The term “attachment” is now in common usage and, as the readers of this Special Issue are aware, is referenced in a rapidly increasing variety of contexts involving child custody (McIntosh & Chisholm, 2008). The aim of this article is to provide judges, lawyers, mediators and mental health professionals involved in custody assessment with an overview of the history of the field of attachment and its principal measures, together with a clear description of what the term “attachment” does—and does not—mean to attachment researchers and theoreticians. Implications for normative separations that do not involve custody-related assessment or the intervention of courts or mediators are also considered. With respect to contested custody cases, we consider the use of standardized attachment measures, and note that sufficient validation for most such measures in clinical contexts is still developing. We describe three measures taken from the research literature (the Strange Situation procedure, the Attachment Q-sort and the Adult Attachment Interview), each subjected to meta-analyses and widely regarded as “gold standard” methods in research. These three methods come closest at this point in time to meeting criteria for providing “scientific evidence” regarding an individual’s current attachment status. Limitations on widespread use include the need for substantiating meta-analyses on father-child relationships, and further validation across a wider spread of children’s ages. We are confident that these restrictions can be solved by new research. In the interim, we argue that increased familiarity with the above measures will assist custody evaluators both in standardizing their assessment procedures and their capacity to gain more from the observational data available to them. Such increased standardization and depth of observation should be highly beneficial to the courts. Related to our endorsement of use of attachment measures in family law matters, we address issues of training, and strongly encourage custody evaluators to attend trainings in the principal methods of the field, and insofar as possible, to become certified in their use. Overall, we endorse the position that attachment theory provides important perspectives not only on the emotional process of divorce itself, but as well on the decisions made for and about the children concerned. Thus, this paper argues that attachment, correctly understood, creates a critical foundation for all professionals working with separated families.

Keywords: Attachment Theory; Divorce; Children; Assessment; Family Law
At the same time, and regardless of the degree of parental conflict involved, the courts will necessarily remain aware of and be concerned by the pain and stress incurred by virtually all parents undergoing divorce. Whether the situation is contentious or cooperative, it is hoped that an understanding of attachment can offer not only information capable of guiding care and visiting arrangements for the child, but also help to alleviate some of the fear, suffering and confusion experienced by divorcing parents.

One widespread view shared by this Issue’s contributors is that children should be assigned to the primary custody of one parenting figure (whether mother or father) across approximately the first three years of life (McIntosh, Guest Editor’s Introduction, this Issue; Sroufe, this Issue). Such a position—if taken consistently by the court—should contribute to the alleviation of this often central focus of parental stress, confusion and contentiousness. In addition, many papers in this Issue may also serve to reduce the worries of the “visiting” parent via an understanding that his or her relationship during infancy and toddlerhood need not ultimately be “secondary” in any important sense. Thus (see Sroufe, this Issue) so long as the “visiting” parent can maintain regularity of contact which involves lively, sensitive interactions with the child, the child’s opportunity for forming a full and secure attachment to that parent will remain intact. Judges informed by these views can (a) alleviate the strain incurred by both parents engaged in well-meaning but untoward attempts at designing “half-and-half” early care arrangements; and (b) reassure the “secondary”, “visiting” parent that his/her opportunity for establishing a full relationship with the child need not be compromised.

Another central position taken here is that all assessment procedures related to contested custody issues should be assigned and directed exclusively by the court. We oppose the common practice wherein each parent presents their own contending “expert” witnesses, a practice which entails difficulties well explicated by Bretherton (this Issue). In contrast, we recommend that the judge alone should call for parent and child assessments. For this purpose, as regards attachment assessments, the Appendix includes procedures which the court should follow in order to locate individuals with exceptional competence and experience in the assessment being considered. Further information regarding the administration and analysis of the methods as well as obtaining training in their use is also provided.

In contested custody cases, there has recently been a call for limiting “the expert testimony of mental health professionals . . . to the presentation of scientifically supported evidence” (Emery, Otto, & O’Donohue, 2005, p. 23). These authors therefore recommend that “custody evaluators follow the law, and offer opinions for which there is adequate scientific basis (p.1)”. Thus Emery and colleagues take a position shared by O’Donohue, Beitz, & Tolle (2009), that many tests used in custody evaluations are problematic, making the quality of most inferences based on them questionable.

Currently, many custody decisions are at least partially based upon Rorschach or MMPI results (adults) or intelligence or projective test results (children). However useful these particular assessments may or may not be (see Byrne, O’Connor, Marvin, & Whelan, 2005; Emery et al., 2005), if a child’s attachment security is a primary concern of the courts, then utilizing well-validated measures which directly assess attachment relationships would in principle be highly desirable. For such measures to be considered “well-validated” they will need, in our view, to have repeatedly been shown to be predictive of a child’s security or likely security as assessed by other measures; critical findings have been replicated many times outside of the laboratory of the originator, as seen in summaries often termed “meta-analyses”; and ideally will have passed “psychometric” (measurement) tests—for example, at the most simple level, exhibiting stability (the same outcome at different time periods) when the child and parent are in undisrupted circumstances.

A review of the literature conducted for the purposes of this monograph has pointed to three measures in the field of attachment which are now referred to as its “gold standard” measures. This term generally means that the validity, reliability and central findings regarding the measure have been established in multiple laboratories, and are widely used. With respect to attachment, as noted by George, Isaacs and Marvin in this Issue, the first “gold standard measures” were the Strange Situation and the Adult Attachment Interview, each of which were subjected to meta-analyses testing their relations to other central assessments of attachment in the 1990’s. Additionally, they were found predictive of critical aspects of social-emotional development (Sroufe, Egeland, Carlson & Collins, 2005). By 2004, van IJzendoorn and his colleagues (van IJzendoorn, Vereijken, Bakermans-
Kranenburg & Riksen-Walraven, 2004) had conducted a meta-analysis of the Attachment Q-sort, concluding that this measure could now be termed the third “gold standard” for the field.

The “gold standard” measures in the field of attachment (which will be alternately termed its “central” or “major” measures) consist, as noted, first in the Strange Situation, a parent-child separation-and-reunion procedure conducted in unfamiliar environments with infants 12–18 months, and found significantly indicative of previous sensitive responsiveness to the infant, particularly for mothers. The second “gold standard” measure is the Adult Attachment Interview (AAI), a standardized protocol for assessing an adult’s ability to converse coherently and collaboratively regarding their own childhood attachment-related experiences, has been found predictive both of infant Strange Situation response to the parent and, independently, parental sensitive responsiveness. Psychometric validation for the Adult Attachment Interview has been particularly extensive and successful; however, application to fathers, while promising, requires further testing. The third gold standard measure is the Attachment Q-Sort, a systematic procedure used directly following extensive observations of children within a given parent’s natural (most often home) environment. The Attachment Q-Sort has been most frequently validated for mother-child dyads from 12–18 months, but some studies have successfully extended the measure toward middle childhood (Everett Waters, personal communication to Jennifer McIntosh, June 16, 2011). Validation for use with fathers, however, largely remains to be undertaken.

A difficulty for the field of attachment includes considerable gaps in the ages at which child measures can be administered, meaning there are periods of time at present when only two of the three well-established measures can be administered. This situation should soon be remedied by ongoing validation and meta-analytic work on further methods. These include the separation-reunion procedures for six year olds (Main & Cassidy, 1988) and three year olds (Cassidy & Marvin, 1992), and the Attachment Story Completion Task (Bretherton, Ridgeway & Cassidy, 1990). See Appendix for description of these methods.

Finally, we underscore that all present methods of assessing attachment were designed for research purposes (e.g., for comparing groups of individuals or the effects of variations in experience within relatively large groups) and have yet to be sufficiently tested for their predictive powers with respect to the assessment of individuals. It should be noted that the methods selected for discussion within this paper have no bearing upon the potential usefulness of many other attachment measures currently being utilized within the research context. Those we put forward here are simply presently the most extensively validated, and hence appear most likely to become useful to the courts (For a discussion of ways in which validation for the “court” setting may eventually be approached, see especially Byrne et al., [2005]).

The remainder of this article is divided into several sections. First we present a history of the field of attachment, elaborating on what have recently been termed each of its “landmark” moves (Rutter, Kreppner, & Sonuga-Barke, 2009). In the second section we provide a summary definition of the term “attachment” and elaborate upon some common misconceptions regarding its nature and consequences—particularly, of course, as these are relevant to custody issues.

In the third (“Judicial”) section, we make recommendations for easing the divorce process for children and parents from the vantage point provided by the contributors to this Issue as well as other attachment theorists. We also suggest ways in which the court may ensure privacy regarding attachment assessments where needed. A fourth section provides brief concluding remarks. Finally, an Appendix includes a brief discussion of the recommended methods, as well as contacts for individuals qualified to teach and/or utilize them.

I. ATTACHMENT: HISTORY OF THE DEVELOPMENT OF THE FIELD

Although the distress exhibited by most young children when separated from their parental figures has long been noted, its origins in our evolutionary heritage, i.e., in promoting infant survival among Old World ground-living primates, was recognized only as recently as the late 1950’s (Bowlby, 1958). A procedure for assessing variations in an infant’s security of attachment to its mother as seen in
responses to brief laboratory-based separations and reunions—termed the Strange Situation (Ainsworth, Blehar, Waters, & Wall, 1978)—was developed in the 1960’s, and was found related to differing qualities of maternal care as observed in the home. In the 1980’s a structured interview focusing upon an individual’s attachment history and its effects was developed for adults (George, Kaplan, & Main, 1984, 1985, 1996). Variations in a speaker’s coherence and collaboration during this Adult Attachment Interview were systematized (Main & Goldwyn, 1984; Main, Goldwyn, & Hesse, 2003) and found predictive of infant security versus insecurity (Main, Kaplan, & Cassidy, 1985). Shortly thereafter, brief bouts of disorganized/ disoriented behavior were identified in some infants observed during the Strange Situation procedure (Main & Solomon, 1986, 1990) and found to have particularly unfavorable antecedents (Hesse & Main, 1999, 2006; Scheungel, van IJzendoorn, & Bakermans-Kranenburg, 1999) and consequents (Cyr, Euser, Bakermans-Kranenburg, & van IJzendoorn, 2010; Fearon, Bakermans-Kranenburg, van IJzendoorn, Lapsley, & Roisman, 2010; van IJzendoorn, Scheungel, & Bakermans-Kranenburg, 1999). In addition, brief indices of disorganized speech or reasoning regarding traumatic events were identified in some transcripts of the Adult Attachment Interview (Main & Hesse, 1990; see also Hesse & Main, 2006) and, among parents, were not infrequently found predictive of infant disorganization.

Fifty years following its inception, then, attachment has remained an actively developing field (see Cassidy & Shaver, 2008). At present, researchers are asking new questions (see Main, 1999b), and exploring new domains including the cultural (e.g., Sagi-Schwartz et al., 2003; van IJzendoorn & Sagi-Schwartz, 2008), the anthropological (e.g., Hrdy, 1999, 2009) and the genetic (Polan & Hofer, 2008; Vaughn, Bost, & van IJzendoorn, 2008). In this history section, however, we focus primarily upon the phenomena of attachment as described through the late 1990’s, since it is this literature which has to date had the most direct bearing upon issues of attachment as they relate to child custody and the courts.

