothers' and the children's variables. Results do not support the hypothesis. Neither parental "Emotional Awareness" nor "Parent Attitude toward Children's Expressiveness" were significantly related to each other, nor to any of the children's measures of emotional understanding, thus not supporting the hypothesis that children's emotional understanding would be related to the parents' own awareness of emotion and to their attitudes toward emotional expression in children (See Table 24).

Table 24

Intercorrelations between Children's and Parents' Variables

	Amb HS	Amb LA	FCh HS	FCh LA	PACES	LEAS
V IQ						
r	.14	-.08	.07	.03	-.24*	.22*
p	.13	.25	.27	.40	.02	.03
Amb HS						
r		.43***	.21*	.26*	.09	-.05
p		.000	.04	.02	.24	.32
Amb LA						
r			.26**	.13	.14	.14
p			.01	.14	.12	.12
FCh HS						
r				.15	-.06	-.04
p				.11	.30	.36
FCh LA						
r					-.13	-.00
p					.15	.48
PACES						
r						-.17
p						.08

Note: Amb HS = Ambivalence Happy/Sad; Amb LA = Ambivalence Love/Anger; FCh HS = Feeling Change Happy/Sad; FCh LA = Feeling Change Love/Anger; PACES = Parent Attitude toward Children's Expressiveness Scale; LEAS = Levels of Emotional Awareness Scale.
*$p < .05$
**$p < .01$
*** $p < .001$

An unexpected result of the study was that both parental

variables were significantly correlated with their child's IQ (again see

Table 24). The LEAS has a significant positive correlation (suggesting that a higher IQ in children is related to a higher level of emotional awareness in parents), and the PACES had a negative significant correlation (meaning that higher IQs in children is related to more permissive attitudes of parents).

As mentioned previously, Verbal IQ showed a significant difference in both Time groups (those assessed in 1995 differed significantly from those assessed in 2000). Therefore, a partial correlation was done to examine the relationship between VIQ and each parental variable without the influence of time of assessment. Results of this analysis indicate that the relationship between PACES and VIQ is still significant even after the influence of Time has been removed from the equation: $r_{ab.c} = -.2299$, $p < .05$. The correlation was no longer significant for LEAS and Verbal IQ: $r_{ab.c} = .2005$, n. s. once Time had been removed as a variable. In other words, of both maternal variables only mother's attitude toward children's expressiveness was significantly correlated with the child's VIQ.

The fifth hypothesis stated that there would be significant relationships between the children's variables of emotional understanding. Results partially support the hypothesis: although most of the variables of emotional understanding were significantly intercorrelated (See Table 24) not all of them were. Only

Ambivalence Happy/Sad was correlated with all the others, while Feeling Change Love/Anger did not correlate with Ambivalence Love/Anger or with Feeling Change Happy/Sad. Thus, both measures of understanding of ambivalence were correlated, but the two measures of understanding of how feelings change were not.

In conclusion, none of the parental variables was significantly correlated with the children's variables of emotional understanding, but one of them, attitudes toward emotional expression, was negatively related with children's IQ. In other words, the hypothesis that there would be a significant correlation between the parents' variables (awareness of emotion and attitudes towards children's expressiveness), and children's variables of emotional understanding (understanding of ambivalence and of how feelings change) was not supported by the data. Moreover, of the children's variables of emotional understanding, only Ambivalence Happy/Sad was significantly correlated with the other three. On the other hand, Feeling Change Love/Anger only related significantly to Ambivalence Happy/Sad and was not correlated with either Ambivalence Love/Anger or with Feeling Change Happy/Sad.

Results Regarding Comparisons Between Variables of Emotional Understanding

Though it was not part of the original proposal we thought it would be interesting to investigate if there were significant differences in the scores obtained by each child on the variables of emotional understanding. Four paired t-tests were conducted comparing both scores of understanding of ambivalence, both scores of understanding of feeling change, and each type of ambivalence with its matching pair of feeling change. The idea of this comparison was to examine if there were aspects of emotional understanding that were more or less developed in the sample in general. Results of these analyses (see on Table 25) indicate that Ambivalence Love/Anger scores were significantly lower than scores on Ambivalence Happy/Sad and than scores on Feeling Change Love/Anger.

Table 25

t-Test of Pairs of Variables

	t	*df*	*p*
Amb HS - Amb LA	2.4*	62	.01
Amb HS – FCh HS	-1.03	62	.30
Amb LA – FCh LA	-2.94**	62	.005
FCh HS – FCh LA	.62	62	.53

Note: Amb HS = Ambivalence Happy/Sad; Amb LA = Ambivalence Love/Anger; FCh HS = Feeling Change Happy/Sad; FCh LA = Feeling Change Love/Anger.
*$p < .05$
**$p < .01$

CHAPTER 4

DISCUSSION

Multiple theories on the etiology of emotional disturbance in children exist. However, etiological theories are difficult to verify experimentally due to the host of biological and environmental variables that affect children's emotional development. Theories regarding the cognitive-emotional development of children, the emotional understanding in children, and behavioral and emotional disruption in children are examples of etiological theories researchers struggle to substantiate.

Several authors, for example Selman (1981), Harter (1982), Carroll and Steward (1984), Donaldson and Westerman (1986), Nannis (1988), Meerum Terwogt and Olthof (1989) and Saarni (1999), have found that there are differences in emotional understanding between children with emotional problems and children without emotional or behavioral difficulties. These differences in understanding may help explain why children with emotional and/or behavioral problems have difficulty managing and controlling their behavior. These differences also suggest a path for treatment: if children with emotional problems have difficulties with emotional understanding, an attempt could be made to teach them to understand better their emotions. This understanding might help them improve their behavior. Many treatment interventions, particularly those based on cognitive-behavioral theories, stem from

such assumptions. Research with clinical populations, however, has not consistently produced data that support these theories. Studies of the proposed differences between the emotional understanding of children with emotional and/or behavioral problems and children without these problems have not produced conclusive results.

The present study is an example of a study attempting to evaluate the link between emotional disturbance and emotional understanding in children. This study began with the hypothesis that children in clinical populations would have a different rate of development in their emotional understanding, that is, their concepts and ideas about emotions, than children without such problems. It was also hypothesized that mothers of children from clinical populations would differ from mothers of "normal" children in their emotional awareness, meaning their ability to recognize emotions in themselves and in others, as well as in and their attitudes toward their children's emotional expression, i.e. they would be more permissive or more authoritarian. An additional hypothesis was that children's emotional understanding would relate to mothers' emotional awareness and attitudes concerning emotional expression.

Results of the study, however, do not confirm these hypotheses. Only in the aspect of how love/anger feelings change

did the data indicate differences between the emotional understanding of children with emotional difficulties and children without these problems. Children with emotional difficulties had a lower understanding of how angry and loving feelings change. Furthermore, no differences were found in the attitudes and awareness of the mothers of the two groups and no relationship was found between mothers' attitudes and awareness and children's emotional understanding.

Nevertheless, the present study produced data on the emotional understanding, emotional attitudes and emotional awareness of a group of subjects from a South-American country, a culture different from the North American/European culture in which most studies to date have been done.

Results Regarding Age/Stage Differences

One of the conclusions of this study supports the theory that cognitive-emotional understanding increases with age. In three of the four variables of emotional understanding older children obtained higher scores than younger children, and the differences were statistically significant. The results also suggest that this developmental progression occurs across cultures, even if the

rhythm of development might be different from one culture to another. This is a point to which we will return later in this chapter.

The only variable that did not show significant differences between older and younger children was the understanding of how happy and sad feelings change (Feeling Change Happy/Sad). This is contrary to results in other studies (for example, Donaldson & Westerman, 1986). One explanation could be that this variable is "easier" to understand for younger subjects, since in general children obtained the highest scores in this aspect[20] of the testing, and it was also the variable in which younger children from the clinical group obtained a higher score of all four variables of emotional understanding (Ambivalence Happy/Sad, Ambivalence Love/Anger, Feeling Change Happy/Sad, Feeling Change Love/Anger). Another possible explanation for the lack of significant differences according to age is the greater variability (higher Standard Deviation) shown by the older groups particularly the older children from the clinical population, which had a standard deviation twice as large as the standard deviation of the younger group from the clinical population (see Table 14, page 135).

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[20] Mean scores for the Total sample were: Amb HS, $M = 1.14$, $SD = 1.14$; Amb LA, $M = .87$, $SD = .77$; FCh HS, $M = 1.26$, $SD = .65$; FCh LA, $M = 1.20$, $SD = .57$.

Results Regarding Status

The only variable that showed a significant difference according to Status was the understanding of how angry feelings change into love feelings (Feeling Change Love/Anger), where, as predicted, children in the clinical groups had a lower level of understanding than control children. For the other three variables no differences were evident.

Other studies have also found that clinical populations give similar responses to "normal" children's responses in many aspects of emotional understanding. There were no significant differences in emotional understanding between boys from the clinical and non-clinical groups in Taylor and Harris's (1983 & 1984) studies, for example. These authors state that clinical boys had less difficulty with understanding than with putting their understanding into practice (emotional control).

More recent research (Meerum Terwogt, 1990; Southam-Gerow & Kendall, 2000) also found no differences between children with emotional/behavioral problems and children from control samples in many aspects of emotional understanding, particularly in the understanding of multiple emotions. Other studies have found no differences between children from clinical and control groups in

aspects such as the ability to identify emotions as mental states, or in the ability to identify strategies for self-control (Meerum Terwogt, Schene & Koops, 1990). Furthermore, Cook, Greenberg and Kusche (1994) found no differences in the ability of behaviorally disordered children (those given high and moderate ratings on the Externalizing and Aggressive scales of the Achenbach) to report appropriate examples of some feelings such as "mad", "scared", "love", "guilty", "jealous" or "lonely".

There are several possible explanations for these results. One possibility is that not all aspects of emotional understanding show variation when deviant or abnormal behavior is present. Thus, the presumption of traditional psychodynamic theories notwithstanding, deficient understanding of ambivalence may not significantly influence deviant behavior. A second possibility is that children from the clinical populations understand emotion as well as children from non-clinical populations, but some other factor (or constellation of factors) leads to their behaving in ways incongruent with their cognitive knowledge. Children with behavioral problems may know what's expected, but may be unable to behave according to their knowledge.

An explanation for the lack of significant differences in the present study between the clinical and the control groups might be

found in the fact that children from the clinical groups, especially older children, showed more variability (as evidenced by larger standard deviations) in levels of emotional understanding than the children in the control groups (See tables 8, 9, 11, 12, 14, 15, 17, & 18, pages 127, 128, 131, 133, 135, 136, 138, & 140). This could mean that clinical children's emotional understanding develops at a more erratic pace making it difficult to isolate a difference between the two groups without a much larger sample. The greater variability in the results for clinical children may also be related to the wide range of diagnoses carried by these children. Further studies would be needed to isolate any difference that may exist between the two groups.

The one aspect of emotional understanding where the Status (Clinical/Control) variable made a significant difference was the understanding of how angry feelings may change into love feelings. This finding supports the results of previous studies, which show that children from the clinical populations have a lower level of understanding of how feelings change (Southam-Gerow & Kendall, 2000). Again, this finding suggests that not all areas of emotional understanding are equally affected in children in clinical

populations[21]. Possibly, the relationship between anger and love is a more significant aspect of emotional understanding, and having difficulties in understanding how anger can alternate with love makes children more likely to engage in deviant behavior. Thus, understanding of the changing aspect of anger and love might be an area in which children diagnosed with conduct disorder experience more deficits in emotional understanding.

Results Regarding Parental/Mothers Variables

There were no significant differences between Clinical and Control group scores on any of the mothers' variables. All groups, the Clinical, the Control, the younger, and the older, had similar scores on both the PACES (Parents' Attitudes Towards Children's Expressiveness Scale) and the LEAS (Level of Emotional Awareness Scale), and similar standard deviations. A possible explanation for this lack of difference is that mothers in both groups were equally affected by social desirability. Since both scales were read to the subjects and their answers recorded verbatim, a departure from the anonymous self-reporting used in other studies due to some

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[21] Southam-Gerow and Kendall (2000) used the same scoring criteria utilized in the present study. However, they did not use the same interview and they pull together into a single score the subjects' responses to different types of feelings.

subjects' poor literacy skills (see Instruments in Chapter 2), the responses might have been equally influenced in all groups by the mothers' perceptions of what they thought the interviewer wanted to hear.