Recently, Sir Michael Rutter, a London psychiatrist noted for his discoveries in psychiatry, child development, and developmental psychopathology, named “five key landmarks” in the history of the field of attachment (Rutter et al., 2009).

The first “landmark” move in the field of attachment was also its founding move, i.e., John Bowlby’s recognition of the selective, biologically based nature of the child’s attachment to specific, non-interchangeable persons with whom the child had had a history of contingent social interactions. Bowlby (1907–1990) was a London child and family psychiatrist trained in the natural sciences who became troubled by the suffering of young children subjected to extended and/or repeated separations from parental figures. Ultimately, Bowlby turned to evolutionary theory, which provided a compelling explanation of both the apparent intensity of the responses of separated children as well as their potentially malignant consequences. Bowlby’s thinking also was significantly influenced by his study of ethology (animal behavior as observed in its natural context) and primate anthropology. Following a series of early papers (e.g., Bowlby, 1958), what ultimately came to be known as “attachment theory” was presented in a three-volume series entitled Attachment, Separation and Loss (Bowlby, 1969/1982, 1973, 1980; see also Bowlby, 1958, 1988; Ainsworth & Bowlby, 1991). Although always concerned with children’s well-being, these volumes also addressed the propensity to form new attachments in adulthood, as well as adults’ (and children’s) responses to loss.

By 1950, Bowlby’s concern with parent-child separations was widely known, and led to an invitation from the World Health Organization to interview social workers, psychologists, psychiatrists and other clinicians across Europe and the United States regarding the post-war effects upon children of both (a) institutional care and (b) separation from parents. With respect to extended institutional (orphanage) care, the development of an “affectionless character”—i.e., disruptions in the ability to form attachments in later life—was found to be the most common outcome (Goldfarb, 1943, 1945). With regard to early separations, the clinicians Bowlby interviewed were in agreement that what was chiefly contributory to mental health in adulthood was that an individual had, during the first three years of life, experienced a “warm, intimate and continuous relationship with his mother (or permanent mother-substitute) in which both find satisfaction and enjoyment” (Bowlby, 1951, p. 13). This
corroborated Bowlby’s earlier views on the importance of continuity of care, and anticipated his and the Robertsons’ findings regarding the potential long-term effects of major separations.5

Shortly following upon his tour for the World Health Organization, Bowlby came in contact with James and Joyce Robertson, who had become alarmed regarding two separation-related practices common in Great Britain. These were, first, that young family-reared children were being casually placed in “residential nurseries”—as when, for example, a mother went to hospital for the birth of a second child. An additional concern was hospital practices wherein parents were allowed to visit their children only one hour per week.

These practices were not regarded as harmful, due to two widespread beliefs which were held at the time: (a) that for young children, distress on separation from their mothering figures was due to the fact that they had been fed by them—hence, it was reasoned that another caregiver could readily substitute, and (b) that children under three years of age were too young to keep a parent in mind, and hence not yet able to mourn or miss parental figures during their absence.

Observations of adverse reactions to extended placements in residential nurseries were initially documented in a small group of young children studied by Robertson and Bowlby (1952). Here, three “phases”6 of behaviors observed (a) in the nursery or hospital as well as (b) on reunion with the parent were identified. In the first stage of separation response, termed protest, which may last from a few hours to several days, loud, hopeful crying and calling for the attachment figure (hereafter, parent) appeared. For example, children observed in hospital in the “protest” phase of response to separation were described as follows:

He [the child] is extremely upset to have lost [his mother], is confused and frightened by unfamiliar surroundings and is distraught with fright and urgent desire to find her. He will often cry loudly, shake the cot, throw himself about and look eagerly towards any sight or sound that might prove to be his missing mother.

Robertson & Robertson, 1989, p. 18

If the parent returned or visited during this “phase”, reunions were usually observed to go well. As the length of separation increased, however, children were described as entering a second stage, termed despair. At this point, crying weakened, movements lessened, and nurses’ overtures were rejected. The immediate response to the parent on reunion for children in the “state” of despair was typically angry and ambivalent. If returned to the home at this time, unpredictable bouts of aggression and fear of separation could appear, and continue for several weeks.

Finally, if left long enough in the nursery, children were observed to enter a third stage, termed detachment. By this time, to the casual observer, the child appeared to have “settled in” or “adjusted” to the new setting, displaying, for example, a somewhat blank but compliant attitude towards the nurses. However, on reunion, the previously most favored parent was now sharply avoided, or even appeared not to be recognized, while other familiar persons were readily greeted. Children who had reached the stage of detachment in the separation setting sometimes continued to treat the parent as a stranger for surprisingly long periods following reunion—in some cases only hours, but in others, days. When “feeling” for the parent eventually made its appearance in such cases, the child might well initially exhibit marked ambivalence, including rejecting, hostile and defiant behavior (Bowlby, 1973, pp. 12–13).

Due not only to Bowlby’s investigations and theorizing, but as well to the Robertsons’ films of the disturbing responses of children experiencing hospital and residential nursery separations, along with a subsequent series of separation films distributed in Great Britain (Robertson & Robertson, 1967–1972), the import of a child’s tie to a specific, selected person, as well as a need for regular contact with that person was recognized. This greatly influenced hospital practices, leading to the acceptance of regular parental visitations (Hinde & Stevenson-Hinde, 1991, p. 53). Additionally, parents having another baby no longer placed the elder child(ren) in residential nurseries during mother’s hospital stay.

As this review has indicated, then, Bowlby was convinced early on that continuous affectionate care across the first three years of life was an essential component in healthy, normal development, while...
major or repeated separations from parenting figures caused unacceptable suffering at the time, and—no doubt combined with other factors—could lead to considerable risk for unfavorable development.

Attachment theory represented a radical departure from previous conceptualizations of the nature of the child’s tie to the mother, and had taken Bowlby over 30 years to formulate. Ultimately, the most fundamental distinction between Bowlby’s thinking regarding the child’s tie to parental figure(s) and that of his predecessors was his requirement that explanations of these phenomena conform to the paradigm of natural selection. Working under the “stern and generous tutelage” of his friend, the biologist Robert Hinde (Bretherton, 1992b, p. 762), Bowlby was taken with the reasoning that species-specific behavior patterns, like species morphology, are the products of selection pressures that assist in individual survival and ultimately in reproductive success. Examples of species-specific behaviors include “attachment behaviors”, i.e., the crying, calling, following, and clinging which, in ground-living primates (including, of course, humans) become centered on selected caregivers during the first year of life. Because of their species-wide nature, Bowlby ultimately attributed these characteristics to the working of an instinctively guided “attachment behavioral system”. This meant that attachment behavior had been incorporated into the repertoire of these species due to selection pressure, i.e., because they enhanced the chance for survival in the environments in which ground-living primates and humans evolved.

The specific environmental pressure which, Bowlby proposed, accounted for the development of infant proximity maintenance (infant “attachment behavior”) across the course of evolution was the constant danger of predation. For human infants, this danger would have been markedly enhanced by the fact that, like many non-human primates, our hunter-gatherer ancestors had frequently needed to travel in search of food. This meant that it was not possible to establish a fixed location for protection of the young, such as a burrow or den. Thus, in contrast to most mammals, for whom a special place provides the haven of safety, for both human and primate infants the attachment figure is the single location that must be sought under conditions of alarm (Bowlby, 1969/1982; Hesse & Main, 1999; see also Sroufe, this Issue). Bowlby further proposed that the infant’s focus upon the attachment figure has been rendered all the more emotional and insistent because—again, due to our semi-nomadic ancestry—attachment is inevitably closely intertwined with fear. Relatedly, it is now widely agreed that, within the environments in which we evolved, even brief separations threaten infant survival, and often within the hour (Hinde, 1974; Hrdy, 1999).

Attachment behavior has therefore come to be viewed as the central “external” or “behavioral” mechanism regulating primate (including, of course, human) infant safety, and maintenance of proximity to attachment figures is understood to be a sine qua non of the ground-living primate infant’s survival (Hinde, 1974; Hrdy, 1999). Bowlby’s theory of attachment thus refers to a universal or species-wide characteristic: the genetically channeled propensity for all human young, so long as they are given even minimal social input from a consistent figure during the earliest years of life, to form a highly emotional bond to at least one (and frequently more than one) older protective individual and thereafter to seek, monitor and attempt to maintain proximity to them.

The second “landmark” move in the field of attachment (Rutter et al., 2009) was the development of a brief laboratory separation-and-reunion procedure which came to be known as the Strange Situation. This development took place while Mary Ainsworth (1913–1999)—initially a clinical, and later a developmental psychologist—was a professor at The Johns Hopkins University (see Main, 1999a).

Ainsworth’s Baltimore study originated as an attempted “cross-cultural” replication of an earlier “home observation” study of Uganda mother-infant dyads (26 mothers, 28 infants), each observed in the home every two weeks for two hours per visit. The study took place in 1954–1955, and the 28 infants ranged from 1 to 24 months of age (Ainsworth, 1967). Ainsworth’s original aim was simply to document the development of attachment behavior from the time when crying was non-directed to the time when separation distress and reunion greetings became specific to particular persons. Here she identified what would later become the two chief hallmarks of attachment: use of the mother as “a secure base for exploration and play” and “flight to the mother as a haven of safety”. Although in
Uganda these two hallmarks were simply considered signs that an infant was becoming attached, they are now considered to be the primary indices of infant security.

Ainsworth’s most basic finding in Uganda was essentially unexpected. Having learned to associate insecurity in infancy with major mother-child separations from her earlier work with Bowlby and Robertson, she was initially surprised to find that—even absent such experiences—some children’s attachments appeared to be insecure. States of insecurity were identified by crying even when the infant was in the mother’s presence (Meinz & Main, 2011). Ainsworth’s curiosity regarding the origin of these unexpected differences in security led her to collect a second, Baltimore sample of 26 mother-infant dyads, which was based upon even more extensive home visits (approximately 66 infant waking hours per dyad). The visits took place across the first year of life, each lasting about four hours and spaced at approximately three week intervals.

At the end of the year, infants and mothers were seen in the Strange Situation procedure, which was conducted in a pleasant, toy-filled laboratory. Twenty-three dyads were available for participation. The eight “episodes” of the procedure (see Main, 2000) involved an introduction to the playroom, two maternal leave-takings, and two reunions: During one separation the infant was left with a friendly stranger, while in the second the infant was left entirely alone. Separation episodes in which the infant exhibited excessive distress were curtailed, so that some procedures lasted only 15 minutes.

Somewhat amusingly, given its fame for doing so, this procedure was not originally intended to identify individual differences in infant security, nor to connect infant security to mother-infant interaction in the home. Rather, it was designed to confirm Bowlby’s more general expectation regarding infant fear of parental leave-taking. In 1978, by pooling her original sample with two further samples collected by her graduate students, Ainsworth was ready to report on the Strange Situation behavior of one hundred middle-class infants (Ainsworth et al., 1978). Here half of the infants cried when simply left briefly with a friendly stranger, and three-quarters cried when left alone entirely (see Ainsworth et al., 1978, p. 363). Consonant with Bowlby’s expectations based on human evolutionary heritage as discussed above, Ainsworth had completed a first demonstration that even very brief separations from the primary attachment figure in unfamiliar, pleasant settings were perceived by a strong majority of one-year-old infants as dangerous.

With regard to the subset of 23 dyads for whom Ainsworth had collected extensive home observations, to her surprise only 13 responded to the procedure as expected—i.e., by engaging in exploration and play prior to maternal leave-taking, showing distress upon separation (usually by crying), seeking proximity or contact upon reunion, and shortly thereafter returning happily to play. These infants, termed secure (derived from the Latin, se—cure, without worry, care, concern), were found to have had mothers who were sensitively responsive to their signals and communications in the home. Specifically, Ainsworth’s narrative records showed that the mothers of these infants had, for the most part (a) noted when an infant signal occurred, (b) interpreted it accurately and then, (c) responded promptly and, (d) appropriately. For some academic psychologists, an infant’s crying upon separation from the mother in the unfamiliar Strange Situation environment was initially considered a sign of insecurity. However, views were quick to change in response to Ainsworth’s home studies of maternal behavior (above) as well as Sroufe and colleagues follow-up studies (below).

The behavior of the remaining ten infants was termed insecure (in—se—cure, or not without worry, care or concern). Four displayed distress throughout much of the procedure, i.e., even in the mother’s presence. On reunion, proximity seeking was mixed with subtle to open anger, and these infants—usually too distressed to return to play—were termed insecure-ambivalent/resistant (hereafter, ambivalent). Ainsworth’s narrative records showed that their mothers had been insensitive to their signals, largely through neglect, interference, and/or unpredictability. Finally, six other infants—to Ainsworth’s amazement, given that they had not experienced major separations—behaved like children in the final “detached” phase of response to separation as identified by Robertson & Bowlby (1952). Thus, they did not cry or generally show other signs of distress upon separation, but rather focused upon the toys throughout the procedure, and actively avoided the mother on reunion. These infants were termed insecure-avoidant, and Ainsworth’s records showed that their mothers had been rejecting of attachment behavior in the home. As noted, to some, the absence of crying and continued
exploration displayed by these infants had seemed to be a sign of “security”. However, (a) Ainsworth’s home observations, (b) Sroufe et al.’s follow-up studies (below), and (c) Sroufe and Waters (1977b) findings of high heart-beat during the Strange Situation in avoidant infants, followed by Spangler & Grossmann’s 1993 study finding a trend towards increased cortisol in both avoidant and disorganized infants, provided convincing evidence that these infants were behaviorally masking distress which was expressed physiologically.

Strange Situation behavior had, then, reflected the nature of the relationship which the infant and mother had established across the first year of life (Ainsworth et al., 1978). Another extensive study (Ainsworth, Bell, & Slayton, 1971) showed that only infants identified as secure with the mother in the Strange Situation were able to use her as a secure base for exploration and play in the home. This finding laid the basis for Waters’ and Deane’s (1985) development of a Q-sort procedure focusing upon the “secure base” phenomenon in itself (see also Vaughn & Waters, 1990; Waters, 1995).

As publications began to emerge from Ainsworth’s Baltimore laboratory, readers and researchers began not only to wonder whether so small a sample could produce replicable results, but also whether distributions of secure, avoidant and ambivalent classifications would be similar for infants raised in other cultures. By 1988, van IJzendoorn & Kroonenberg had completed a meta-analysis (again, a statistical summary of multiple studies combined to create a larger sample size) of studies of Strange Situation behavior which included multiple cultures. Security predominated in most cultures, and differences within cultures (e.g. between Strange Situation distributions in one town versus another within the same country) were greater than differences between cultures. Thus, the distribution of Ainsworth’s three attachment categories across cultures was consistent with her Baltimore findings: A majority of infants (65%) were found to be secure, with 21% avoidant and 14% ambivalent. This finding has held (van IJzendoorn & Sagi-Schwartz, 2008), and the averaged worldwide distribution of secure, ambivalent and avoidant infants remains surprisingly close to Ainsworth’s original distribution.

Later—and surprisingly, to many—Strange Situation responses to mother and father were found to be independent. Thus, knowing an infant’s attachment classification with one parent was entirely uninformative with respect to its classification with the second, so that the same infant could be secure with one parent and insecure with the other. This independence of response to the two parents was emphasized in a Berkeley study of 189 families—which included father-infant as well as mother-infant Strange Situations (Main & Weston, 1981)—and reinforced the idea that Strange Situation responses were not indices of infant “temperament”, but rather the product of interactions with a specific parent10. Many additional arguments against the “temperament” interpretation of Strange Situation behavior have been cogently outlined by Sroufe (1985).

Ainsworth’s Baltimore sample was small, the study was short-term, and her participants were exclusively middle-class. Both the long-term effects of parent-infant interactions as represented in Strange Situation behavior and their generalizability to other socio-economic groups thus remained unknown. Alan Sroufe, Byron Egeland and their colleagues at the University of Minnesota therefore undertook a ground-breaking longitudinal study, collecting a sample of 189 mothers and infants who were living in poverty (see, e.g., Sroufe, Egeland, Carlson, & Collins, 2005). Unlike stable low-risk middle-class samples, Strange Situation classifications in this high-risk sample were shown to shift with mother’s changing circumstances. Infants tended to be secure when mother was living in favorable circumstances, and to become insecure when her circumstances changed unfavorably (Vaughn, Egeland, Sroufe, & Waters, 1979).

The Minnesota Parent-Child Project (commonly referenced as the Minnesota Longitudinal Study) has now been followed to adulthood, and differences uncovered between secure and insecure children as observed with the mother in infancy have emerged as remarkably strong in numerous investigations (see Carlson, 1998; Carlson, Sroufe, & Egeland, 2004; Sroufe, 1983, 2005; Sroufe et al., 2005; Sroufe, Egeland, & Kreutzer, 1990; Sroufe & Fleeson, 1986; Sroufe, Fox, & Pancake, 1983; Troy & Sroufe, 1987; Weinfield, Sroufe, Egeland, & Carlson, 1999, 2008). Beginning with preschool-aged individuals, those secure with mother in infancy have been found happier, more socially competent, more empathic, less likely to be either bullies or victims than other children, and to evidence greater
emotional well-being than previously insecure children. Observers have also found previously secure children to have a greater sense of self-agency, to be better emotionally regulated, and to have higher self-esteem. In middle childhood, those secure with mother in infancy have been found to have a greater capacity for friendships than previously insecure children; and in adolescence, they contrasted with previously insecure children in being able to carry out the difficult task of maintaining their own friendships while fitting in with the larger social group. Also in adolescence, previously secure individuals were found the least vulnerable to psychopathology (Carlson, 1998), and in adulthood, exhibited an ability to form trusting, non-hostile peer relationships, as well as similarly intimate and trusting relations with partners. These findings have held when controlled for social class and IQ\textsuperscript{11} (Sroufe et al., 2005). New results are continuing to emerge (Sroufe, Coffino, & Carlson, 2010).

The third landmark in the history of attachment (Rutter et al., 2009) centered on Main and colleagues 1985 article “Security in infancy, childhood and adulthood: A Move to the Level of Representation” (Main et al., 1985), which—together with Bretherton’s (1985, 2008; Bretherton et al., 1990), theorizing—represented the first investigation of Bowlby’s concept of an experience-based “internal working model” of attachment-related experiences (briefly, a notion of internal or mental expectations as derived from real-life experience)\textsuperscript{12}. This study (Main et al., 1985) was based on a day-long laboratory observation of 40 six-year-old children and their parents, all of whom had been observed separately with both mother and father in the Strange Situation procedure at 12 or 18 months.

Previous studies of individual differences in early attachment status and its correlates had focused entirely on observable non-verbal behavior, e.g., the mother’s responses to the infant in the home (Ainsworth et al., 1971), or the formerly secure versus insecure children’s treatment of other children in the preschool setting, as noted above (e.g., Troy & Sroufe, 1987). In the Berkeley study, together with several other “representational” measures\textsuperscript{13} and one “behavioral” measure\textsuperscript{14}, Main and her students administered a new “Adult Attachment Interview” protocol (George et al., 1984)\textsuperscript{15} to both mothers and fathers (in separate rooms) while children remained in a pleasant laboratory playroom. The interview involved a set of queries (with follow-up probes) regarding the parent’s attachment-related experiences in childhood and their perceived effects on personality and functioning. The transcribed interviews were then analyzed for their “discourse” or conversational properties by Main & Goldwyn (1984), later joined by Hesse (e.g., Main, Goldwyn, & Hes, 2003), who collaborated in further elaboration of the scoring and classification system.

Transcripts of the Adult Attachment Interview (AAI) were ultimately described as indicating the parent’s “state of mind with respect to attachment” (see below). For each parent, the seminal qualities of their discourse regarding their attachment-related history and its effects were found related to the infant’s Strange Situation response to that particular parent five years previously (Main et al., 1985; see also Steele, Steele & Fonagy, 1996).

Strikingly, what was revealed was that both mothers and fathers whose infants had been judged securely-attached to them differed from the mothers and fathers of insecure infants in that they were coherent and collaborative in discussing their (reported) experiences, whether apparently favorable or unfavorable. These parents were termed secure-autonomous, and again most often had children who had been secure with them in the Strange Situation procedure. In contrast, parents whose infants had been judged insecure with them in the Strange Situation procedure five years previously failed to present a coherent picture of their own childhood experiences, albeit in varying ways. Specifically, parents who claimed lack of memory for childhood while initially providing a positive portrayal of parents which was left unsupported or directly contradicted later within the interview typically had infants who had been insecure-avoidant with them in the Strange Situation, and were termed insecure-dismissing. Finally, a minority of parents appeared “preoccupied” with their own early experiences and their effects, as revealed in excessively lengthy (often, angry or confusing) conversational turns. These parents, termed insecure-preoccupied, tended to have infants who had been classified as ambivalent in the Strange Situation. In a meta-analysis of studies available to that date, van IJzendoorn and Bakermans-Kranenburg (1996) reported that 58% of mothers had been judged secure, 24% dismissing, and 18% preoccupied; of these, 19% were additionally judged unresolved/disorganized (see directly below).
Finally, individuals who, when discussing a potentially traumatic event, exhibited what came to be termed “lapses in the monitoring of reasoning or discourse” (e.g., speaking as though a dead person was still alive in the physical sense, or that the speaker had been causal in the death in ways which violate our normal understanding of physical causality) were recognized as a separable category of adult attachment (see Main, DeMoss & Hesse, 1991/1994) and were termed “unresolved/disorganized” (see Hesse, 1996). This assignment was typically made for cases exemplified by unresolved responses to loss, abuse or other traumatic experiences (see Hesse & Main, 2000). Later, the infants of unresolved/disorganized parents were found likely to be disorganized/disoriented with them in the Strange Situation, as will be elaborated below. This fourth classification was officially added to the AAI scoring and classification manual via work conducted by Hesse and DeMoss in 1989, and a fifth category (rare in normal samples) termed “cannot classify” was added shortly following (Hesse, 1996). These findings called for replication, and ten years later a meta-analysis of combined results taken from 18 samples was conducted, with the overall match between a parent’s secure versus insecure Adult Attachment Interview and secure vs. insecure offspring Strange Situation response to that same parent being calculated at 75%, even when the AAI had been conducted prior to the birth of the first child (van IJzendoorn, 1995). The relation between the parent’s security and their offspring’s security was very strong. This same study also showed that insecure-dismissing parents tended markedly to have insecure-avoidant children, while insecure-preoccupied parents also tended (less significantly) to have insecure-ambivalent children. van IJzendoorn’s (1995) meta-analysis included ten further samples, in which sensitive caregiving was found markedly related to secure infant attachment status, i.e., secure-autonomous responses to the AAI predicted sensitive caregiving, while insecure interview responses predicted insensitive care.