In addition, neither parents' emotional awareness nor their attitudes towards children's expressiveness were significantly related to their child's emotional understanding. These findings contrast with those of prior studies (Saarni 1985; Covell & Abramovitch, 1987; Saarni, 1989b), as well as some theoretical assumptions, that parents' emotional attitudes and expression do influence their children's emotional understanding (Cole, Michel & Teti, 1994; Saarni, 2000). These previous studies, however, were conducted with non-clinical subjects. There is a dearth of studies about emotional understanding and its relationship with parental characteristics with clinical subjects. In fact, a review of recent literature produced no published studies in this area. It is therefore not possible to compare the results of the present study with those of another.

It may be, however, that the lack of a finding of significant relationships between parental variables and children's emotional understanding is related to the fact that the dyads studied here consisted of mothers and their sons. Some studies have found that

there are stronger associations in the cognitive emotional responses of parents and their same-sex children (i.e. fathers and sons) than between parents and children of opposite gender. For example, Eisenberg, Fabes, Schaller, Carlo and Miller (1991) examined the relationship between parents' attitudes toward children's expressiveness (measured with the PACES) and their children's (ages 9, n = 71 and 12, n = 56) emotional response to a film about a handicapped child. Their results showed that parents' characteristics (including attitudes towards emotional expression) were more highly correlated with children's emotional understanding and experience of empathy and sympathy when the parent and child dyad was of the same sex. These results suggest that the lack of correlations found in the present study could be due to the dyads consisting of an opposite-sex parent and child.

A contributing factor to the low scores on the items of the Level of Emotional Awareness Scale could be that the LEAS' requirements of verbal ability placed an unfair handicap on this sample from a low socioeconomic background. Lane (2000) suggests that verbal ability contributes to performance on the LEAS. Mother's verbal ability was not assessed in this sample, however, so there is no way to know how fluent or articulate the mothers are in their daily life. Our only observation refers to the length and

richness of their answers to the questions, which were in general short. More studies are needed to confirm that the levels of emotional awareness obtained by this sample are representative of the general population. In addition, a comparison with middle-class adults from the same country would be needed to determine how generalizable they are to other groups within the same culture.

Results Regarding Verbal Intelligence

This study did not find a correlation between Verbal IQ and emotional understanding. This finding is not unusual. Donaldson and Westerman (1986), for example, found that Verbal IQ did not account for any significant part of the variance in the emotional understanding of the children in their study. Bohnert (1999) and Southam-Gerow and Kendall (2000) also failed to find a relationship between emotional understanding and IQ. On the other hand, researchers have reported that general verbal ability influences the ability to talk about emotions in pre-school (Hughes, Dunn & White, 1998; Cutting & Dunn, 1999) and older children (Carroll and Steward, 1984; Cook, Greenberg & Kusche, 1994) indicating that higher cognitive ability is related with higher emotional understanding. Research comparing different types of

measurements of intelligence or cognitive level is needed to clarify the relationship between verbal development and emotional understanding.

Regarding Verbal Intelligence, 9 of our subjects, 3 in the Control groups and 6 in the Clinical groups, scored low on the Verbal IQ test, two of them obtaining scores in the mentally retarded range (VIQ = 69). None of the Clinical group children, however, had been referred to the Hospital's psychiatric units for academic deficits and the teachers of the children in the Control groups had considered them "average" students. Moreover, Verbal Intelligence was not significantly related to the scores of children in either group on emotional understanding (See Table 24 on page 148). That children who score low on a VIQ test can still achieve at school in the average range might seem puzzling, but is a situation that other colleagues have encountered when assessing children from public schools in Colombia. It seems that children who score low on Verbal tasks are able to do well academically if they are hardworking, at least in elementary school. The picture changes in the higher grades, where more abstract thinking is demanded. On the other hand, it has been shown that children from a socio-economically disadvantaged class (such as those in the present sample) perform less well on formal verbal tests (Kaufman, 1994).

Another aspect related to the VIQ scores is that children from the Second Time group (those assessed in 2000) obtained significantly higher scores in the VIQ testing. Part of this result is explained by the coincidence that both subjects who obtained the lowest VIQ scores (69) were in the "First Time" group, while the two boys with the highest VIQ (111) were in the "Second Time" group. Therefore, both extreme scores were unevenly distributed between the two time-groups. To verify that these extreme scores were not the cause of the lack of significant differences between the two time groups in the dependent variables (see Table 7 on page 125), a second t-test was conducted with a sample of n = 59, which represents the original sample minus the four subjects that had obtained the extreme VIQ scores. Results for this analysis are shown in Table 26 in Appendix D (page liii). They demonstrate the same pattern as found before, that is, the only dependent variable that shows any significant difference in between both time-groups is Verbal IQ.

Another explanation for the fact that children in the first group obtained a lower VIQ than children in the second group is related to the finding in the research conducted with the WISC-R test over the years. Kaufman (1994) mentions that studies done in several countries of Europe, Japan, North America and other

countries found that subjects obtained higher IQ scores at the time of testing than did other cohorts of the same age tested years before, thus giving the impression that the population became more intelligent as the years went by. Tests' norms get outdated and the test becomes "easier", thus giving less accurate results of the person's real skills. Still, Kaufman talks about studies conducted 15 to 20 years apart and the difference here is only of 5 years, which may not be enough time to introduce a significant difference.

However, because of the previously mentioned concern that the extreme scores on the Verbal IQs that 4 of the subjects obtained could have influenced the results, a new analysis of variance was conducted, removing from the sample the four subjects that had obtained the extreme scores. Results of this new analysis are presented on Tables 27 and 28, in Appendix D (pages liv and lv). These tables show that the main difference from the results of the previous analysis is that Ambivalence Love/Anger did not present a significant difference according to Age as it had before. As in the previous report, younger children differed significantly from the older children regarding their understanding of Ambivalence Happy/Sad and of Feeling Change Love/Anger, and the children in the clinical and the control groups differed significantly in their understanding of Feeling Change Love/Anger. All other variables,

specifically children's understanding of Feeling Change Happy/Sad and mothers' attitudes toward emotional expression and their emotional awareness, did not show significant differences according to Status (Clinical/Control) or Age (Younger/Older).

A correlation analysis was also done with this reduced sample (see Table 29, Appendix D, page lvi). The data presented in the table shows similar results as previously reported. As mentioned earlier, Ambivalence Happy/Sad correlated significantly with the other three variables of emotional understanding and Ambivalence Love/Anger showed a significant relationship only with Feeling Change Happy/Sad, while all the other variables including parental variables and children's variables did not relate to each other. The only variant in between Table 29 and Table 24 (page 148) is that Verbal IQ was significantly related only to LEAS and not to PACES. However, when a partial correlation was done to remove the influence of Time from the equation (as done before with the full sample, see page 149) none of the correlations was significant any longer: $r_{ab.c}$ = .0968, n. s. for the PACES, and $r_{ab.c}$ = .2128, n. s. for the LEAS. These results suggest that the mothers' variables were not associated with the children's variables. The significant correlation between Verbal IQ and PACES observed in the full sample is explained by the scores of the mother-child dyads of children with extreme Verbal IQ scores.

To summarize, it appears that the subjects with outlying scores in Verbal IQ were responsible for the association of PACES with VIQ and for the difference in the understanding of younger and older children regarding the understanding of Ambivalence Love/Anger. The conclusion from this second set of analyses is that the study's results are reliable regarding the increase with age in the understanding of Ambivalence Happy/Sad and of Feeling Change Love/Anger, as well as the difference between children in the clinical and the control groups in regards to understanding of Feeling Change Love/Anger.

Only four of the Verbal subtests of the WISC-R scale were used, in order to avoid tiring the children. As conducted, the procedure took between an hour and an hour and a half to complete both the Verbal skills assessment and the assessment of emotional understanding. Giving the whole test to the children would have added at least a half hour, since the Performance subtests can take a longer time to administer. Moreover, using only subtests of the WISC scales is a common practice in cognitive-emotional research. Some authors have chosen to use only the Vocabulary subtest (Shipman & Zeman, 1999), arguing that it is the subtest most highly correlated to the Total IQ. Others (Southam-Gerow & Kendall, 2000) have chosen to use the Vocabulary and Block Design subtests as

substitutes for the whole WISC-III scale, since these are the subtests that show the highest correlations with the Total IQ scores.

The choice of the WISC-R over the WISC-III could be questioned. The choice is justified by the fact that in 1995 the WISC-III was still not widely used in Colombia and there were no official translations of the test into Spanish. The two government hospitals continued to use the WISC-R for their assessments in 2000. It was essential to use the same test across samples and across times even if norms are more stringent for the WISC-III. Furthermore, correlational studies indicate that there is a high correlation between the WISC-R and the WISC-III, particularly for the Verbal IQ scores (r = .90). Correlations between both scales were also high and in the same direction when clinical samples, e.g., children with learning and reading disabilities, mood or anxiety disorders, and Attention Deficit Disorder, were compared (r = .86 for VIQ)[22] (Wechsler, 1991).

Lastly, another finding in the present study is the significant negative correlation found between the mothers' scores on the PACES and the children's VIQ (see Table 24). This data suggest that as children's IQ is higher mothers' scores on the PACES are lower. Thus mothers report more permissive attitudes toward emotional

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[22] In the clinical sample correlations were r= .73 for PIQ, and r= .86 for FSIQ.

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expression. It is hard to explain this result from the present data. The children with higher IQ scores could have mothers with higher verbal expressiveness, higher levels of emotional understanding, and more lenient attitudes toward emotional expression. Mothers could also exhibit more permissive attitudes toward emotional expression because their more intelligent children can better verbalize reasons for their behavior, thus making their mothers more confident about their ability to express their emotions appropriately in emotional situations. As discussed in Chapter 1, parents' socio-demographic characteristics have not been explored in areas such as attitudes toward emotional expression.

Culture and Emotional Understanding

Though the initial purpose of this study was not to compare the Colombian and the North American/European cultures, it is important to consider the question of how the results of the present study compare with results of studies conducted in different cultures. Authors (Saarni, 1998; Sharma & Fischer, 1998) have pointed out that emotions and socio-emotional development are especially sensitive and culturally influenced aspects of human behavior. The question remains whether the situations depicted in

the instruments used in this study were appropriate to assess

emotion related variables such as emotional understanding,

emotional awareness, and attitudes toward emotional expression in

a culture different that the one where those instruments were

developed. For example, in this study, the understanding of feelings

was assessed with animals as story characters[23]. Most studies that

found differences between clinical and normal children (Meerum

Terwogt, 1990; Meerum Terwogt, Schene & Koops, 1990; Cook,

Greenberg & Kusche, 1994; Casey, 1996; Southam-Gerow & Kendall,

2000) used direct questions (how would *you* feel if or when) and

referred to situations where peers, parents or other adults were

involved. This raises the point that differences might be more

highlighted when the child is asked about his/her own feelings in

relation to other people rather than to pets.

On the other hand, the content of the situations, such as

losing a pet or being angry at it, might not be as significant to the

children in this study. It could also be that children from low-income

families and from a different culture than European/North American

have a different attachment to pets. Children in Colombia may have

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[23] Donaldson (1984) indicated that she had chosen to portray animals in the stories because of the established practice in psychological testing to use animals to facilitate identification and projection of feelings like, for example, in the CAT (Children's Apperception Test). However, a more recent trend in this area is the use of human figures; an example is the RATC (Roberts Apperception Test for Children).

greater emotional connection with family members and other children because they are likely to belong to extended families and have several siblings. While pets are valued, cared for and loved in low-income families (such as those in this study), they may not be given the status they receive in middle class families (such as those depicted in the stories used in this study and the group from which most subjects of other similar studies come). Nevertheless, none of the children[24] expressed surprise at the hero's behavior regarding the pets, although they were not asked to comment on that. Thus, it is difficult to ascertain from this study what children feel about animals that live in their house.

Some studies are available in the published literature comparing emotional responses and emotional attitudes in different cultures. For example, Camras et al. (1998) compared the emotional expression in infants from China (n = 24), Japan (n = 24) and USA (n = 24) from middle-class families in two situations, one designed to elicit frustration and another to elicit fear. They observed that Chinese children were less expressive in terms of facial movement time (the percentage of time the child produced facial movements during the coding interval), variation of facial expression, and

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[24] Except a boy in the clinical group, who indicated that Bill should not be sad about losing Snowball because a cat was not important and he could always get another. This, however, was a boy who already showed strong psychopathic tendencies, according to the unit's psychiatrist.

number of facial expression changes than either Japanese or American infants.