In the succeeding years, AAI interview outcomes were found related to clinical status (see especially Steele & Steele, 2008), with less than 10% of individuals experiencing clinical levels of distress classified as secure (Bakermans-Kranenburg & van IJzendoorn, 2009). In addition, in interactions, men classified as secure were repeatedly found more supportive of their partners in resolving conflict than were those classified as insecure (Creasey, 2002; Crowell et al., 2002; Wampler, Shi, Nelson, & Kimball, 2003; see Hesse, 2008). Moreover, specifically among unhappily married men (Babcock, Jacobson, Gottman, & Yerington, 2000) those who were violent were especially likely to be classified as insecure. Note that while few studies of fathers and children had been available at the time of van IJzendoorn’s (1995) meta-analysis, these more recent studies of couple interactions—interactions believed by many (e.g. Cowan, Cowan, & Mehta, 2009) to contribute to child security—had included fathers, finding insecurity on the Adult Attachment Interview predominating in fathers whose couple interactions with their wives were insecure.

The fourth landmark cited by Rutter et al. (2009) “was Main and Solomon’s (1986, 1990) recognition of the need for a category of ‘disorganized attachment’ to deal with unusual patterns of response to the Strange Situation that were not encompassed by the straightforward security/insecurity distinction.” Rutter noted further, and accurately, that disorganized attachment was associated with “particularly . . . adverse psychosocial environments of one kind or another” (Rutter et al., 2009, p. 530).

This “new” category of “disorganized/disoriented” infant Strange Situation response originated in Main’s (1973) doctoral study, which described six babies as “unclassifiable” within Ainsworth’s tri-partite classification system. Being familiar with the field of ethology, Main had already been intrigued by odd-appearing behaviors of animals in conflict situations (see Hinde, 1966, pp. 246–248) and—after observing one “unclassifiable” infant in her doctoral study fling her arms about her head while in an anomalous position on parent entrance—Main continued to pursue the problem of “unclassifiable” infants in this light. In 1977 she found “unclassifiable” infants in Strange Situations collected by Klaus and Karin Grossmann in Germany. She returned to the Grossmann’s laboratory in 1979, and constructed a scale for “disordered/disoriented” (essentially, conflict) behaviors, which were seen in some “unclassifiable” infants responding to game-like invitations made by a clown, a finding replicated in Berkeley (Main & Weston, 1981).
A few years later, Main and Solomon (1986, 1990) undertook a far more intensive analysis of 200 “unclassifiable” or “difficult-to-classify” infants, (100 drawn from low-risk and 100 from maltreatment samples). Examples of the behaviors of these infants included approaching the parent actively while simultaneously averting the head; falling prone upon the floor at the parent’s entrance; disordered, confused and indecisive movement about the room; freezing, stilling, entrance into temporary trance-like states; and anomalous postures and stereotypies. Behaviors such as these could certainly be indicative of simple confusion, or unknown neurological difficulties, but many seemed particularly suggestive of fear (Main & Hesse, 1990). If so, the fear was considered likely to have involved the particular parent with whom the infant was being observed.

The term which seemed best to conceptualize this wide array of anomalous behaviors was “disorganized/disoriented” (hereafter, “disorganized”). Seven thematic headings were delineated to capture these differing manifestations of lapses out of organized patterning (Main & Solomon, 1990), and trainings (and certifications) in coding for this category began to be offered. With the “disorganized” classification endorsed by Ainsworth, maltreatment researchers began to recode their data utilizing this new category (Carlson, Cicchetti, Barnett, & Braunwald, 1989; Lyons-Ruth, Connell, Zoll, & Stahl, 1987), finding that the great majority of maltreated infants were disorganized. This outcome has recently been strongly replicated in a meta-analysis by Cyr, et al. (2010) which included 10 maltreatment samples.

The association between maltreatment and disorganization was considered readily explicable given that maltreated infants were being overtly frightened by a parent who simultaneously served as the child’s “haven of safety” in times of alarm. This meant that an approach-flight paradox would necessarily emerge, creating a condition of “fright without solution” (Main & Hesse, 1990; Hesse & Main, 2000, 2006)—hence, of course, increasing the likelihood that the infant would exhibit “conflict behaviors” at such times.

However, 15% of infants in low-risk samples were also being judged disorganized in their Strange Situation behavior, a finding which was initially difficult to explain (see Hesse & Main, 1999). The first clue to understanding this outcome was the fact that disorganized infants were found to have parents who had been classified as “unresolved/disorganized” on the AAI (Main & Hesse, 1990; see also van IJzendoorn, 1995). Based on the presumption that parental lapses in the “monitoring of speech or reasoning” surrounding the attempted discussion of loss or abuse experiences might be indicative of interference from enduring frightening emotion or ideation, Main and Hesse (1990; see Hesse & Main, 1999, 2000, 2006) reasoned that these parents, while usually not directly maltreating, might nonetheless tend to exhibit anomalous forms of (often unintended) frightening behavior in the infant’s presence. Indeed, unresolved/disorganized parents in several samples have now been observed to exhibit not only frightening/threatening, frightened, and dissociated behaviors in their infants’ presence, but also timid-deferential, disorganized and sexualized behavior, termed as a group “FR” behaviors (Main & Hesse, 1991–2006; see also Lyons-Ruth, who included FR behaviors in her expanded system for identifying anomalous parental behaviors, termed AMBIANCE, Lyons-Ruth, Yellin, Melnick, & Atwood, 2005). It is obvious that many such behaviors do not cause direct physical harm to the infant. However, Main and Hesse have argued that, like maltreatment, such behaviors on the part of an attachment figure can also place the infant in a situation of “fright without solution” (Hesse & Main, 1999, 2000, 2006), leading to experiences of conflict sufficient to engender disorganized/disoriented behavior such as freezing and stilling, anomalous postures and movements, et alia.

In several studies and meta-analyses disorganized attachment—as opposed to the avoidant and ambivalent forms of insecure attachment identified by Ainsworth—has been found particularly predictive of later psychopathology. For example, following a proposal made several years earlier by Giovanni Liotti (1992), in Sroufe et al’s longitudinal study, early disorganized attachment was found remarkably predictive of dissociative disorders between infancy and late adolescence (Carlson, 1998), especially where an individual had experienced intervening trauma (Ogawa, Sroufe, Weinfield, Carlson, & Egeland, 1997). Recently, borderline symptoms have also been found significantly predicted by infant disorganization (Carlson, Egeland, & Sroufe, 2009). Although in the case of
borderline symptomatology the strength of association was small, this is nonetheless remarkable given that usually only a few seconds of disorganized behavior in two twenty-minute procedures were being compared to symptoms assessed twenty-five to twenty-seven years later.

In another study linking infant disorganized attachment with the mother to indices of later emotional and behavioral difficulties, (69 samples of children 1 to 12 years [Fearon et al., 2010]), disorganized attachment status in boys seen in Strange Situations with the mother in infancy was found notably predictive of later “externalizing” behavior (aggressive/hostile behavior of a worrying nature). In contrast, relations to earlier avoidant and ambivalent Strange Situation classifications were unremarkable. This finding was all the more impressive because (a) externalizing behavior was sometimes being noted as many as ten years following the Strange Situation, and (b) the relations between early attachment disorganization and externalizing behavior increased with child age. We note, then, that disorganized attachment status in infants and young children—22—even in the apparent absence of maltreatment—is worrisome, given that it has signaled an increased risk of vulnerability to psychopathology in several samples.

II. ATTACHMENT: DEFINITIONS AND MISCONCEPTIONS

DEFINING ATTACHMENT

This section provides a brief review and expansion of many of the essential points explicated directly above. We begin with a simple summary definition: An attachment is one of a sub-set of bonds which tie one individual to another specific individual, binding them together in space and enduring over time. For reasons involving our evolutionary heritage, unless raised under highly anomalous conditions, first attachments to one or a few selected individuals are typically formed by three years of age, and usually within the first year, a fact which has been confirmed across widely differing cultures (van IJzendoorn & Sagi-Schwartz, 2008). Attachment is a species-wide behavior pattern in humans which Bowlby suggested had originally served to protect the young from predation and other dangers via maintenance of proximity to a protective older individual (Bowlby, 1969/1982).

For young children, an attachment may be described as a bond which serves to focus attention on the physical whereabouts or accessibility of one or a few selected, non-interchangeable older individual(s), whose proximity can then be sought in times of danger or fright. Separations from these selected “attachment figures” in unfamiliar or otherwise threatening environments is therefore expected to arouse distress, anxiety, or fear (Bowlby, 1969/1982). Accordingly, a persistent tendency to monitor the whereabouts of a particular individual, and a propensity to take flight to them in times of perceived danger—whether or not behaviorally expressed—is an index that an attachment to that person has been formed23. It should, of course, be noted that some separation environments are not necessarily regarded as threatening (e.g., well-supported daycare environments to which an infant or toddler has been carefully introduced [see R. Bowlby, this Issue]).

Following repeated social interactions with a given person during the earliest months of life, first attachments typically begin to appear between five and eight months of age. While no doubt often involving frequent infant-parent distress-comfort sequences, there is also evidence that particular kinds of infant-parent interactions, often involving quick, game-like interchange of response (i.e., contingent social interaction, such as, turn-by-turn vocalizations or “peek-a-boo”) form the background to the infant’s “selection” of its primary attachment figure(s) (Watson, 1972). Importantly, in the first systematic, observational study of infant-mother attachment conducted in Uganda in 1954–1955, Ainsworth (1967) reported that infants did not form attachments to mothers who provided only routine care (e.g., feeding or bathing absent social interaction).

Once an initial attachment has been formed, a second attachment to another person often soon follows, as reported in a study conducted in Scotland (Shaffer & Emerson, 1964). Ainsworth’s study of twenty-eight Ugandan babies showed similar results:
Nearly all the babies in this sample who became attached to their mothers during the period of time spanned by our observations became attached also to some other familiar figure—father, grandmother, or other adult in the household, or to an older sibling. In [some] instances babies became attached to adults or older children who took no part in routine care and even sometimes to persons who were not constant members of the household.

Ainsworth, 1967, pp. 351–352

Second attachments, then, often followed upon first attachments, not infrequently within a few months, and—in both Uganda and Scotland—the father was the individual most often selected (Ainsworth, 1967; Shaffer & Emerson, 1964).

Recently, some researchers have reported that fathers—while as capable as mothers in serving as comforting and sensitively responsive caregivers—tend especially to support exploration and play, thus guiding children’s entrance into the world in special ways (see R. Bowlby, this Issue; see also Nabera, van IJzendoorn, Deschamps, van Engeland, & Bakermans-Kranenburg, 2010). Following an initial emphasis upon the father’s special role in fostering security through “challenging play” (Grossmann et al., 2002), however, Grossmann, Grossmann, Kindler & Zimmermann (2008) have more recently emphasized that—while father’s role may often differ—either or both parents can foster secure attachment and exploration, and thus provide psychological security for the child.

Bowlby proposed that most children have a “primary” attachment figure, but that (a) this can certainly be the infant’s father rather than the mother and (b) non-related persons can readily become primary attachment figures. Hence, adoptions pose few special problems, although rates of security in the Strange Situation are somewhat less than for non-adoptive non-clinical samples—47% versus 67% (see Dozier & Rutter, 2008, for overview). Further, as noted, while infants may attend most openly to a particular person’s comings and goings, and in this sense have a “primary” figure, it is in fact the norm that one or more additional persons serve as attachment figures as well. In this Issue, Sroufe has discussed the biological or evolutionary rationale for the tendency of humans and other ground-living primate infants to organize their lives around a “primary” attachment figure, as this assists in making quick decisions regarding who to run to or call for in times of danger. However, Sroufe also notes that in the environments in which we evolved, having subsidiary attachment figures would have been of significant import, because, if the primary person was absent or less available at critical moments, the chance that a secondary person could be accessed would be greatly increased.

In adolescence and in adulthood new attachments are formed with friends and romantic partners, and have the same properties of both desire for proximity, and distress at separation, although these emotions are ordinarily experienced and displayed with less urgency (Hazan & Shaver, 1987; Mikolincer & Shaver, 2008; Shaver & Mikulincer, 2006). At these older ages, Bowlby’s broad definition of attachment figures (while seeming to refer especially to secure attachments) includes individuals who are conceived of as “stronger and wiser”, and sought in times of stress for advice and comfort. In well-functioning attachment relationships between adults, the role of the “stronger and wiser” individual is (unlike the child-adult attachment relationship) interchangeable as circumstances require.

SOME CENTRAL MISCONCEPTIONS REGARDING ATTACHMENT

As noted in the survey conducted for this Special Issue (see McIntosh, this Issue), misconceptions about attachment abound. We address what we regard to be particularly problematic notions in this section.

Misconceptions Regarding Time Spent and General Availability

An adult needs to have been present from the infant’s birth in order for the infant to form a secure attachment to that adult. As many contributors to this Issue make clear (see Guest Editor’s Introduction [McIntosh, this Issue]), provided a first attachment has been formed with one care-giver, new attachments to others—including, of course, secure attachments—can be formed well after the first years of life. New attachments commonly developing in adulthood can serve as a model here.
The “window of opportunity” for the formation of a secure attachment, endures only throughout the first three years of life. This misconception is probably (inaccurately) derived from orphanage studies, which show that if no attachment has been formed to any person during these years, the capacity for attachment formation may be permanently compromised (e.g., Bowlby, 1969/1982; Dozier & Rutter, 2008; Goldfarb, 1943, 1945). However, as noted directly above, if a first attachment has been formed in these early years, the developing child is readily able to form new attachments with others.

The amount of time spent with a child is the most important element in forming an enduring attachment relationship. Time spent with a child involving consistent social interaction and expressions of affection and interest is certainly of import to forming an enduring attachment relationship, and repeated bouts of time spent in this way will support the building of a secure attachment. However, sheer amount of time, absent such interactions, is not of equal value. As noted earlier, in her Uganda study Ainsworth (1967) observed that the parent’s responsiveness rather than physical care or simple amount of time spent with the infant was more likely to lead to attachment formation. Notably, in one case a little girl in Uganda who was primarily cared for by her mother was described as “non-attached” to her, while being attached to the father (see Watson, 1972).

Co-sleeping is necessary for the formation of a secure attachment. There appear to be no studies as yet indicating that consistent co-sleeping increases the likelihood of attachment security. At the same time, it is practiced in several countries, and in principle may increase night-time comfort. From retrospective accounts within the Adult Attachment Interview, we have noted that considerable comfort is afforded to a young child who has ready night access to the parent’s bedroom when distressed. And, certainly, parents’ sleeping quarters should be close enough to the child’s for the parent to both hear and promptly respond to calls or cries.

A young child needs more than one attachment figure readily available. This is optimal, but—especially in most contemporary environments—not necessary. Single parents can be successful in maintaining the security of their infant’s attachment if they are sensitive and responsive to its signals, able to encourage the child to face new challenges, and able to provide good care-giving arrangements in their absence. More fortunate single parents may be able to turn to reliable relatives, or friends. This reduction of stress can make it easier for a single parent to be responsive and sensitive when with the child. When a divorce is not too conflictual, the non-custodial parent can of course also be a source of help.

General Misconceptions Regarding Security versus Insecurity in Children and Adults

The great majority of parents, as well as infants, are secure. Depending on the analysis, it is, in fact, usually only a moderate majority of parents and infants who are classified as “secure.” When disorganized (infant) and unresolved (adult) attachment status is taken into consideration, the proportions of security are even lower. Consequently, it is inevitable that some children of non-separating parents will be raised in situations in which both parents are insecure. Nonetheless, insecure “organized” parents—specifically, dismissing and preoccupied parents—while limited in the expression of undistorted forms of affection, can and do usually provide adequate protection and care (see George & Solomon, 2008).

An infant who is insecure with a particular parent is not attached to them. There is no evidence that an infant insecure with a particular parent is any less attached to him or her than they would be if they were secure with that parent. An infant cannot afford to be without an attachment figure, and an infant in danger could hardly fail to seek its parenting figure, no matter what its security status (Sroufe, this Issue).

Infants cannot be attached to maltreating individuals. Attachments are not rationally based, but rather arise from biological (evolutionary) propensities to form specific ties to older, even if only potentially protective figures, rooted in the requirements of survival. Thus children raised by maltreating parents can be, and often are, attached to them. Nonetheless, note that, despite her extensive efforts to assist both parents in families afflicted by domestic violence, Lieberman (this Issue) finds
that termination of a child’s contact with an attachment figure who remains unremittingly threatening can be necessary in some cases.

Misconceptions Regarding Avoidance and “Detachment” in Children and Parents

Strength of attachment differs by classification: Children who avoid the parent under the stress of the Strange Situation procedure are less “attached”. As already noted, although some infants seen in the Strange Situation procedure are strongly preoccupied with the parent’s whereabouts, crying and seeking proximity at high levels, others in this unfamiliar setting fail to show distress on separation, and avoid the parent on reunion. While stress-related avoidance might ostensibly indicate a weaker attachment, in her Baltimore study of children observed in the home, Ainsworth found no evidence to suggest weaker attachment in children who avoided the parent, or “stronger” attachment in those who showed more distress. Avoidance of the parent in the Strange Situation was instead interpreted as evidence for a defensive process which appears in some attached infants under stress. Indeed, within the home, four out of six of Ainsworth’s “avoidant” Baltimore infants showed high degrees of separation distress even when the mother simply changed locations, a clear indication of early (insecure) attachment.

A child who avoids the parent on reunion, or is “distant” following a major separation, has lost interest in the parent. The phenomena of “detachment”, as identified by Robertson and Bowlby (1952), suggest underlying desperation, despair and anger regarding separation from a parent which has passed the limits of the child’s endurance. Following major separations, so long as the parent makes kind and persistent overtures to the child, avoidance is eventually overcome. In such cases (Bowlby, 1973, p. 13), hostility may be the first affect to reappear, after which—with continuing parental patience and understanding—affection and attachment behavior will begin to return. Although worries about further separation, and unpredictable bouts of aggression may be expected to continue, it is obvious that neither indicates a loss of interest.

Where parent and child have been separated for a long time, only the child will become “detached”. Unfortunately, parents as well as children are susceptible to detachment-like states in the face of long separations (Westheimer, 1970). This fact should be taken into account in making care-giving arrangements, and underscores the need for continuous and predictable visits by the non-custodial parent, in appropriate circumstances. These visits should be strongly supported by the court, by the child advocate, and by friends of the (original) family.

The child’s initial “avoidance” of a “visiting” parent seen in infancy and toddlerhood shows a growing lack of interest in that parent. The “visiting” parent should understand the likelihood of child avoidance following upon a separation even as brief as a few days. As already noted above in the History section, this is a self-protective action which is commonly shown towards loved parents who have been missed. Without an understanding of the phenomena of avoidance, the child’s lack of greeting, which Bowlby (we believe rightly) interpreted as “repression in the making” may mistakenly be taken as a lack of interest in the parent.

Non-residential parents may witness this kind of avoidance when first greeting and picking up the child during visitation periods, and for a time avoidance may unfortunately appear repeatedly upon reunions. It is necessary, then, for the visiting parent to understand that the child’s response is a natural occurrence, and that it is best to continue gentle expressions of affection—despite initial rebuff—until the avoidance is overcome. An ongoing “project” (see directly below) may be helpful in this regard, since parent and child can engage in joint attention to something “else” while avoidance gradually fades.

Taking a child out for a meal or to see a film is typically all that is needed during “visits”. Mutual engagement in simple impersonal activities are not sufficient to build and maintain a “real” relationship with a child. We suggest that one technique for reducing a child’s expectable avoidance, and also for mutually maintaining and developing the relationship between the non-residential parent and the child is to engage the child in a joint, ongoing project (e.g., putting together a large complex puzzle,
or building something), which will take several days and can be returned to until the child’s avoidance dissipates. Projects such as these, and/or planting a complex vegetable or flower garden, putting together a model (e.g., from model houses or airplanes to model railroads), sewing a quilt or items of clothing et alia give the parent and child something to discuss while separated, and something to focus on during the initial hours of reunion26. As a child ages, outings such as hiking or fishing are often much appreciated and long remembered.