Jungsook Han, Leichman and Wang (1998) also observed that children of different cultures reported emotions of different valences for the same situations. They asked children 4 to 6 years of age what emotions a protagonist would feel when walking down a street where there were lots of cars, when his mother did not want to buy him a cake at the market, and when he was asked by his mother to leave the playground when he was playing with his friends. American children (n = 46) would report more negative emotions in all of these scenarios, such as sad, scared or bad, while Korean (n = 57) and Chinese (n = 55) children would more frequently attribute positive emotions to the protagonist, such as good, happy and excited.

Different cultures reinforce different responses to emotional situations. Children from different cultures report different emotions when faced with the same situation. For example, mothers' attitudes toward the learning and teaching of emotional expression seem to be different in two Nepali cultures (Tamang and Chhetri-Brahmin). Cole and Tamang (1998) interviewed 20 Tamang and 17 Chhetri-Brahmin mothers who had children in 1st grade of school asking them how did their children learn to manage their feelings. Mothers from the Tamang culture were more likely to indicate that they

would not teach their children directly about emotions and that "children learned right conduct automatically" than mothers from the Chhetri-Brahmin culture. The authors also interviewed 27 Tamang and 23 Chhetri-Brahmin first-graders asking them what they would feel and do in emotionally challenging situations such as a peer being aggressive toward them or toward an object, being separated from parents, complying with bedtime, parents arguing and joining a peer group. Children most frequently reported action in both culture groups was to avoid the situation (by moving away or by ignoring it) than to act on negative emotions, a "passivity" that the authors attribute to the value their village places on social harmony. Authors also report that children from the Tamang culture were more likely to report feeling "OK" in situations where American children will typically report negative emotions (for example, having to leave the playground to go shopping).

When comparing the responses of the subjects in this study with those of samples from different cultures, the main observation is that the children studied here consistently showed a lower level of emotional understanding than, for example, the sample collected by Donaldson (1984). Tables 30 and 31 on Appendix D (pages lvii and lviii) show the number and percentage of subjects of Donaldson's study at each level of emotional understanding for each variable,

and compare it to the number and percentage of subjects at each level in the present study. This data indicates that most of Donaldson's 10-11 year-old children reached level 3 of emotional understanding on all the variables while few of the same-age children in this study reached this level. Furthermore, very few of Donaldson's 7-8 year-olds scored at level 0 of emotional understanding while over 40% of the same-age children in the Colombian sample scored at this level on some variables.

One tentative conclusion that can be drawn from the comparison with Donaldson's data is that low-income children from a South American country show a different rate in their development of emotional understanding. Tenenbaum, Visscher, Pons and Harris (2004) present a similar conclusion in their study of emotional understanding of Quechua children. These authors interviewed 39 children from 2 age groups in a Quechua village in Perú; 4 to 7 year-olds (n = 18) and 8 to 11 year-olds (n = 21). Emotional understanding was assessed with an adapted version of a scale called the Test of Emotional Comprehension. The TEC uses an illustrated cartoon story to evaluate nine aspects of emotional understanding: emotional recognition, situational causes of emotion, desires (i.e. emotions experienced by different people in the same situation), emotional beliefs, attribution of past emotions,

emotion regulation, emotion hiding, mixed emotions and emotional morality. Tenenbaum et al. report that Quechua children's scores on the TEC were lower than the scores obtained by British children's of the same ages (n = 100, ages 3 to 11) assessed in a previous study. In addition, a higher number of British children than Quechua children successfully demonstrated understanding of every component.

Besides these differences, the study by Tenenbaum et al. (2004) suggests a different pattern in the development of emotional understanding in Quechua children. Older Quechua children demonstrated higher emotional understanding than younger Quechua children on the overall scores of the TEC, but children of the two age groups did not differ significantly in all aspects of emotional understanding, e.g., older children obtained higher scores on the desires, the emotional morality and the situational causes of emotional understanding. However, differences were not significant in the other components of the test.

The authors (Tenenbaum et al., 2004) also indicate that though the rank order (% of children succeeding in each component) was similar for the Quechua and the British samples it was not exactly the same, with mixed feelings and reminder of past emotions ranked differently in the two samples. This study supports

the idea that children of different cultures, in this case middle-class

British versus lower-class Latin American, develop emotional

understanding at different rates. Its findings are similar to the

differences between American and Latin American children found in

the present study. To further understand the cultural differences

affecting the development of emotional understanding, studies

should be conducted with children from different socioeconomic

groups from the same countries, and with children from different

socioeconomic classes in North American and European countries.

There also seemed to be a difference in mothers' attitudes

toward emotional expression between the Colombian sample

studied here and samples from other studies. Mothers in this study

expressed more authoritarian attitudes in the PACES than those

recorded by other authors in other North American populations. For

example, Table 32 in Appendix D compares the mean scores

obtained by two groups of parents in Saarni's (1989c) study, in

which she points out that parents of children that attended parochial

schools were significantly more authoritarian regarding their

children's emotional expression than college students who were also

parents (see Table 32, Appendix D, page lix). Mothers of the

Colombian sample demonstrated more authoritarian attitudes than

either group reported by Saarni. While social desirability might be an

explanatory factor (as indicated in the section "Results Regarding Parental/Mothers Variables, page 161), the table suggests that Colombian parents are more controlling than Americans.

In the same trend as the results recorded for the children, mothers' responses on the Levels of Emotional Awareness Scale indicate a lower rate of emotional awareness than samples from other countries. For example, the mothers in this sample had lower emotional awareness scores in the LEAS than the three groups reported in Lane et al.'s study (1996). This study included a group described as "Alexithymics", that is, subjects that have "absence of words for emotions". According to the authors, these subjects have limited emotional vocabulary and low ability to put emotion into words, and their study was geared toward demonstrating that people with Alexithymia scored significantly lower in the emotional awareness scale than people without the condition. As can be seen in Table 33 in Appendix D (page lx), the mean score obtained by the mothers' in the present study was four points lower that the mean score obtained by the Lane et al. (1996) group of Alexithymics.

Mothers of both Clinical and Control groups frequently gave level 3 responses (65.23%) considered by the authors of the scale to be answers at a "Preoperational" level. This implies that emotional states are perceived as having an "either/or" quality and that "the

capacity to experience multiple emotions" had not yet developed (Lane & Schwartz, 1987, p. 138). On this level, "the range of emotions experienced is limited, and verbal descriptions of emotions are often stereotyped". Approximately a third of the answers (27.53%) were scored at level 2, defined by Lane and Schwartz as a "Sensorimotor-Enactive" level, where "the ability to experience emotion as a conscious feeling state has not yet developed and the subject tends to experience or describe emotion more as an action or as a bodily sensation" (p. 138). The high frequency of these scores puts the sample studied at a generally low level of emotional awareness, with very low ability to understand others' emotional perspectives, to differentiate feelings, and to modulate emotional extremes. In addition, there were only 25 individual answers[25] that merited a score of Level 4 (1.98%), indicating that the responder understood that either she or the other person in the situation could experience two opposing feelings at the same time. Even more so, only five answers (.39%) received a score of Level 5, an indication that the responder recognized that both participants in the situation would experience two opposing feelings at the same time. Of these five answers, four were elicited by situation #20 ("*You and your best friend are in the same line of*

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[25] Out of the total of 1,260 responses, 20 responses per subject, N = 63.

work. There is a prize given annually for the best performance of the year. The two of you work hard to win the prize. One night the winner is announced: your friend. How would you feel? How would your friend feel?"), suggesting that this might be a situation where the sample studied here could more easily identify conflicting feelings. Perhaps this is a more common stressful situation that people from different cultures experience and thus can identify more clearly than others.

It could be argued that the LEAS is not an adequate instrument for the assessment of emotional awareness in a working class population, and that the situations it depicts might be too centered on middle-class values and norms, having no meaning for the lower class subjects evaluated in this study due to the social class differences in Colombia described above. A set of situations that would take into account the economic and social hardships that Colombians experience may have given different results.

More work needs to be done to understand accurately the cultural norms and practices in Colombian culture regarding emotional behavior in order to better understand the development of emotional understanding in children from Colombia. Authors (Bukowski & Sippola, 1998; Schneider, 1998) have highlighted the need for more cross-cultural research in order to better understand

psychological process within a culture and also the universality of concepts such as those of emotional development and emotional understanding. Bukowski & Sippola (op. cit.), in a review of studies on the effect of culture on development, conclude that while some authors argue that basic processes are common to all cultures and that differences are in the details, other authors argue that comparisons between cultures are impossible because processes and constructs are unique to each culture. Others yet propose a middle ground, asserting that each culture determines its social goals and social constructs and variations in development need to be understood from within the framework of each culture, not used to indicate differences in fundamental developmental processes or structures. Researchers in the area of child development (Bukowski & Sippola, 1998; Rubin, 1998; Saarni, 1998) emphasize that understanding cultural similarities and differences is an important subject of study. Research appears to reflect a growing awareness of the need to extend the scope of child development studies beyond the North American/European population where most psychological research on emotional understanding has been conducted so far.

In this sense, the most significant contribution of this study is to have obtained data about a sample representing a different culture, presenting a glimpse of the emotional understanding of the

children and adults in Colombia and allowing a comparison with existent data. Further investigation can begin to assess whether the theoretical sequences in emotional development proposed are universal or applicable primarily to the studied culture.

SUMMARY AND CONCLUSIONS

This study presented evidence of a developmental trend in some areas of emotional understanding, such as the understanding of ambivalence between happy and sad emotions and between love and anger. It also presented information about the understanding in children of different ages of the changing feelings such as love/anger and happy/sad. This study supported the results of previous studies in showing that older children have a more developed understanding of some areas of emotional cognition, such as the ambivalence between feeling happy and sad and feeling love and anger, and of how anger feelings change. It also indicated that children with emotional/behavioral problems might have a lower level of emotional understanding in at least one area: how feelings of anger can be changed.

The study found that there were no differences between mothers of normal children and mothers of children with psychopathology in awareness of emotion and attitudes towards their children's emotional expression. It also found no relation between the children's emotional understanding and parental variables. There was a significant negative correlation between children's Verbal IQ and mothers' attitudes toward emotional

expression. However, this significance disappeared when children with extreme Verbal IQs were removed from the sample.

The study presents data from a low-income population from a Latin-American country, two characteristics that are not frequently found in studies in the present literature on emotional understanding. Its conclusions are challenging and indicate the need for more research on low-income populations and of populations from countries other than North American and European, specifically Colombia.

The author of this study wish to make one final comment regarding how the study would be conducted if it were to be done now. Would it be designed in the same way as it was more than 10 years ago? The answer is yes and no. Yes, we think that the study of emotional understanding in clinical children, and its comparison with normal children, is a valuable area of study to help us increase our understanding of cognitive/emotional development and our ability to design effective interventions with children who have emotional and/or behavioral problems. Also, Donaldson and Westerman's (1986) scoring criteria continues to be an appropriate way of scoring the development of emotional understanding. However, Donaldson and Westerman's interview now appears cumbersome and insufficient. A more comprehensive and yet

simpler interview (Kusche Affective Interview-Revised, by Kusche, Beilke & Greenberg, 1988, cited by Southam-Gerow & Kendall, 2000) has since been disseminated widely. This interview consists of seven sections containing open-ended questions such as: "How do you know when you are feeling sad?" or "Can you change your feelings?" These types of questions, centering on the child's own perception and experience, may have been more relevant to the child than stories about pets. These questions also might be more meaningful to a sample from a lower socioeconomic background. As some authors suggest, for example Tenenbaum, Visscher, Pons and Harris (2004), different cultures emphasize different feelings and children engage with their parents in conversations about emotions to varying degrees. It is possible to imagine that Colombian mothers probably discuss ambivalence infrequently with their children, while hiding emotions, managing fear or responding to aggression would be more prevalent in their conversations. Based on recent research, a wider range of feelings would have been explored.

One of the limitations of this study is that the sample came from a low socioeconomic background and there exists no comparison group from a more favored socioeconomic class. The question whether, if the sample had been from a more educated segment of society, would our participants have obtained higher

scores more comparable to those obtained by Donaldson and Westerman (1986) (see Tables 30 and 31 on Appendix D, pages lvii and lviii) remains unanswered. A practical aspect presented itself first: due to socioeconomic class practices regarding mental health issues, there are no Day Treatment Centers for this population in Colombia. Moderately to severely disturbed children of the middle classes are served by private practitioners and attend regular (but "less academically demanding") private schools. In order to follow the same design that had been initially proposed (in the research project of 1992) we had to go to the existing Day Treatment Centers, which serve the public school system in Colombia, thus taking a different socioeconomic class of subjects than initially proposed. A comparison between children from middle and low socioeconomic classes within the same country is needed. This would ideally include children with and without clinical problems in both socioeconomic backgrounds. Such comparisons would help to illustrate more clearly whether the present data are the result of the influence of socioeconomic characteristics, cultural variations in emotional understanding, or consequences of the clinical problems experienced by children.

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APPENDIX A

SPANISH AND ENGLISH VERSIONS OF THE CHILDREN'S INTERVIEW

Spanish Version of the Children's Interview

INTRODUCCIÓN

Voy a poner dos historias muy cortas acerca de un niño de tu edad. Cada historia tiene dos partes. Después de cada parte voy a para la grabadora y te voy a pedir que me cuentes, en tus palabras, lo que pasó. Luego te voy a hacer algunas preguntas acerca de cómo crees tú que se siente el niño de la historia. No hay respuestas buenas ni malas así que no tienes que preocuparte de cometer errores. Sólo quiero saber lo que tú piensas acerca del niño de la historia. No tienes que responder si no quieres. Nadie más que tú y yo vamos a saber lo que respondiste tú o cualquiera de los otros niños.

Es importante que entiendas cada historia así que si te pregunto algo y no te acuerdas de la historia, dime y te la repito. Entiendes lo que vamos a hacer? Bueno vamos a comenzar. Yo voy a escribir todo lo que tu me digas para que no se me olvide.

HISTORIA DEL PERRO: Amor y Enojo

Parte I:

Miguel tiene un perro llamado Pepe. A él le gusta jugar con Pepe que lo sigue a todas partes. Una mañana Miguel salió a buscar una pelota que había perdido. Pepe lo siguió como siempre. Pronto Pepe vino a donde estaba Miguel moviendo la cola. Pepe había encontrado la pelota. La trajo y la puso a los pies de Miguel.

Pidale al sujeto que le repita la parte de la historia que acaba de oir.
Dime que dice la parte de la historia que acabas de oir.
Si el niño tiene dificultades para hacerlo, hagale las siguientes preguntas de comprensión:
Quién es Pepe?
Qué perdió Miguel?
Qué hizo Pepe?
No comience la entrevista hasta estar seguro de que el sujeto entiende claramente la parte I de la historia. Ayude al niño a aclarar cualquier confusión que tenga. Si es necesario leale la historia otra vez.

Parte I: Preguntas
1.   Cómo se siente Miguel? Por qué se siente _____?

2.   Qué siente Miguel por Pepe? (Cómo se siente Miguel con Pepe?)

(Si no se menciona espontáneamente el afecto:
Miguel siente cariño por Pepe?

Parte II

En la tarde de ese mismo día, Miguel decidió lanzar al aire su avión de armar favorito. Había pasado tres días construyendo ese avión y le gustaba mucho. Invitó a sus padres a ver el primer vuelo que iba a hacer el avión. Miguel tiró el avión al aire, éste planeó sobre el jardín y aterrizó en el prado. Justo entonces Pepe salió corriendo detrás del avión y lo destrozó a mordiscos.

Pidale al sujeto que repita la segunda parte de la historia con sus palabras.
Dime que pasó en la segunda parte de la historia.
Si el niño tiene dificultades para hacerlo, hagale las siguientes preguntas de comprensión:
Qué pasó en la tarde de ese mismo día?
Qué hizo Miguel?
Qué pasó con el avión que había construído Miguel?
Quién destrozó el avión?
No continue hasta que el sujeto entienda claramente la parte II.

Parte II: Preguntas

1.   Qué siente Miguel por Pepe ahora? (Cómo se siente Miguel hacia Pepe?)
Por qué siente _____ ?

2.   *(Si el niño sólo dice que Miguel se siente triste sin mencionar el enojo, explore:)*
     Algunos niños me han dicho que Miguel estaba furioso con Pepe por destrozarle su avión. Cómo sería eso? Crees tú que Miguel está más bravo que triste?

3.   Podría Miguel sentir algo más además de (rabia, enojo?)_____ ?

Escenario A: *Si el niño menciona espontáneamente que Miguel todavía quiere a Pepe a pesar de estar furioso con él, o hace algún intento por coordinar el enojo/ira con algún sentimiento positivo, pregunte:*
4a.   Entonces Miguel todavía quiere a Pepe a pesar de estar bravo con él? Puedes decirme más acerca de eso?

5a.   Por qué quiere todavía Miguel a Pepe, a pesar de que le destrozó su avión?

6a.   Cuando Miguel ve su avión destrozado, él recuerda de que quiere a Pepe?

(Si no, si no recuerda que quiere a Pepe, pregunte:)
     Si cuando ve el avión dañado Miguel no recuerda de que quiere a Pepe, cómo sabe que todavía quiere a Pepe?

7a. *(Siel niño menciona un cariño que existe "por allá adentro", pregunte:)*
     Cómo sabe Miguel acerca de ese amor que existe por allá adentro?

(Si el niño no habla del cariño:)
8a.   Bueno, tu dijiste que Miguel todavía quiere a Pepe a pesar de estar furioso con él. Miguel siente amor y odio (cariño y rabia) al mismo tiempo o primero uno y luego el otro?

(Si el niño responde si a ambas preguntas, explore:)
     Cómo sería? Amor y odio al mismo tiempo, o primero uno y luego el otro?

9a.   *(Si el niño dice que uno despues de otro:)* Cuándo Miguel está bravo, los sentimientos de cariño (el amor) se van?

10a.   *(Si el niño dice que ambos al mismo tiempo):* Los sentimientos de ira (enojo) se mezclan con los de cariño, o se quedan separados?
(Si el niño dice que se mezclan:)
11a.   Puedes explicarme un poco más cómo es eso de sentir amor y odio (cariño y enojo) mezclados?

12a.   Es confuso?

(Si sí es confuso:)
     Miguel va a seguir confundido?

(Si el niño habla de una mezcla de amor y rabia. pregunte:)
13a.   Qué le va a pasar a los sentimientos mezclados (asociados) de Miguel? Van a irse, a desaparecer?

(Si el niño menciona el cariño que todavía existe "allá abajo", pregunte:)
14a.   Puedes explicarme más de ese cariño que no desaparece cuando Miguel está bravo? Es diferente de otros sentimientos de cariño, de amor? Cómo es diferente?

(VAYA A LA PREGUNTA 15)

<u>Escenario B</u>: *Si el niño menciona sólo enojo/ira u otro sentimiento negativo (p.e.: tristeza, no querer a Pepe), pregunte:*
4b.   Qué sentía Miguel por Pepe por la mañana, cuando encontró su pelota?

Y ahora qué siente?

5b.   Qué le pasó al cariño? Se fue? Desapareció completamente?

6b.   Alguna vez va a volver?

(Si el niño dice que el cariño nunca va a volver, pregunte:)
        Nunca, Miguel no va a volver a querer a Pepe?

7b. *(Si el sujeto dice que sí, que el cariño va a volver:)*
        Qué va a hacer que el cariño vuelva?

8b. *(Si el niño dice que Pepe debe reparar el daño, pregunte:)*
        Si Pepe no repara el daño, Miguel va a dejar de quererlo?

(Si el niño dice que Miguel va a volver a querer a Miguel a pesar de que no repare el daño, pregunte:)
        Qué va a hacer volver los sentimientos de cariño/afecto de Miguel?
9b.   Tu crees que Miguel va a sentir cariño y rabia por Pepe? Cómo funciona eso?

10b.   Miguel siente cariño y rabia al mismo tiempo o uno primero y luego el otro?
(Si el niño responde que si a ambas preguntas, investigue:)

Cuál de las dos, cariño y rabia al mismo tiempo, o primero uno y luego el otro?

11b. *(Si responde que uno después de otro:)* Cuando Miguel está bravo, el cariño que siente por Pepe desaparece?

12b. *(Si responde que al mismo tiempo:)* Los sentimientos de ira (enojo) se mezclan con los de cariño, o se quedan separados?

(Si el niño dice que se mezclan, pregunte:)
13b.   Me puedes explicar más cómo es eso se sentir amor y rabia al mismo tiempo, o mezclados?

14b.   Es confuso? Qué le va a pasar a los sentimientos mezclados de Miguel?

(PARA LOS ESCENARIOS A Y B)

15.   Crees tú que a Miguel se le va a pasar la rabia?

(Si no) Si a Miguel no se le pasa la rabia, va a dejar de querer a Pepe?

(Si si) Qué le va a pasar a los sentimientos de rabia?
        OR
        Tu dijiste que a Miguel se le va a pasar la rabia, Qué le va a pasar a esa rabia?

16.   Qué hace que los sentimientos de rabia se vayan, desaparezcan?

17.   Hay algo que los niños puedan hacer para dejar de estar bravos?

18.   Una vez la rabia ha desaparecido, vuelve de nuevo? Qué hace que vuelva?

19.   Tu dijiste que Miguel va a dejar de estar bravo o de sentir rabia; y el cariño que siente por Pepe, también se le va a pasar?

HISTORIA DEL GATO: Alegría y tristeza

Cuando Billy tenía _____ años, le regalaron un gato para su cumpleaños. Desde hacía mucho tiempo él quería un gato y estaba muy contento cuando finalmente se lo regalaron. Le puso por nombre Bola de Nieve. Billy le decía a sus amigos que Bola de Nieve era el mejor gato del mundo. Una mañana Billy estaba muy apurado. Dejó a Bola de Nieve en su cuarto y se olvidó de cerrar la ventana. A la mamá de Billy tambien se le olvidó cerrarla. Esa tarde Bola de Nieve saltó por la ventana y se escapó. Billy buscó a Bola de Nieve día tras día, semana tras semana.

Pidale al sujeto que le repita la parte de la historia que acaba de oir.
> Dime que dice la parte de la historia que acabas de oir.
Si el niño tiene dificultades para hacerlo, hagale las siguientes preguntas de comprensión:
> Quién es Bola de Nieve?
> Billy quiere a Bola de Nieve?
> Qué le pasó a Bola de Nieve?
> Cómo se escapó?
> Quién olvidó cerrar la ventana?
> Qué hizo Billy después de que Bola de Nieve se escapó?
No comience la entrevista hasta estar seguro de que el sujeto entiende claramente la parte I de la historia. Ayude al niño a aclarar cualquier confusión que tenga. Si es necesario léale la historia otra vez.

Parte I: Preguntas
1.   Cómo se siente Billy? Por qué se siente (triste) _____ ?

2.   Crees tu que Billy va a dejar de estar triste?
(Si si:) Qué le va a pasar a los sentimientos de tristeza? Billy se va a olvidar de Bola de Nieve?

(Si no:) Siempre va a estar triste?

(Si el niño dice que Billy va a dejar de estar triste cuando encuentre a Bola de Nieve, pregunte:) Si Billy no encuentra a su gato va a dejar de estar triste algún día?

3. *(Si el niño dice que los sentimientos de tristeza van a desaparecer, pregunte:)* Que hace que los sentimientos de tristeza desaparezcan?

4.   Y los sentimientos de tristeza van a volver?
      Qué los va a hacer volver?

5.   Puede Billy sentir algo más además de tristeza? Qué?

(Si el niño no menciona espontáneamente la rabia, investigue:)
> Algunos niños me han dicho que además de estar triste Billy también se puso bravo. Te parece que pueda ser así?

6.   Por qué estaría bravo Billy?

7.   Con quien estaría bravo Billy?

8.   Entonces Billy está bravo con _____ porque _____ . Podría estar bravo con alguien más? Quien? Por qué?

9.   Con quién está más bravo Billy? (mamá, sí mismo, gatito).

10.   Billy está bravo y triste? Cómo funciona eso?

11. *(Si no se especifica tiempo, investigue:)* Billy se siente bravo y triste al mismo tiempo o primero lo uno y luego lo otro?

(Si el niño responde afirmativamente a ambas preguntas, investigue:) Cual de las dos sería: uno después del otro o ambos al mismo tiempo?

12.   *(Si responde que primero uno y luego lo otro:)* Cuándo Billy está bravo, los sentimientos de tristeza desaparecen?