**Misconceptions Regarding Disorganized (Child) and Unresolved/Disorganized (Adult) Attachment**

*Disorganized attachment status as seen in the Strange Situation procedure indicates maltreatment by the parent with whom the child has been observed.* This is a fallacy which is (a) surprisingly widespread and (b) dangerous to custody decisions, and likely originates in the fact that a strong majority of infants who have actually been maltreated are coded as “disorganized” (see Cyr et al., 2010).

But the reverse does not hold. That is, it is *not* the case that most infants who are classified as disorganized have been maltreated. As has been empirically demonstrated, disorganized infant Strange Situation behavior is often associated with interaction with a parent who is frightening to the infant (Main & Hesse, 1990; Hesse & Main, 1999, 2000, 2006). However, as noted, the system developed for identifying frightening parental behavior (Main & Hesse, 1991–2006) emphasizes not only threatening (although not maltreating), but also, and independently, frightened and dissociative behavior on the part of the parent.

The appearance of infant disorganization with a parent in the Strange Situation is indicative of the history of the relationship with that parent. As noted, frightened, dissociative, threatening and maltreating behaviors (as well as other anomalous forms of parental behavior [see Lyons-Ruth, Bronfman, & Parsons, 1999]) are frequently associated with infant disorganized behavior in the Strange Situation. However, in certain contexts excessive fear associated with the procedure—rather than the parent—can lead to disorganization, while in this case it may well be unrelated to parental behavior27. For example, in conjunction with some early Strange Situation investigations, in which separations were poorly monitored (i.e., the separations were not promptly curtailed when the infant was highly distressed), disorganized behavior appeared to be caused by excessive fear induced by the situation, and not by the parent. Examples included anomalous postures or falling to the floor observed when 12 month olds were left without the mother for markedly longer periods than the instructions directed.

Although other explanations are possible, these early findings may help to explain the greatly increased rates of “disorganized” classifications with the mother in infants raised by her but regularly spending weekends with the father, as first reported by Solomon & George (1999). Increased infant distress and dysregulation in this context has since been revealed via other methodologies (McIntosh, Smyth, Kelaher, Wells & Long, 2011). Many of these infants may have been overwhelmed by prolonged placement outside of the home, therefore becoming especially fearful when the mother left. An alternative explanation is of course that the mothers of these infants were frightened by the infant’s weekly leave-taking, or indeed by the father, and—albeit unknowingly—transmitted these fears to their infants in the home, yielding a disorganized outcome. However, the high rates of disorganization found in these infants perhaps most persuasively points towards simple heightened fear of separation.

*A child who is disorganized with both parents, both of whom are themselves unresolved/disorganized on the Adult Attachment Interview, should be considered for removal to foster care.* This is of course the case if, upon considering these disturbing results, the court (a) first requests further investigation and (b) subsequently finds that one or both parents are in fact violent or maltreating. If so, immediate if impermanent separation of child and parent may be considered necessary. (It is unlikely, however, that the court evaluator will have missed suspected maltreatment conditions earlier.)
However—while parental behavior should be re-examined in such cases, and possibilities of maltreatment be considered—it may simply be the case that both parents are in states of continuing fear due to their own traumatic experiences. This state of fright, as discussed above, may have led repeatedly to timid, frightened, or dissociated behavior in the presence of the child rather than to threat or maltreatment of the child. For example, in one research project, both parents of a specific participant had suffered serious early loss. Disorganized with both parents in infancy, this individual showed further indices of disorganized attachment at six years of age. However, on follow-up in late adolescence and in response to several paradigms presented at that time, this previously disorganized young man appeared to be doing well. School achievement was substantial, a fact about which he was modestly proud. The Adult Attachment Interview indicated only moderate insecurity and there were no signs of emotional disturbance. Removing this individual from his parents would clearly have been counter-indicated and most likely destructive.

With cases yielding family-wide disorganized classifications, the court (a) may, again, want to consider re-examination of the case for hidden maltreatment, or hidden violence between the parents and (b) unquestionably, recommend or order therapy for each family member.

Infants with a disorganized attachment classification are not likely to be amenable to intervention. A paper focusing on the effects of intervention in reducing disorganized infant attachment status (Bakermans-Kranenburg, van IJzendoorn, & Juffer, 2003) reported that intervention beginning after six months of age produced significant positive outcomes. Additionally, Bakermans-Kranenburg, van IJzendoorn & Juffer (2005) found that interventions aimed at enhancing maternal sensitivity and responsiveness markedly reduced infant disorganization, as compared to interventions lacking this characteristic. In 2006, Cicchetti, Toth and their colleagues conducted two exceptionally well-conducted intervention studies, the first with depressed mothers (Toth, Rogosch, Manly, & Cicchetti, 2006), and the second with mothers who were maltreating (Cicchetti, Rogosch, & Toth, 2006). In each study, Strange Situation procedures were conducted both before and after therapy offered to the mother, and results were compared to those for carefully selected comparison or “control” groups without therapy. In both studies, the reduction in “disorganized” Strange Situation classifications was remarkable. In addition, substantial increases in secure attachment were observed. As Cicchetti and colleagues conclude:

We believe that the results of this randomized prevention trial are both gratifying and sobering. The fact that plasticity is possible during infancy and that even the most disorganized form of attachment is modifiable in extremely dysfunctional mother–child dyads offers significant hope for thousands of young children and for their families.

Cicchetti et al., 2006, p. 646

Thus, a number of intervention studies have exhibited success in reducing the proportions of children judged disorganized. For example, in a study which utilized the Circle of Security intervention (Hoffmann, Marvin, Cooper, & Powell, 2006) with 65 toddlers and pre-school children, the proportions of disorganized children were reduced from 60% to 25%.

It is of interest that an important part of the Circle of Security intervention (Hoffmann et al., 2006) focuses upon each individual parent’s special fears. These studies can give substantial encouragement to parents whose children are disorganized in association with unresolved fear states, as discussed by Hesse and Main (2006).

Misconceptions Regarding Parents Classified as Insecure on the Adult Attachment Interview

Sensitive responsiveness is all that is required for good parenting throughout the early years of life. Ainsworth believed that during the first year of life, children’s “signals and communications” should be responded to, and that sensitive responsiveness will lead to a sense of agency as well as a sense of being loved (Ainsworth, 1967; Ainsworth et al., 1978). However, by the beginning of the second year of life she suggested that parents should begin “limit-setting” (Ainsworth, 1967, p. 448), and indeed that kind
and consistent limit-setting becomes critical at this point in time. We are in accord with this viewpoint, and by at least the third year of life, parents who are unable to set limits and provide structure for their children are likely to be creating new problems. Thus, an “insecure” parent who is good at providing structure and kind but firm limit-setting is contributing in important ways to the child’s future.

An insecure parent—i.e., one whose background presently limits or distorts their expressions of affectionate responsiveness—can do little to promote their child’s well-being. Many aspects of child well-being can be facilitated by parents in insecure states of mind. An insecure parent can, for example, demonstrate their interest in and ultimate affection for their child(ren) via engaging in activities such as “rough and tumble” play; encouraging and discussing friendships; consistent attendance at sporting (or other) events, with special encouragement forthcoming whenever the child or their team has “lost”; engaging in joint “projects”, as suggested above; and of course expressing interest (and providing assistance) in academic activities. In the absence of a parent’s own sense of security, these kinds of involvement in a child’s life should nonetheless contribute to the child’s sense of well-being.

Other Misconceptions

Differences in children’s relationships to parents, parental behavior towards children, and children’s attachment security can be explained by differences in genetic makeup.

We have already noted that attachment security has been found principally related to “shared” environment rather than to genetic inheritance (Bokhorst et al., 2003); see also (Vaughn et al., 2008)28. However an interesting and more subtle relation between attachment and genetics has recently appeared in the emerging recognition that individuals experience “differential susceptibility to the environment”, a hypothesis developed in conjunction with considerations of evolution/animal behavior (Belsky, 1997; Boyce & Ellis, 2005).

A link to a specific allele—and especially one relevant to parenting—was, however, lacking until Bakermans-Kranenburg and van IJzendoorn (2006, 2007) suggested that allelic variation in, for example, dopaminergic-related genes might act as susceptibility factors to differing parenting environments. Specifically, they suggested that variations in alleles of the DRD4 gene might lead some children to be more susceptible than others to their environments—whether positive or negative. Variations in this allele have been found related to variations in externalizing behavior, and—using an experimental design—to susceptibility to sensitive vs. insensitive parenting as well (Bakermans-Kranenburg & van IJzendoorn, 2011).

The parent who “looks” or “behaves” better in the clinical, mediation or court setting is likely to be the better parent. The parent who “looks” or “behaves” especially well in the public setting of the court may be no more able (or even less able) to provide a child with security than a parent who behaves poorly. This point has been underscored by Lieberman (this Issue) with respect to the well-known capacity for persons suffering from sociopathy to exhibit a masking charm and charisma. Lieberman (this Issue) also notes that where there is high conflict between parents, both parents are often participating in maintaining the conflict.

Children can be “overly” or “too strongly” attached to a particular parent. A child who seems to be “excessively ” attached to a particular parent may be manifesting anxiety—either because of such “external” factors as imminent or recent leave-taking on the part of the parent, or perhaps because the parent to whom they seem “too strongly” attached has been unpredictable in their responsiveness. Describing such a child as “too strongly” attached is neither meaningful nor relevant.

Only infants and children can be described as “attached”. As already noted, both Ainsworth and Bowlby pointed out that adults form, and maintain, attachments to other adults. First, like infants, adults seek comfort or counsel from their attachment figures when distressed, a parallel to the infant’s “flight to the parent as a haven of safety” (Hazan & Shaver, 1987; Mikolincer & Shaver, 2008; Shaver & Mikulincer, 2006). Second, in adults, bereavement frequently induces tremendous stress and longing for the lost person, neither of which can be readily alleviated by another (“interchangeable”) individual.
If a child exhibits distress upon being re-united with the residential parent, this indicates that there is something wrong in the relationship. Distress upon reunion with the primary caregiver can be an indication of difficulties in the relationship. However, reunion distress is frequently seen in secure children who are simply expressing how upsetting it was to be separated from a cherished person. Thus, without careful investigation, expressions of distress on the part of the child on reunion with the residential parent should not simply be assumed to be an indication of relational problems. As an example, in the Strange Situation context, secure infants who have not been crying during separation initially sometimes break down in distress upon reunion after only very brief separations.

III. THE JUDICIAL ROLE IN CUSTODY DECISIONS

The contributors to this Special Issue are united in their view that the primary function of judges making custody decisions is to protect, insofar as possible, the emotional security of the child. Fulfilling this “primary function” is inherently daunting, and can become all the more so because in most court hearings, attorneys are present to represent the parents, while the judge is by default frequently left as the sole advocate for the child. Moreover, unlike some (but not all) evaluators assigned to a given dispute, the judge will only rarely have had training in child development, attachment, or any other paradigm which could assist them in this often agonizing and emotionally straining process.

How to best assist the judge in this “primary task” has often been unclear. With respect to providing information to preserve children’s emotional security, however, the many contributions to this Special Issue will be of service. Drawing upon the preceding history of the field of attachment and the list of common misconceptions regarding attachment often held by lawyers (and parents) can also aid the judge in drawing independent and objective conclusions. Additionally, we suggest that judges (and their evaluators) not yet familiar with the Roberstons’ films of children undergoing major separations view one or more of these films as this will assist in gaining a deeper understanding of the impact which the outcome of some custody disputes may have upon a child, when separations are lengthy, untimely or ill-supported.

Further suggestions are made below pertaining to the judge’s role in educating parents; dealing with high conflict divorces; and drawing upon the information provided by assessments or measures derived from the field of attachment. Although the concerns and worries of the parents engaged in a custody dispute will almost inevitably reduce the child’s security while the dispute is ongoing, we believe that a judge sufficiently informed to make optimal decisions can assist in maintaining or establishing some reasonable degree of emotional security for the child. Judges will be greatly aided in their ability to achieve this goal if they assume an attitude towards the parents advocated by Bowlby:

Just as children are absolutely dependent upon their parents for subsistence, so are parents dependent upon a greater society. If a community values its children, it must cherish their parents.

Bowlby, 1951, p. 84.

The Judge’s Role in Educating Parents

Through the information supplied, and orders ultimately given, the judge holds a critical role in increasing parents’ understanding of what is necessary to preserve or enhance a child’s sense of security. Here we reiterate several of the conclusions made already by other contributors to this Issue, and summarized by its Editor. As well, we add some further suggestions for easing divorce related distress for parents and children.

- Young children (until approximately three years of age) should be assigned to primary custody with one parent (mother or father) with the non-custodial parent maintaining visits to the custodial home when appropriate, and where manageable, include brief excursions away from the home. There should be no sleepovers away from the primary parent for infants and toddlers,
except in emergencies (see below). In conducive circumstances, daytime visits and outings with the non-custodial parent should be regular and relatively frequent. We concur with Sroufe (this Issue) that for infants and toddlers, two short weekly visits, and one longer week-end visit (perhaps to the non-custodial parent’s home) are ideal. This level of frequency of contact not only promotes the development of the child’s attachment to the non-custodial parent, but also assists that parent in maintaining ties to the child themselves, despite their move to a new home and, potentially, the creation of a new family as well.

• Once a child is between two and three years of age, occasional (initially, fairly widely separated) overnight visits may gradually be initiated, but the child’s response should be closely monitored. We are in agreement with Sroufe (this Issue) that no exact times for beginning whole-day or overnight visits can be established without case-by-case consideration, e.g., on the child’s level of cognitive and language development. The child’s ability to fully understand that they will shortly be returned to the custodial home is a critical pre-requisite to overnight visits, as is the child’s observed reaction. Note then that some children, despite their ability to understand that they will shortly be returned to the other parent, may take longer to feel “comfortable” with overnight visitation than others.

• Circumstances may arise wherein the custodial parent may need to temporarily leave the child’s care to the secondary parent—e.g., in the case of medical emergency—providing that the second parent is already a source of comfort to the child. Under these conditions, visits to the non-custodial home by persons familiar to the child in the residential home (e.g., a relative or close personal friend of the parent assigned primary custody, who is not antagonistic towards the other parent) may be of assistance. Reassuring items reminding the child of, and usually brought from, the residential home may also be of service.

• In the early years, divorced parents should live within easy commuting distance, as this will greatly facilitate the potential for the visiting parent to develop their relationship with the child. Close commuting distance is critical to ensuring the continuity of visits, as well as, eventually, reducing strain on the child during travel. For many reasons, relatively close residential arrangements remain important during middle childhood as well, including the fact that the child will thereby know that, should an emergency arise, each parent can in principle be readily accessed. As the child matures and can travel alone, however, greater distances between the parents, while not ideal, may be tolerable.

• Special reminders of each parent—such as trinkets, photographs, letters, or any other mementos desired by the child—should be available to the child once alternating visits between homes have begun. While the child should select as many keepsakes as they wish to accompany them during their transition between homes, ensuring the well-being of these objects, as well as their appropriate alternation between residences is of course essential to good parental management of the transition process.

• The contributors to this Issue have noted that persons additional to the parents may in fact become of special import in conjunction with a divorce, and a judge should enquire whether kin, hired caregivers, or nannies will be frequently visiting, or indeed living with one of the parents. These persons can potentially give a child access to someone who is less hostile towards and emotionally involved with the second parent than the parent with whom they are living. These persons will hopefully be able to avoid “taking sides” in the divorce, thereby easing the strain on the child.

• There is a caveat, however: if kin or other caregivers become secondary attachment figures, then as in the case of all other attachment figures, it is important that court orders and decisions support their ongoing contact with the child, so that these persons do not summarily disappear. Such a leave-taking would be especially detrimental to the child’s security since one parent has already left the home. Should, for example, live-in kin or nannies to whom the child has formed an attachment need to depart, careful and gradual withdrawal is necessary. Insofar as possible, the leave-taking should be well explained by both the parents and the “other attachment figure(s)” themselves.
We re-iterate the import of the comfort that can be potentially provided to parents assigned to “secondary” custody. The window of opportunity for their child to form an enduring attachment to them will not have closed by three years (see Misconceptions above). Moreover, with regular, optimally thrice-weekly visits in infancy by a playful, active, affectionate parent, an attachment will begin to form considerably earlier.

It is an unfortunate but well-known fact that parents assigned to the “visiting” role all too often fail to make the repeated contacts with the child as they had initially desired, and after two years may have very little contact at all. Here, recent studies by leaders in the field of custody are providing encouraging findings, dependent upon mediation taking place at the time of separation. These findings may help judges in their continuing education of distressed parents, and increase the likelihood of continued contact by the visiting parent. For example Emery (2011) has recently reviewed his longitudinal finding that, twelve years after random assignment to mediation or litigation, non-residential parents who had mediated their parenting dispute saw their children far more often than parents who settled via an adversarial process, and additionally had improved their parenting. Co-parents who mediated reported significantly less conflict. Similarly, McIntosh et al. (2008b, 2009) found that a child inclusive mediation process (where the evaluator interviewed the child independently and then gave select feedback to the parents about the child’s experiences and needs) had significant advantages over a process that simply educated parents about the ill effects of conflict upon their children. Four years post mediation, children whose parents were allocated to the child inclusive intervention rated their fathers as significantly more emotionally available to them. Surprisingly, rates of contact with the non-residential parent in the child inclusive group grew steadily over the four years, in contrast to a sporadic pattern of trial and error in the straight education group.

At times, the judge will have the opportunity to discuss with one or both parents the fact that their child has been assessed as “disorganized”, and/or that they have themselves been assessed as “unresolved/disorganized” on the Adult Attachment Interview, which, as discussed above, increases the probability of child disorganization. Here it may be useful to remind the parents that, although disorganized attachment is a known risk factor for children, recent studies of parental engagement in therapy have been found to reduce child disorganized attachment (see again, e.g., Hoffmann et al., 2006; Toth et al., 2006). This information provides an opportunity for the judge who does order therapy in such cases to provide considerable encouragement regarding the likelihood of a positive outcome.

Special Difficulties: Dealing with High-Conflict Divorce

High-conflict divorces present unique problems for judges. In such cases, the parents are not infrequently tens of thousands of dollars to their attorneys (McIntosh, personal communication, 2011), and the mutual strain and distress between these persons—persons once hopeful enough of a continuing commitment to have embarked on having a child—can lead to outbursts of anger which are unseemly in the eyes of the court. In such instances, the judge should remember that the principles of attachment apply in adulthood as well. To one, or perhaps both parents, the “opposing” parent was usually once (at the least a hoped-for) haven of safety, strength, and solace, but may now be a source of distress or alarm. Thus, anger may in fact mask fright, and arise in conjunction with disorganized states, as well as despair.

We make the following recommendations specific to high-conflict divorce:

It is paramount to reduce the adversarial nature of the proceedings to the greatest extent possible, so that the child’s interests do not get lost in the resolution of the disputes between the parents. This is especially important since parental conflict—irrespective of divorce—is known to have adverse effects on children (Kelly, 2000). Given that judges normally command the respect of the litigants before them, this may be achieved by strategic intervention should the proceedings become intolerably contentious (e.g., McIntosh, Bryant, & Murray, 2008a).
• A child therapist (or at least, a child advocate) should be appointed in cases of ongoing conflict, and this person should be available to the child for a period of several years. Depending upon the child’s needs and the resources available, it would be important for the child to have the opportunity to see the therapist on a regular basis, i.e., at least weekly.

• Transfers between residences will often be difficult, and we recommend that—as frequently as possible—the parents provide an agreed-upon person (perhaps kin, a friend recognized by both parents and child as not having taken “sides” in the divorce, or an independent contact supervisor) to accompany the child. These individuals can provide a “transitional space”, in which the child can discuss both their time with the parent they have just left, and their forthcoming time with the parent whose home they are approaching. We emphasize the importance of allowing sufficient time for discussion with the child about each difficult transitional move.

• In some high-conflict divorces, one parent may be accused of an implacable hostility towards the other parent, which is purportedly communicated to the child in a deliberate attempt to interfere with and harm the relationship with the other parent. When marked, the first parent is said to be attempting to “alienate” the child from the second parent, and indeed essentially to both arouse and perpetuate fear or anger towards them. While we agree with Emery et al. (2005), that “parental alienation syndrome” is not a diagnosis as averred by Gardner (2001), should the hostility of one parent toward the other be determined by independent professional observers to be chronic and destructive, some form of intervention is required. If it is the residential parent who is behaving destructively with respect to the child’s relationship with the visiting parent, the residential parent should be assigned to individual therapy. From an attachment perspective, it seems important as well (a) to allow for visits that provide compensatory time for “repair” between the child and the parent whose relationship appears to be have been interfered with, (b) for the residential parent to be forbidden interference with communications between the visiting parent and child, including the reading of text, email or Skype contacts, at risk of penalty, and, (c) optimally, to agree to engagement in family therapy when the situation abates. If there is a lack of compliance with these strictures, an unfortunate but necessary compromise may be to move the child to the custody of the visiting parent.

Should the situation be reversed, i.e., if it is the visiting parent who is determined by the Court to be notably destructive with respect to the child’s relationship with the other parent, a first step is for visits to be limited or supervised, and for communications between the child and the visiting parent to be overseen by a professional third party. Therapy should of course also be implemented. A child advocate or therapist is, as noted, critical under both of these conditions, and—presuming the situation has not reached an extreme in which visitation or custody are terminated—the child must be assured that they are believed to be safe with both parents, as unpleasant as the situation is.

• We have not addressed the issue of divorces in which one parent has been substantially physically violent to the other, whether or not this has occurred in the presence of the child. Here we are in agreement with Lieberman (this Issue) that any possibility of the child witnessing or experiencing abuse must be prevented, and joint custody of course cannot be assigned. Under some conditions, visitation can occur, but must be professionally supervised. If the violent parent remains emotionally or behaviorally threatening, visits should be suspended until the results of clinical intervention are judged to provide realistic hope for change.