13.   *(Si responde que al mismo tiempo:)*Los sentimientos de tristeza se mezclan con los de estar bravo o se quedan separados?

Parte II
        Billy buscó a Bola de Nieve por mucho tiempo pero no lo encontró. Finalmente perdió las esperanzas y dejó de buscarlo. Habló con sus papás y les dijo que quería otro gato, pero también les dijo que otro gato no sería igual que Bola de Nieve. El cumpleaños de Billy va a ser pronto. Sus papás decidieron darle otro gato como regalo de cumpleaños. En este momento Billy abre la puerta y ve su nuevo gato.

Pídale al sujeto que le repita la segunda parte de la historia en sus propias palabras.
        Dime que pasó en esta parte de la historia.
Si el niño tiene dificultades para hacerlo, hágale las siguientes preguntas de comprensión:
        Qué le pasó a Bola de Nieve?
        Se perdió para siempre?
        Qué le dijo Billy a sus padres?
        Qué decidieron hacer sus padres?
        Qué recibió Billy como regalo de cumpleaños este año?
No prosiga hasta que el sujeto no entienda claramente la parte II.

Parte II: Preguntas
1.   Cómo se siente Billy con su nuevo gato? Por qué se siente así?

2. Puede Billy sentir algo más, además de estar (feliz)?

Escenario A: *(Si el niño coordina espontáneamente los sentimientos de tristeza y alegría, o da sentimientos positivos y negativos en respuesta a las preguntas 1 y 2, investigue:)*
3a. Billy está contento y triste al mismo tiempo. Cómo es eso?

4a. Billy se siente feliz y triste al mismo tiempo o primero lo uno y después lo otro?

(Si el niño dice que si a ambas posibilidades, investigue:)
Cuál de las dos: feliz y triste al mismo tiempo, o uno primero y luego lo otro?

5a. Cuando Billy está feliz, la tristeza desaparece? *(vaya a la pregunta 12)*

6a. La tristeza de haber perdido a Bola de Nieve se mezcla con la alegría por el nuevo gato, o se quedan separadas?

7a. *Si el niño dice que la alegría y la tristeza se mezclan y/o se sienten al mismo tiempo, pregunte:* Me puedes explicar un poco como es eso de sentir alegría y tristeza al mismo tiempo (o mezcladas)?

8a. Es eso confuso?

9a. Qué le va a pasar a los sentimientos mezclados de Billy? Van a desaparecer?

(VAYA A LA PREGUNTA 10)

Escenario B: *Si el niño sólo menciona sentimientos de alegría e ignora los de tristeza en la parte I, pregunte:*
3b. Cuando Billy vea su nuevo gato, va a pensar en Bola de Nieve?

4b. Si Billy piensa en Bola de Nieve, va a seguir sintiéndose contento?

(Si no:) Qué va a pasar cuando piense en Bola de Nieve?

5b. (Si el niño todavía niega la posibilidad de los sentimientos de tristeza, investigue más:)
Crees tu que además de estar contento por el nuevo gato, Billy también pudiera estar un poco triste?

Por qué estaría triste Billy?

Por qué estaría contento?

6b.   *(Si después de la pregunta el niño coordina la alegría y la tristeza:)*
        Tu dices que Billy está feliz por su nuevo gato pero que también está triste por haber perdido a Bola de Nieve; cómo es eso?

7b.   Billy se siente feliz y triste al mismo tiempo o primero lo uno y después lo otro?

(Si el niño dice que si a ambas posibilidades, investigue:)
        Cuál de las dos: feliz y triste al mismo tiempo, o uno primero y luego lo otro?

8b *(Si el niño dice que uno primero y otro después:)*. Cuando Billy está feliz, la tristeza desaparece? *(vaya a la pregunta 12)*

9a.*(Si el niño dice que ambos al mismo tiempo:)* La tristeza de haber perdido a Bola de Nieve se mezcla con la alegría por el nuevo gato, o se quedan separadas?

Si el niño dice que la alegría y la tristeza se mezclan y/o se sienten al mismo tiempo, pregunte: Me puedes explicar un poco como es eso de sentir alegría y tristeza al mismo tiempo (o mezcladas)?

Es eso confuso?

Qué le va a pasar a los sentimientos mezclados de Billy? Van a desaparecer?

(PARA LOS ESCENARIOS A Y B)

10. *(Si el niño puede coordinar los sentimientos de alegría y de tristeza:)*
        La tristeza en los sentimientos mezclados de Billy va a desaparecer eventualmente?

11.   Tu dices que la parte de tristeza de los sentimientos mezclados de Billy va a desaparecer, la alegría también se le va a pasar?

12.   *(Si el niño dice que la tristeza desaparece:)*
        Qué hace que los sentimientos de tristeza desaparezcan?

Hay algo que los niños puedan hacer para que los sentimientos de tristeza desaparezcan?

13. Los sentimientos de tristeza van a volver?

Qué los haría volver?

TERMINACIÓN

Hiciste un muy buen trabajo ayudándome a entender cómo se sienten Miguel y Billy. A mí me interesa saber acerca de qué sienten los niños y cómo se sienten. Lo que me dijiste me ha ayudado mucho y van a ayudar a otras personas a entender mejor a los niños como tú y como Miguel y Billy. Gracias y si tienes alguna pregunta, puedes hacerla ahora.

English Version of the Children's Interview

INTRODUCTION TO THE PROCEDURE

I am going to play, two short tape recorded stories about a boy (girl) your age. Each story has two parts. I will stop the tape recorder after each part and ask you to tell me that part of the story in your own words. Then I will ask you some questions about how you think the boy (girl) in the story is feeling. There aren't any right or wrong answers to the questions so you shouldn't worry about making a mistake. I just want to know what you think about the boy (girl) in the story. You don't have to answer a question if you don't want to. Nobody else will know what answer you or any of the other students (children) give. What you say will be between just you and me. It is important that you understand each story. If I ask you a question and you don't remember something in the story, please tell me, and I'll be happy to tell you the story or that part of the story again.

Do you understand what we are going to do?

Good, I'm going to tape record what we say so that it will be easier to remember later, ok?

PUPPY STORY   Anger- Love

Part I

     Mike has a dog named Pepper. He likes to play with Pepper who follows him everywhere. One morning Mike went outside to look for a baseball that he had lost. Pepper followed him outside as usual. Soon Pepper came over to Mike wagging his tail. Pepper had found the ball. He brought it over and dropped it at Mike's feet.

Ask the subject to repeat this part of the story in his own words

    Would you tell me the part of the story you just heard?

If the child has difficulty doing this, ask him the following comprehension questions

    Who is Pepper?

    What did Mike lose?

    What did Pepper do?

Do not begin the interview until the subject clearly understands Part I of the story. Help the child sort out whatever confuses him. If necessary, read the story to him again.

Part I Questions

1.   How does Mike feel? Why does Mike feel _____?

2.   How does Mike feel towards Pepper?

3. *(If love not mentioned spontaneously)*

    Does Mike feel loving toward Pepper?

Part II

    Later on that afternoon, Mike decided to launch his favorite model airplane. He had spent three days building this plane and liked it very much. He invited his parents to see the plane's first flight. Mike sent the plane up in the air, it soared over the yard and began to land in the grass. Just then, Pepper rushed in after the plane and chewed it up.

Ask the subject to repeat the second part of the story in his own words

    Would you tell me what happened in this part of the story?

If the child has difficulty doing this, ask him the following comprehension questions

    What happened later on the afternoon?

    What did Mike make?

    What happened to the plane that Mike did?

    Who chewed up the plane?

Do not proceed until the subject clearly understands Part II.

Part II: Questions

1. How does Mike feel about Pepper now? Why does he feel _____?

2. Could Mike feel anything else along with being (mad) _____?

3. *[If child says that Mike feels sad without mentioning angry feelings, probe.]*
   Some kids have told me that Mike was really mad at Pepper for wrecking his   plane. How could that be? Do you think Mike would be more mad than sad?

Scenario A. *If the child spontaneously mentions that Mike still loves Pepper though he is mad at him or makes any attempt to coordinate anger with a positive feeling, inquire.*

4a   So Mike still loves Pepper but he's mad at him? Can you tell me more about that?

5a   Why should Mike still love Pepper after he wrecked his plane?

6a   Does Mike remember his loving feelings at the moment he sees his plane wrecked?
[If no, the love is not remembered, inquire.]
   If Mike doesn't remember his loving feelings when he sees the damage, how would
   he know that he still loves him?

7a   *[If the child mentions a love that exist "deep down inside" inquire.]*
   Does Mike know about this love that exist deep down inside?

8a   Ok, you have said that Mike still loved Pepper even though he was angry at him.   Would Mike feel both love and anger at the same time or does he first feel one and   then   the other?
[If the child answers yes to both time questions, probe.]
   Which would it be? Both anger and love at the same time or first one and the the other?

9a.   Do angry feelings mix together with loving feelings or do they stay seperate?

10a   Can you tell me a little bit more about what it's like to feel both anger and love   mixed up together?

11a   Is it confusing?

12a   What's going to happen to Mike's mixed feelings? Will they go away?
   *[If confusing]*Will Mike stay confused?

13a   When Mike is angry, do the loving feelings go away?
   (If the child talks about a mixture of anger and love, inquire.)

14a   *[If the child mentions a love that exists deep down inside even when angry, probe.]* Can you tell me more about this love that doesn't go away when Mike is mad? Is it different from other loving feelings? How?

Part II Questions

1. How does Mike feel about Pepper now? Why does he feel _____?

2. Could Mike feel anything else along with being (med) _____?

3. *(If child says that Mike feels sad without mentioning angry feelings, probe.)*
    Some kids have told me that Mike was really mad at Pepper for wrecking his plane.
    How could that be? Do you think Mike would be more mad than sad?

<u>Scenario B</u> *(If the child mentions only anger or other negative feelings (i.e., sadness, not liking Pepper), inquire.)*

4b How did Mike feel toward Pepper in the morning when he found the ball?
    And now he feels?

5b What happened to the loving feelings?
    Did they go away? Are they all gone?

6b Will they ever come back?
    (If the subject states that the love will never come back, inquire.)
    Never, Mike will never love Pepper again?

7b *(If the subject says yes the love comes back, inquire.)*
    What will make the loving feelings come back?

8b *(If the child says that Pepper has to repair the damage, inquire.)*
    If Pepper does not repair the plane, will Mike stop loving him?
    (If child states that Mike will love Pepper again even if he doesn't repair the damage, inquire.)
    What might bring back Mike's loving feelings toward Pepper?

9b Do you think that Mike could feel both love and mad toward Pepper? How does that work?

10b Would Mike feel both love and anger at the same time or does he first feel one and the the other?
    (If the child answers yes to both questions, inquire.)
    Which one would it be? Both anger and love at the same time or first one and then the other?

11b Would Mike feel both love and anger at the same time or does he feel first one and then the other?

12b *(If the child says that they mix together, inquire.)*
    Can you tell me more about what it's like to feel both love and anger mixed up together?

13b Is it confusing? What's going to happen to Mike's mixed feelings?

14b When Mike is angry, do the loving feelings go away?

(FOR SCENARIOS A AND B)

15. You said that Mike will get over his angry feelings? What will happen to them?

    OR

    Do you think Mike will get over his angry feelings?

    (/ no/If Mike doesn't get over his angry feelings, will he stop loving Pepper?

    (/ yes/What will happen to the angry feelings?

16. What makes angry feelings go away?

17. Is there anything kids can do to make their angry feelings go away?

18. Once they've gone away, do angry feelings come back? What will make them come back?

19. You said that Mike will get over his angry feelings, will he get over his loving feelings too?

Kitten Story: Happy – Sad

Part I

    When Bill was _____ years old, he was given a kitten for his birthday. He had wanted a kitten for a long time so he was very happy when he finally got a kitten. He named the kitten Snowball. Bill told his friends that Snowball was the best kitten in the whole world. One morning he was in a big rush. Bill left Snowball in his bedroom and forgot to close the window. His mother also forgot to shut the window. That afternoon Snowball jumped out the window and ran away. Bill looked for Snowball day after day, week after week.

Ask the subject to repeat this part of the story in his own words

    Would you tell me the part of the story you just heard?

If the child has difficulty doing this, ask him the following comprehension questions

    Who is Snowball?

    Does B love Snowball?

    What happened to Snowball?

    How did she get away?

    Who forgot to shut the window?

    What did B do after SB ran away?

Do not begin the interview until the subject clearly understands Part 1 of the story. Help the child sort out whatever confuses him. If necessary, read the story again.

1.   How does B feel? Why does B feel (sad) _____?

2.   Could B feel anything else along with being sad? What?

(If child does not spontaneously mention anger, probe.)

    Some children have told me that along with being sad B also felt mad. Does that make any sense to you?

7.   Why would B feel angry?

8.   Could Bill feel both mad and sad? How does that work?

9.   *(If time specified, inquire.)* Would B feel mad and sad at the same time or first one and then the other?

    (If the child says yes to both questions; probe.) Which would it be? Both mad and sad at the same time or first one and then the other?

10.   Do mad feelings mix together with sad feelings or do they stay separate?

11.   When B is mad, do the sad feelings go away?

Part II

Bill looked for Snowball for a long time but he did not find her. Finally he gave up hope and stopped looking. He talked to his parents about wanting a new kitten. But he also said that a new kitten just wouldn't be the same as Snowball. Bill's birthday is coming up soon. His parents decided to give him a new kitten as a present. Right now Bill opens the door and sees his new kitten.

Ask the subject to repeat the second part of the story in his own words.

Would you tell me what happened in this part of the story?

If the child has difficulty doing this, ask him the following comprehension questions.

What happened to Snowball?

Was she lost for good?

What did B say to his parents?

What did his parents decide to do?

What did B get for his birthday this year?

Do not proceed until the subject clearly understands Part II.

Part II Questions

1. How do you think B feels about the new kitten? Why does he feel _____?

2. Could Bill feel anything else along with being (happy)?

Scenario A. If the child spontaneously coordinates happy and sad feelings, or gives positive and negative feelings in response to questions 1 & 2, inquire.

3a. So Bill is feeling both happy and sad. How could that be?

4a. Does B feel both happy and sad at the same time or does he first feel one and then the other?

If the child says yes to both possibilities, probe.

Which one will it be? Both happy and sad at the same time or first one and then the other?

5a. Do the sad feelings over losing Snowball mix together with the happy ones or do they stay separate?

6a. When B is happy, do the sad feelings go away?

7a. *If the child states that happy and sad feelings are mixed together and/or at the same time, inquire.*

Can you tell me a little bit more about what it is like to feel both happy and sad mixed up together at the same time?

8a. Is it confusing?

9a. What's going to happen to B's mixed feelings? Will they go away?

Part II: Questions

1. How do you think B feels about the new kitten? Why does he feel _____?

2. Could B/H feel anything else along with being (happy)?

Scenario B *(If the child mentions only happy feelings and ignores the sad feelings from Part I, inquire:)*

3a. Will B think about Snowball when he sees the new kitten?

4b. If B thinks about SB, will he stay happy?
(If no) What will happen when he thinks about SB?

5b. *(If the child still denies the possibility of sad feelings, probe further:)*
Do you think that along with feeling happy about the new kitten, B would also feel a little sad?
What would B feel sad about?
What would B feel happy about?

6b. *(If child coordinates happy and sad after probe, inquire:)*
You said that B feels happy about his new kitten but that he was sad about losing SB (missed SB). How could that be?

7b. Would B feel both happy and sad at the same time or first one and then the other?
(If the child says yes to both time possibilities, probe:)
Which would it be? Both happy and sad at the same time or first one then the other?

8b. Do the sad feelings over losing SB mix together with the happy ones or do they stay separate?

9b. When B is happy, do the sad feelings go away?

(FOR SCENARIOS A AND B)

10. Will B eventually get over the sad part of his mixed feelings?
(If no) If she doesn't get over the sad feelings, how will B feel about the new kitten?

11. *(If the child states that the sad feelings go away, inquire:)*
What makes sad feelings go away?
Is there anything kids can do to make their sad feelings go away?

12. Will the sad feelings come back?
What will make them come back?

13. You said that B would get over the sad part of his mixed feelings, will she get over her happy feelings?

(GO TO QUESTION 10, p 3~

Part II: Questions

1. How do you think B feels about the new kitten? Why does he feel _____?

2. Could B/it feel anything else along with being (happy)?

Scenario B: If the child mentions only happy feelings and ignores the sad feelings from Part 1, inquire.

3b. Will B think about Snowball when he sees the new kitten?

4b. If B thinks about SB, will he stay happy?

(If no)What will happen when he thinks about SB?

5b. *(If the child denies the possibility of sad feelings, probe further.)*

Do you think that along with feeling happy about the new kitten, B would also feel a little sad?

What would B feel sad about?

What would B feel happy about?

6b. *(If child coordinates happy and sad after probe, inquire.)*

You said that B feels happy about his new kitten but that he was sad about losing SB (misses SB). How could that be?

7b. Would B feel both happy and sad at the same time or first one and then the other?

(If the child says yes to both time possibilities, probe.)

Which would it be? Both happy and sad at the same time or first one then the other?

8b. Do the sad feelings over losing SB mix together with the happy ones or do they stay seperate?

9b. When B is happy, do the sad feelings go away?

(FOR SCENARIOS A AND B)

11. Will B eventually get over the sad part of his mixed feelings?

(If no)If she doesn't get over the sad feelings, how will B feel about the new kitten?

11. *(If the child states that the sad feelings go away, inquire.)*

What makes sad feelings go away?

Is there anything kids can do to make their sad feelings go away?

12. Will the sad feelings come back?

What will make them come back?

13. You said that B would get over the sad part of his mixed feelings, will she get over her happy feelings?

APPENDIX B

SPANISH AND ENGLISH VERSIONS OF THE PACES

Spanish Version of the PACES

CUESTIONARIO DE ACTITUDES DE LOS PADRES

Instrucciones: En las siguientes preguntas por favor señale con un círculo la frase que describa lo que <u>más</u> se parece a lo que <u>usted</u> haría en la situación que se plantea. Por favor marque sólo *una* de las alternativas.

1. Si mi hijo (de entre 7 y 12 años) está alardeando (jactándose/faroleando) frente a otro niño de su habilidad para hacer algo y luego la embarra y se hace daño, y viene después a que yo lo consuele, yo:
      a. le diría que se ve muy tonto por estar tan trastornado después de haber alardeado tanto.
      b. lo atendería un poco pero me sentiría un poco fastidiada.
      c. lo consolaría por su herida e ignoraría el que hubiera estado alardeando.
      d. lo consolaría pero también lo reprendería un poquito por alardear.

2. Si mi hijo (de entre 7 y 12 años) recibe de parte de un familiar, o de un amigo de la familia, un regalo de cumpleaños que no le gusta y después de abrir el regalo se ve decepcionado o desilusionado -hasta molesto-, en presencia de la persona que le dio el regalo, yo:
      a. me molestaría con mi hijo por ser grosero.
      b. miraría para otro lado.
      c. le recordaría a mi hijo que de las gracias.
      d. le diría que realmente estuvo de malas por no haber tenido lo que él quería.

3. Si mi hijo es muy tímido con los adultos que vienen a mi casa de visita y se queda en su cuarto mientras ellos vienen, yo:
      a. lo dejaría que hiciera lo que él quiere.
      b. le reprocharía el que se comporte como un ratón.
      c. le diría a mi hijo que debe quedarse en al sala y atender la visita.
      d. le recordaría a mi hijo que debe ser bien educado.

4. Si durante un viaje en bus mi hijo mira continuamente a alguien que tiene una cicatriz en toda la cara, yo:
      a. lo codearía y le diría que se ocupara de sus cosas.
      b. lo dejaría que mirara.
      c. le diría a mi hijo que es de mala educación mirar así.
      d. le preguntaría que qué está haciendo.

5. Si mi hijo comienza a reírse sin motivo en un entierro, yo:
      a. lo ignoraría.
      b. le sonreiría comprensivamente.
      c. le fruncíría el ceño.
      d. le fruncíría el ceño y le diría que se callara.

6. Si mi hijo le tiene miedo a las inyecciones y se pone a temblar mientras espera su turno para una vacuna, yo:
      a. lo consolaría antes y después de la vacuna.

b. le diría que no me avergüence poniéndose a llorar mientras le ponen la vacuna.

c. le diría que se controle mejor.

d. le diría que hace sentir más dolor el miedo que la misma vacuna.

7. Si mi hijo me grita furioso después de que accidentalmente tiré a la basura su cuento favorito, yo:

a. le pediría excusas.

b. le echaría un discurso acerca del irrespeto que me muestra y lo mandaría a su cuarto.

c. le pediría excusas y le diría que deje de gritarme.

d. le diría que se fuera a su cuarto hasta que se le pase el mal genio y me disculparía más tarde.

8. Si mi hijo pierde algo suyo que el aprecia mucho (y que no vale gran cosa) y reacciona llorando, yo:

a. le diría que no se moleste tanto por eso.

b. le diría lo infeliz que yo también me siento por la pérdida.

c. le recordaría que fuera más cuidadoso la próxima vez.

d. le diría que no se lamente tanto puesto que la culpa en primer lugar es suya por ser tan descuidado.

9. Si mi hijo va a aparecer en un programa de televisión y pregunta, visiblemente nervioso, cuantas personas van a mirar el programa, yo:

a. le diría que se controlara y tratara de no mostrarse nervioso.

b. lo tranquilizaría y lo consolaría.

c. le sugeriría que pensara en algo que lo relajara para que su nerviosismo no fuera tan evidente.

d. le diría a mi hijo que se controlara si quiere desempeñarse bien en el programa.

10. Si mi hijo va a una comida familiar de cumpleaños en un restaurante elegante, y espontáneamente salta de su silla y grita "Feliz Cumpleaños", yo:

a. sonreiría pero también le diría que no fuera tan bullicioso.

b. no diría nada.

c. sonreiría comprendiendo que mi hijo esté tan contento.

d. le diría que aunque uno se sienta feliz y emocionado, la manera apropiada de comportarse en un restaurante es quedarse sentado y hablar en voz baja.

11. Si mi hijo se pone muy bravo con uno de sus hermanos y comienza a gritar y a zapatear, y yo estoy por ahí, yo:

a. le diría a mi hijo que hablara cortésmente y que pidiera   disculpas.

b. no intervendría.

c. trataría de averiguar porque es la discusión.

d. le diría a mi hijo que se calmara.

12. Si mi hijo tiene temores sin fundamento (por ejemplo a la oscuridad o a los perros) y entra en pánico en la situación temida, yo:

a. lo cogería y le aseguraría que estoy allí para ayudarlo.

b. le daría la confianza de que estoy allí para ayudarlo pero le diría también que ya es hora de que se de cuenta de que no hay razón para asustarse.

c. le diría que se está comportando como un tonto y que algún día se va a avergonzar de tener tanto miedo.

d. le diría que se controlara mejor para tener menos miedo.

13. Si a mi hijo viniendo de la escuela lo molesta y le pone apodos otro niño, y llega a la casa temblando y con los ojos llenos de lagrimas, yo:

a. diría: "Si no quieres ser un afeminado/ gallina, o lo que   sea,   deberías defenderte mejor".

b. me preocuparía y lo consolaría.

c. le diría a mi hijo que disimulara mostrándose tranquilo y no dejara que el otro niño se diera cuenta que estaba molesto o afectado por lo que le dice.

. d. tranquilizaría a mi hijo pero también le diría que mostrarse temeroso y afectado algunas veces causa más problemas con los otros.

14. Si mi hijo mientras vamos en un bus se queda mirando de manera muy obvia a una persona retardada que va en el bus, yo:

a. dejaría que mirara.

b. lo codearía para que se ocupara de sus cosas.

c. le preguntaría que qué está haciendo.

d. le diría a mi hijo que es de mala educación mirar así.

15. Si mi hijo gana una competencia de carreras y luego de recibir las felicitaciones de todo el mundo continua saltando alegremente y proclamando su victoria, yo:

a. no digo nada pero comienzo a sentirme incómoda.

b. sonrío aprobándolo y lo felicito otra vez.

c. frunzo el ceño ante esta demostración y le digo que los verdaderos ganadores no "cantan victoria" continuamente.

d. le sugiero que se está sobrepasando y que se calme.

16. Si mi hijo parece tener miedo durante un viaje en un aparato en un parque de diversiones, mientras que otros niños que van con él no parecen tener miedo, yo:

a. le diría que se comportara pues si no los otros niños se van a burlar de él.

b. lo consolaría y lo tranquilizaría.

c. lo dejaría que hiciera frente a su miedo sin intervenir.

d. le diría que intente controlarse mejor.

17. Si mi hijo está en una presentación (de baile, música, gimnasia etc.) y durante un número individual comete un error y parece que fuera a ponerse a llorar, después de la presentación yo:

a. le diría que la presentación estuvo bien pero que hubiera sido mejor que no se hubiera mostrado tan trastornado por su equivocación.

b. lo felicitaría por su presentación y no diría nada acerca de la equivocación.

c. lo felicitaría por su presentación y le diría que su preocupación por haberse equivocado le mostró al público que realmente quería hacerlo bien.

d. le diría que nadie se hubiera dado cuenta de que se había equivocado sino se hubiera comportado como un bebé cuando sucedió.

18. Si mi hijo llega de la escuela muy bravo por algo que hizo la profesora y comienza a tirar puertas, murmura amenazas horribles, frunce el ceño fieramente, yo:

      a. lo regañaría por estar tan descontrolado y por   comportarse   tan inadecuadamente en la casa.
      b. le preguntaría que qué pasó.
      c. le diría a mi hijo que su comportamiento es destructor.
      d. le diría a mi hijo que espero que no se comporte igual en la escuela.

19. Si mi hijo empieza a mirar con mucho interés a una mujer que le está dando seno a su bebé, yo:
      a. lo dejaría mirar.
      b. codearía a mi hijo y le diría que se ocupara de sus cosas.
      c. le preguntaría que qué está haciendo.
      d. le diría que mirar así es de mala educación.

20. Si mi hijo dice "buack" y hace caras cuando la Abuela le pone en el plato algo que ella cocinó, yo:
      a. le recordaría a mi hijo que fuera más educado.
      b. le diría a mi hijo que pida disculpas y se porte bien o que se vaya de la mesa.
      c. sonreiría nerviosamente y le preguntaría a mi hijo: "Bueno pero, qué crees que es"?.
      d. le fruncíría el ceño y le diría que pida disculpas por sus malos modales.

English Version of the PACES

PARENT ATTITUDE QUESTIONNAIRE

Instructions: In the following multiple choice questions please circle only one response which seems most similar to what you would be likely to do in the situation described.

1. If my school-age child is bragging about his/her skill in some activity to another child, proceeds to goof up and hurt him/herself, and then comes to me for aid, I would:

    a. tell them that they look foolish being so upset after bragging
    b. attend to them a little, but with some annoyance
    c. comfort them about the injury and ignore the bragging
    d. give comfort but also mildly chide them about the bragging

2. If my school-age child receives an undesirable birthday gift from a family friend or relative and looks obviously disappointed, even annoyed, after opening it in the presence of the person giving the gift, I would:

    a. be annoyed with my child for being rude
    b. look the other way
    c. remind my child to say thank-you
    d. say that it really was too bad they didn't get what they wanted

3. If my school-age child is very shy around adults who come to visit our home and prefers to stay in the bedroom during the visit, I would:

    a. let my child do as he/she pleases
    b. reproach my child about behaving like a mouse
    c. tell my child that he/she must stay in the living room and visit with the guest
    d. remind my child to be polite

4. If during a bus ride my school-age child continues to look intently at someone whose whole head is covered with scar tissue, I would:

    a. nudge my child and say to mind his/her own business
    b. permit the looking
    c. tell my child it is impolite to stare
    d. ask what he/she is doing

5. If my school-age child starts to giggle during a funeral, I would:

    a. ignore it
    b. smile understandingly at my child
    c. frown at my child
    d. frown and also tell my child to be quiet

6. If my school-age child is afraid of injections and becomes a bit shakey while waiting for his/her turn for a shot, I would:

    a. comfort them before and after the shot
    b. tell them not to embarrass me by crying while getting the shot
    c. tell them to try to get more under control
    d. tell them that the pain lies more in the fear than in the actual shot

7. If my school-age child shouts at me in anger after I accidentally throw away his/her favorite comic book, I would:

    a. apologize
    b. give them a piece of my mind about the disrespect shown to me and tell them to go to their room
    c. apologize but tell them to stop yelling at me
    d. send them to their room to cool off, then apologize later

8. If my school-age child carelessly loses some prized (but inexpensive) possession and reacts with tears, I would:

    a. tell them not to get so upset about it
    b. tell them how unhappy I am about the loss too
    c. remind them to be more careful next time
    d. say they should not feel so sorry for themselves since they were so careless as to lose it in the first place

9. If my school-age child is about to appear on a local television program and inquires with visible nervousness about how many people will be watching the show, I would:

    a. say to get control of themselves and try not to show their nervousness
    b. reassure and comfort my child
    c. suggest thinking about something relaxing so that their nervousness will not be so obvious
    c. tell my child to get a grip on him/herself if he/she wants a good performance

10. If my school-age child attends a family birthday dinner in a nice restaurant and exuberantly jumps out of his/her chair and shouts "Happy Birthday!" I would:

    a. smile but also tell my child to try not to be so rambunctious
    b. say nothing
    c. smile understandingly about my child feeling so happy
    d. say that proper restaurant behavior requires sitting down and speaking quietly, despite feeling happy and excited

11. If my school-age child becomes very angry at his/her sibling, begins to shout and stomp around the room, and I am nearby, I would:

    a. tell my child to speak civilly and apologize as well
    b. not intervene
    c. try to find out what the altercation was all about
    c. tell my child to cool down

12. If my school-age child has some unfounded fear (e.g., of the dark, of dogs, etc.) and gets panicy in the feared situation, I would:

    a. reach out with a touch and assure them I was there to help
    b. give assurance that I was there to help but that it was time for them to realize they had no real reason to be afraid
    c. tell them they are being silly and will embarrass themselves someday by being so afraid
    c. tell them to control themselves better so that they will feel less afraid

13. If my school-age child is teased and called names by another youngster on the way home from school and arrives home trembling and tearful, I would:

    a. say "if you don't want to be a sissy, scaredy-cat, or whatever, you should stick up more for yourself"
    b. feel concerned myself and also comfort and reassure my child
    c. tell my child to keep a stiff upper lip and not let the other child see him/her so upset
    d. reassure my child but also say that showing one's fear to others sometimes causes problems

14. If my school-age child rather obviously watches a mentally retarded person as we ride the bus, I would:

    a. permit the staring
    b. nudge my child and say to mind his/her own business
    c. ask what he/she is doing
    d. tell my child that it is impolite to stare

15. If my school-age child wins a race in a track meet and after receiving every-one's congratulations continues to jump around gleefully and exclaim over the victory, I would:

    a. say nothing but would begin to feel uncomfortable
    b. smile approvingly and offer more congratulations
    c. frown at the display and say that real winners do not keep "crowing"
    d. suggest they were over-doing it and to calm down

16. If my school-age child appears to be quite afraid during an amusement park ride and other accompanying youngsters do not seem to be afraid, I would:

    a. tell my child to shape up or he/she will be teased by the other kids
    b. comfort and reassure my child
    c. let him/her cope with the fear without my intervening
    d. tell my child to try to get better control of him/herself

17. If my school-age child is in a recital (e.g., dance, music, gymnastics, etc.) and during a solo makes an error and proceeds to look as if on the verge of tears, afterwards I would:

    a. say that the performance was fine, but it would have been better if they had not looked so upset about the mistake
    b. compliment the performance and say nothing about the mistake
    c. compliment the performance and say that the concern on their face after the mistake showed the audience that they really wanted to do well
    d. say that no one would have paid attention to the mistake if they had not acted so babyish about it

18. If my school-age child comes home from school very angry about something the teacher has done and proceeds to slam doors, mutter dire threats, and scowl fiercely, I would:

    a. reprimand my child for being so out of control and behaving inappropriately in the house
    b. ask what had happened
    c. tell my child that his/her behavior is disruptive
    d. tell my child that I just hope he/she doesn't act this way at school

19. If my school-age child is staring with interest at a woman breast-feeding her baby, I would:

    a. permit the looking
    b. nudge my child and say to mind his/her own business
    c. ask my child what he/she is doing
    d. tell my child that staring is impolite

20. If my school-age child mutters "yecchh" and grimaces when Grandma serves some of her casserole on his/her plate, I would:

    a. remind my child to be more polite
    b. tell my child to apologize and shape up immediately or leave the table
    c. smile rather nervously and ask my child "well, what do you think it is?"
    d. frown at my child while asking him/her to apologize for the poor manners

APPENDIX C

SPANISH AND ENGLISH VERSIONS OF THE LEAS

Spanish Version of the LEAS

ESCALA DE NIVEL DE CONCIENCIA EMOCIONAL

Por favor describa lo que ud. sentiría en las siguientes situaciones. El único requisito es que en sus respuestas use la palabra "sentir". Puede hacer sus respuestas tan largas o tan cortas como sea necesario para expresar el cómo se sentiría. En cada situación se menciona otra persona. Por favor indique también cómo cree ud. que se sentiría la otra persona.

1. Una vecina le pide a ud. el favor de repararle un mueble. Mientras la vecina mira, ud. clava un clavo con un martillo, y en lugar de golpear el clavo se golpea un dedo. Cómo se sentiría ud.? Cómo se sentiría la vecina?

2. Ud. está atravesando un desierto con un guía. Se les acabó el agua hace muchos kilómetros. Según el mapa, el pozo de agua más cercano está a cuatro kilómetros de distancia de donde se encuentran. Cómo se sentiría ud.? Cómo se sentiría el guía?

3. Un ser querido le da un masaje en la espalda después de un día de mucho trabajo. Cómo se sentiría ud.? Cómo se sentiría el otro?

4. Ud. se ha entrenado para una competencia junto con una amiga. El día de la carrera, al llegar a la línea final, ud. se tuerce un tobillo, cae al piso, y no puede terminar. Cómo se sentiría ud.? Cómo se sentiría el amigo(a)?

5. Ud. está viajando por un país extranjero. Un conocido hace comentarios negativos acerca de su país. Cómo se sentiría ud.? Cómo se sentiría el conocido?

6. Ud. atraviesa un puente en un vehículo y ve una persona parada en el otro lado de la baranda, mirando hacia abajo. Cómo se sentiría ud.? Cómo se sentiría la persona?

7. La persona que ud. quiere ha estado ausente por varias semanas y finalmente vuelve a casa. Cuando él abre la puerta... Cómo se sentiría ud.? Cómo se sentiría él?

8. Su jefe le dice que su trabajo es inaceptable y que necesita mejorar. Cómo se sentiría ud.? Cómo se sentiría su jefe?

9. Ud. está haciendo fila en el banco. La persona antes de ud. se acerca a la ventanilla y comienza a hacer una transacción muy demorada. Cómo se sentiría ud.? Cómo se sentiría la persona delante de ud.?

10. Ud. y su esposo vuelven a casa después de una salida por la noche con unos amigos. Cuando llegan a la calle de su casa ven carros de bomberos parados cerca a su casa. Cómo se sentiría ud.? Cómo se sentiría su esposo?

11. Ud. ha estado trabajando en un proyecto por varios meses. Días después de haberlo presentado su jefe le dice que su trabajo fue excelente. Cómo se sentiría ud.? Cómo se sentiría su jefe?

12. Ud. recibe una llamada inesperada de larga distancia, de un médico informándole que su madre ha muerto. Cómo se sentiría ud.? Cómo se sentiría el médico?

13. Ud. le dice a una amiga que se está sintiendo sola que la llame cuando necesite hablar con alguien. Una noche ella la llama a las 4 a.m. Cómo se sentiría ud.? Cómo se sentiría su amiga?

14. Su odontólogo le dice que tiene varias caries y le da varias citas para volver a trabajarle. Cómo se sentiría ud.? Cómo se sentiría su odontólogo?

15. Alguien que lo ha criticado mucho últimamente le echa una flor. Cómo se sentiría ud.? Cómo se sentiría la otra persona?

16. Su médico le dice que tiene que evitar las comidas grasosas. Una nueva compañera de trabajo la llama para decirle que va a comer lechona, y la invita a que vaya con ella. Cómo se sentiría ud.? Cómo se sentiría su compañera?

17. Ud. y una amiga se ponen de acuerdo para invertir una plata en un negocio nuevo. Días más tarde ud. llama a su amiga y ella le dice que cambió de idea. Cómo se sentiría ud.? Cómo se sentiría su amiga?

18. Ud. vende algo suyo (por ejemplo, una joya), que aprecia mucho, para comprarle un regalo costoso a su esposo. Cuando le da el regalo él le pregunta si vendió la joya. Cómo se sentiría ud.? Cómo se sentiría su esposo?

19. Ud. se enamora de alguien atractivo e inteligente. Aunque esta persona no tiene mucha plata a ud. eso no le importa pues ud. tiene suficiente dinero. Cuando comienzan a hablar de matrimonio ud. se entera que él viene de una familia con mucha plata. El no quería que la gente lo supiera por temor de que se interesaran por él sólo por su dinero. Cómo se sentiría ud.? Cómo se sentiría él?

20. Ud. y su mejor amiga están en la misma línea de trabajo. Hay un premio que le dan anualmente al mejor trabajador del año. Las dos trabajan mucho para ganar el premio. Una noche anuncian al ganador: su amiga. Cómo se sentiría ud.? Cómo se sentiría su amiga?

English Version of the LEAS

LEVEL OF EMOTIONAL AWARENESS SCALE

Please describe what you would feel in the following situations. The only requirement is that you use the word "feel" in your answers. You may make your answers as brief or as long as necessary to express how would you feel. In each situation there is another person mentioned. Please indicate how you think that other person would feel as well.

1. A neighbor asks you to repair a piece of furniture. As the neighbor looks on, you begin hammering a nail but then miss the nail, and hit your finger. How would you feel? How would the neighbor feel?

2. You are walking through the dessert with a guide. You ran out of water hours ago. The nearest well is two miles away according to his map. How would you feel? How would the guide feel?

3. A loved one gives you a back rub after you return from a hard day's work. How would you feel? How would your partner feel?

4. You are running in a race with a friend whom you have trained with for some time. As you near the finish line, you twist your ankle, fall to the ground, and are unable to continue. How would you feel? How would your friend feel?

5. You are traveling in a foreign country. An acquaintance makes derogatory remarks about your native country. How would you feel? How would your acquaintance feel?

6. As you drive over a suspension bridge you see a man standing on the other side of the guardrail, looking at the water. How would you feel? How would the men feel?

7. Your sweetheart has been gone for several weeks but finally comes home. As she/he opens the door...How would you feel? How would she/he feel?

8. Your boss tells you that your work has been unacceptable and needs to be improved. How would you feel? How would your boss feel?

9. You are standing in line at the bank. The person in front of you steps up to the window and begins a very complicated transaction. How would you feel? How would the person in front of you feel?

10. You and your spouse are driving home from an evening out with friends. As you turn onto your block you see firetrucks parked near your home. How would you feel? How would your spouse feel?

11. You have been working hard on a project for several months. Several days after submitting it, your boss stops by to tell you that your work was excellent. How would you feel? How would your boss feel?

12. You receive an unexpected long-distance phone call from a doctor informing you that your mother has died. How would you feel? How would the doctor feel?

13. You tell a friend who is feeling lonely that she/he can call you whenever she/he needs to talk. One night she/he calls at 4:00 a.m. How would you feel? How would your friend feel?

14. Your dentist has told you that you have several cavities and schedules you for a return visit. How would you feel? How would the dentist feel?

15. Someone who has been critical of you in the past pays you a compliment. How would you feel? How would the other person feel?

16. Your doctor has told you to avoid fatty foods. A new colleague at work calls to say that he is going out for pizza and invites you to go along. How would you feel? How would your colleague feel?

17. You and your friend agree to invest money together to begin a new business venture. Several days later you call the friend back, only to learn that she/he has changed her/his mind. How would you feel? How would your friend feel?

18. You sell a favorite possession of your own in order to buy an expensive gift for your spouse. When you give him/her the gift, he/she asks whether you sold the possession. How would you feel? How would your spouse feel?

19. You fall in love with someone who is attractive and intelligent. Although this person is not well off financially, this doesn't matter to you – your income is adequate. When you begin to discuss marriage, you learn that she/he is actually from a extremely wealthy family. She/he did not want that known for fear that people would only be interested in him/her for his/her money. How would you feel? How would she/he feel?

20. You and your best friend are in the same line of work. There is a prize given annually to the best performance of the year. The two of you work hard to win the prize. One night the winner is announced, your friend. How would you feel? How would your friend feel?

APPENDIX D

COMPARISON TABLES

Table 26

Mean Scores, Standard Deviations and t-test Results for Each Dependant Variable for Both Time Groups Without Verbal IQ Extremes (n = 59)

Dependent Variable	First Time n = 32		Second Time n = 27				
	M	SD	M	SD	t	df	p
Amb HS	1.06	.87	1.18	.92	-.52	57	.60
Amb LA	.84	.76	.88	.80	- .22	57	.82
FCh HS	1.25	.71	1.29	.60	- .26	57	.79
FCh LA	1.15	.57	1.25	.59	- .67	57	.50
PACES	49.87	7.63	49.74	6.85	.07	57	.94
LEAS	52.09	4.95	53.22	5.53	- .82	57	.41
VIQ	88.81	10.39	94.85	9.78	-2.28	57	.02*

Note: Amb HS = Ambivalence Happy/Sad; LA = Ambivalence Love/Anger; FCh HS = Feeling Change Happy/Sad; FCh LA = Feeling Change Love/Anger; PACES = Parent Attitude toward Children's Expressiveness; LEAS = Levels of Emotional Awareness; VIQ = Verbal Intelligence.
*p <.05

Table 27

Mean Scores and Standard Deviations Obtained by Each Group on All

Dependent Variables on Sample Without VIQ Extremes (n = 59)

Variable		Control		Clinical	
		Younger n = 16	Older n = 15	Younger n = 14	Older n = 14
IQ					
	M	94.43	92.66	91.35	87.37
	SD	10.57	10.60	9.62	10.80
Amb HS					
	M	1.00	1.60	.64	1.21
	SD	1.03	.50	.84	.89
Amb LA					
	M	.81	1.00	.57	1.07
	SD	.54	.53	.93	.99
FCh HS					
	M	1.06	1.33	1.21	1.50
	SD	.44	.72	.42	.94
FCh LA					
	M	1.25	1.53	.85	1.14
	SD	.44	.51	.53	.66
PACES					
	M	47.87	50.93	50.07	50.57
	SD	8.53	5.88	5.01	8.91
LEAS					
	M	54.43	52.13	51.57	52.07
	SD	4.76	6.36	5.95	3.17

Note: Amb HS = Ambivalence Happy/Sad; LA = Ambivalence Love/Anger; FCh HS = Feeling Change Happy/Sad; FCh LA = Feeling Change Love/Anger; PACES = Parent Attitude toward Children's Expressiveness; LEAS = Levels of Emotional Awareness; VIQ = Verbal Intelligence.

Table 28

Sources of Variance for Status, Age and Interaction for All Dependent

Variables in Sample Without VIQ Extremes (N = 59, df = 1, Error = 55)

Variable	Source	F	p
IQ	Status	2.38	.12
	Age	1.12	.29
	Status X Age	.16	.68
Amb HS	Status	2.84	.09
	Age	7.08	.01**
	Status X Age	.00	.94
Amb LA	Status	.17	.67
	Age	2.91	.09
	Status X Age	.17	.67
FCh HS	Status	.85	.36
	Age	2.59	.11
	Status X Age	.00	.96
FCh LA	Status	7.67	.008**
	Age	4.05	.049*
	Status X Age	.00	.99
PACES	Status	.23	.63
	Age	.87	.35
	Status X Age	.45	.50
LEAS	Status	1.15	.28
	Age	.43	.51
	Status X Age	1.06	.30

Note: Amb HS = Ambivalence Happy/Sad; LA = Ambivalence Love/Anger; FCh HS = Feeling Change Happy/Sad; FCh LA = Feeling Change Love/Anger; PACES = Parent Attitude toward Children's Expressiveness; LEAS = Levels of Emotional Awareness; VIQ = Verbal Intelligence.
*p <.05
** p <.01

Table 29

Intercorrelations between Children's and Parents' Variables (n = 59)

		Amb HS	Amb LA	Fch HS	Fch LA	PACES	LEAS
VIQ							
	r	.17	-.00	.14	.10	- .09	.23*
	p	.09	-.49	.14	.22	.23	.03
Amb HS							
	r		.44***	.23*	.25*	.09	- .04
	p		.00	.03	.02	.23	.37
Amb LA							
	r			.27*	.10	.08	.15
	p			.01	.22	.25	.12
Fch HS							
	r				.16	-. 09	- .03
	p				.10	.23	.38
Fch LA							
	r					.20	-.00
	p					.06	.49
PACES							
	r						-.17
	p						.09

Note: Amb HS = Ambivalence Happy/Sad; LA = Ambivalence Love/Anger; FCh HS = Feeling Change Happy/Sad; FCh LA = Feeling Change Love/Anger; PACES = Parent Attitude toward Children's Expressiveness; LEAS = Levels of Emotional Awareness; VIQ = Verbal Intelligence.

* $p < .05$
** $p < .01$
*** $p < .001$

Table 30

A Comparison Between the Number of Subject Aged 7-8 at Each Level of Emotional Understanding in Donaldson's Study and the Number of Subjects at Each Level in the Present Study (Percentages are given in parentheses)

Variable	Level 0	Level 1	Level 2	Level 3
Amb HS				
Donaldson[a]	1 (5%)	5 (25%)	14 (70%)	0
Gómez[b] (M= .87; SD= .94)	*15 (47%)*	*7 (22%)*	*9 (28%)*	*1 (3%)*
Amb LA				
Donaldson[a]	2 (10%)	8 (40%)	8 (40%)	2 (10%)
Gómez[b] (M= .69; SD= .74)	*14 (44%)*	*15 (47%)*	*2 (6%)*	*1 (3%)*
FCh HS				
Donaldson[a]	0	5 (25%)	7 (35%)	8 (40%)
Gómez[b] (M= 1.12; SD= .42)	*1 (3%)*	*26 (81%)*	*5 (16%)*	*0*
FCh LA				
Donaldson[a]	0	6 (30%)	12 (58%)	2 (10%)
Gómez[b] (M= 1.06; SD= .50)	*3 (9%)*	*24 (75%)*	*5 (16%)*	*0*

Amb HS = Ambivalence Happy/Sad; Amb LA = Ambivalence Love/Anger; Fch HS = Feeling Change Happy/Sad; Fch LA = Feeling Change Love/Anger
[a] n = 20; [b] n = 32

Table 31

A Comparison Between the Number of Subjects Aged 10-11 at Each Level of Emotional Understanding in Donaldson's Study and the Number of Subjects at Each Level in the Present Study (Percentages are given in parentheses)

Variable	Level 0	Level 1	Level 2	Level 3
Amb HS				
Donaldson[a]	0	2 (10%)	3 (15%)	15 (75%)
Gómez[b] (M= 1.41; SD= .71)	4 (13%)	10 (32%)	17 (55%)	0
Amb LA				
Donaldson[a]	0	1 (5%)	7 (35%)	12 (60%)
Gómez[b] (M= 1.06; SD= .77)	8 (26%)	13 (42%)	10 (32%)	0
FCh HS				
Donaldson[a]	0	1 (5%)	2 (10%)	17 (85%)
Gómez[b] (M= 1.42; SD= .81)	3 (10%)	15 (48%)	10 (32%)	3 (10%)
FCh LA				
Donaldson[a]	0	0	4 (20%)	16 (80%)
Gómez[b] (M= 1.35; SD= .60)	2 (6%)	16 (52%)	13 (42%)	0

Note: Amb HS = Ambivalence Happy/Sad; Amb LA = Ambivalence Love/Anger; Fch HS = Feeling Change Happy/Sad; Fch LA = Feeling Change Love/Anger

[a] n = 20; [b] n = 31

Table 32

A Comparison Between the Scores on the PACES of the Two Groups of Saarni (1989c)'s Study and the Scores Obtained by Mothers in the Present Study.

Group	N	M	SD
Parents of Parochial School's Children	50	40.94	5.46
Counseling Students	34	33.53	4.90
Gómez	63	49.79	7.50

Table 33

A Comparison Between the Scores on the LEAS of the Three Groups of

Lane, Scherest, Reidel, Weldon, Kaszniak and Schwartz (1996)'s Study

and the Scores in the Present Study

Group	N	Mean	SD
Alexithymic	51	56.9	10.8
Intermediate	70	60.7	10.7
Nonalexithymic	270	63.0	10.6
Gómez	*63*	*52.46*	*5.09*