The Use of Attachment Assessments Supplemental to High-Quality Clinical Evaluations

In many divorce cases, but perhaps especially in a high-conflict divorce, the judge will typically rely in good part upon opinions provided by court-appointed specialists—often clinicians who, while offering some background in child development and attachment to the court, can also provide descriptions of the special difficulties faced by a particular family. These clinicians must be sufficiently informed to know when they need additional expertise, and where and how to obtain it. Of
course, the resources available to the judge in need of such specialists will depend on what is designated by local law and what the local budget permits.

Regarding assessment more specifically, the instructions for learning to conduct the Q-sort have been exceptionally well described on Everett Waters’ website (www.johnbowlby.com), and a forthcoming book will describe the procedures as well (Waters, Waters & Vaughn, in press). The two other well-validated attachment measures, strongly recommended in this monograph, the Strange Situation and the Adult Attachment Interview, and each require training both for administration and analysis.

It would be optimal if custody evaluators—and indeed, where possible, mediators and attorneys—not yet familiarized with the latter two measures find themselves able to attend trainings for the purposes of learning administration (which is highly instructive in itself) and where time permits, become certified in these procedures as well. A description of these measures is available in the Appendix, which provides contacts for locating certified trainers in the Strange Situation and the Adult Attachment Interview as well as means for identifying certified coders with sufficient expertise and experience to apply their existing knowledge to the “individual” context necessitated by the courts. Thus, far from advocating that the central measures of attachment remain within the province of academia, the writers—together with the Editor for this Special Issue, Jennifer McIntosh—endorse the view that these methods should find solid, widespread clinical application in the custody arena. However, evaluators interested in training should be certain that they are undertaking this endeavor with a certified trainer (see cautionary notes in the Appendix).

Avoid Use of Adversarial Experts Whenever Possible

Judges dealing with parents involved in high-conflict custody disputes are often faced with conflicting assessments from “experts” regarding the characteristics of each parent and the child. These experts are usually retained by attorneys, in the service of the parents. As noted earlier, we suggest that, rather than allowing each parent to call upon their own “expert” witness-advocates, that specialists be retained and utilized solely by the court. These specialists will then assemble a comprehensive profile of the situation, independent of the parties involved. We recommend that updated lists be kept by court-appointed assessors of individuals known to have established broad expertise in the administration and formal classification of any of the specified attachment measures being employed.

Specific suggestions are as follows:

The court should retain one or two persons whose expertise in custody assessment will allow them access to whatever battery of experts are deemed necessary to help the judge reach an optimal conclusion about the present capabilities of each parent, especially with respect to providing the child with a secure environment. While more traditional assessments (such as the Rorschach) may well continue to be used, attachment methodology will often be utilized.

Note, however, that while the court-appointed assessor or evaluator should normally be qualified to administer the relevant attachment procedures, the results of each procedure excepting the Q-sort should be sent to a qualified independent specialist for formal classification. When more than one such attachment assessment can be obtained, each measure must be coded independently, by separate qualified experts (see Appendix), none of whom have knowledge of the outcome of the assessments made by others dealing with the same case. Additionally, formal assessments resulting from the analysis of attachment procedures should be presented to the court independent of, albeit in conjunction with, any similar or contrasting views of the court evaluator.

Further Consideration of Validated Attachment Measures

As we have already discussed, given the import to parents and children of custody decisions made by the court, the primary measures utilized should be those which come as close as is possible to providing “scientific evidence” regarding their power to predict child security or insecurity. Again,
then, when evaluating individuals via attachment measures, more than one assessment should be utilized for any given dyad wherever possible, so that “converging validity” with regard to an individual’s “attachment status” can be established. At present, for example, from ten months to five years, two of the three major procedures are continually available, and from 12 to 18 months, all three assessments can be conducted. When only two are available (i.e., the Adult Attachment Interview and the Q-Sort) the “second” measure can be extended, i.e., two “extra” home visits can be conducted. Specialists asked to assess children over age five can continue to conduct the Adult Attachment Interview with the parents, but should elect to add other “clinical” tools presently used with children for corroboration, including some of the “emerging” attachment measures not yet satisfactorily validated or subjected to meta-analyses (see Appendix).

Finally, in the case of custody arrangements, with the exception of the Q-sort, which is exclusively dimensional (i.e., does not use categories such as secure, avoidant et cetera but rather provides a specific number representing degree of security)33, every measure selected should have been tested several times for its ability to identify disorganized attachment.

Five Caveats with Respect to the Assessment of Attachment in the Custody Context

(1) Give strongest weight to the presentation of the “gold standard” measures, although others can be considered in addition.

At this time, we recommend that both custody evaluators and judges assign the greatest weight to the results of assessments utilizing the central measures—the Attachment Q-Sort, the Strange Situation, and the Adult Attachment Interview. However, while all three have been subjected to meta-analyses, they have far more frequently or reliably been used with mothers than fathers, and attachment researchers must enlarge their studies of fathers before any of these measures can be presented as “scientific evidence” regarding most custody disputes.

Several other attachment measures may be included in the evaluator’s assessments, albeit with lesser “weight”. Among these are the Sixth-Year Reunion procedure (Main & Cassidy, 1988) and the Preschool Attachment Assessment (Cassidy & Marvin, 1992). These measures are promising, but each remains in need of meta-analysis and psychometric testing, including tests of stability34. Until then, they can provide rich, standardized observational data, and can be treated as such to usefully “round out” an evaluator’s assessment. Another measure which custody evaluators have long utilized is doll play, usually based upon some variant of Bretherton’s (Bretherton, Ridgeway & Cassidy, 1990) five-story Attachment Story Completion Task, sometimes termed the ASCT. As noted in the Appendix, Bretherton and her colleagues are presently beginning work on developing a standardized set of stories, together with the relation of these to the four established child attachment classifications (secure, avoidant, ambivalent and disorganized).

For adults, custody evaluators may also wish to query and alertly listen to parents’ complementary discussion of their experiences and attitudes regarding their role as their child’s caregiver. A particularly useful protocol for such an examination is the Parent Development Interview (Slade, Aber, Bresgi, Berger, & Kaplan, 2004; Slade, Bernbach, Grienenberger, Levy, & Locker, 2005; see also the Caregiving Interview [George & Solomon, 1988/1993/2005/2007], a modification of the Parent Development Interview) and the Working Model of the Child Interview (Zeanah, Benoit, & Barton, 1986/1993). These interviews can be highly useful aides to the custody evaluator’s understanding of the dyad.

Although the attachment component of a custody evaluation is considered to form only part of the basis for the evaluator’s assessment, circumstances arise where attachment measures “sway the balance” of the evaluator’s recommendations. This in itself explains why, insofar as attachment measures are utilized, the greatest weight should be given to the three assessments which have been tested in the greatest number of laboratories.

(2) Protect parental privacy

Most of the questions within the Adult Attachment Interview focus upon an individual’s history with their parents or parental figures, and what the individual sees as the effects of that history.
Other queries focus on experiences of loss, abuse (physical or sexual), and any additional potentially frightening events. It is obvious that responses to these queries may not only be private to the speaker, but also to their family, whose privacy they may wish to protect. Further, revealing experiences of physical or sexual abuse leaves the individual vulnerable to the contention that such experiences increase the likelihood that offspring will be similarly treated.

In part because it is likely to greatly increase the validity of the Adult Attachment Interview if the parent feels free to discuss their past, we urge the court to advise that both parents agree to a binding and enduring waiver of access to the actual words/contents of one another’s interviews, i.e., to both the transcripts of their interviews and the original recording. Thus the attorneys for both parties, with the assistance of the court, should provide written agreements waiving access to their client’s as well as the opposing parent’s interview contents in the immediate proceedings and in any future proceedings. This waiver should include assurance that only the interviewer (often, the court evaluator) will have “heard” the interview, and is under court instruction never to divulge its contents (indeed, any court evaluators conducting interviews should sign a waiver to this effect in the presence of the parent to be interviewed). The waiver should also include assurance that both the transcription of the interview and its analysis will be conducted by persons who will have no access to the speaker’s identity. Moreover, the coders for the interview will agree, in writing, to return the transcript, unduplicated, to the court.

What will be made available will then be only the classification and scoring of the interview, and scores for unresolved status (with respect to loss, or to sexual or physical abuse) will be given under the single heading of “unresolved for potentially frightening events”. The speaker will of course be reminded that the interview contents cannot be legally kept confidential if serious crimes or serious threats to safety are described.

We believe that such a waiver is necessary not only because the assurance of privacy should increase the validity of the Adult Attachment Interview, but also that it is morally required because the person being interviewed cannot know in advance what they are going to be asked, or how they are going to respond. (The signed agreement may include an acknowledgment that the interview will not be made available to the parent, or subject to subpoena.)

(3) Maintain ecological validity

Maintaining as much ecological validity as possible—i.e., approximation to experiences which might be met with outside of the custody context—is critical when the standard procedures of attachment assessment (none of them designed for divorcing parents in high conflict) are applied to the custody context. In the case of high-conflict divorce, those administering the procedures must take special care that insofar as possible they do not impose strains on parent or child, over and above those already created by the condition of divorce. For example, in that brief separations from parents in pleasant circumstances do occur in everyday life, the Strange Situation procedure usually retains substantial ecological validity. But, child results may be distorted if the parent experiences an unusual level of anxiety during the procedure, possibly attributable to fear about the assessment outcome. With respect to the Q-sort, while parents are instructed to “behave as they normally would” in their homes, the added aspect of evaluation for the courts may make this difficult. Finally, the intense sequence of questions which comprise the Adult Attachment Interview are designed to elicit the individual’s “current state of mind with respect to attachment” within the research context. However, the additional stress compounded by the court evaluation process may distort the outcome. Thus, this cautioning is appropriate at the present stage of our experience:

... Measures that have been shown to be reliable and valid outside of a custody evaluation context may not be valid when used in a custody evaluation. This is another way of saying that there are dangers of using psychological tests for purposes for which they were not developed, as noted in the American Psychological Association’s (1994) guidelines.

Byrne et al., 2005, p. 117

One of the most important allies which the court has in creating conditions less likely to violate the ecological validity of attachment measures is the comfortable relationship which the court assessor
may have been able to establish with the parents. The Q-sort procedure can be conducted in the home, and providing that—with professional limits—a positive, relaxed relationship has already been established between the parent and the evaluator, the results of this procedure may have some reasonable opportunity for approaching what would be considered “valid” in the research context.

Custody evaluators will need to attend carefully to providing as comfortable an atmosphere as possible for the Strange Situation. It is almost unavoidable that divorcing parents participating in a Strange Situation will be under extraordinary strain, and the question to be asked is whether they are able to nonetheless maintain their usual pattern of responsiveness. The court evaluator should spend a relaxed time with the parent in their usual meeting place before taking them to the room in which the Strange Situation procedure is to be conducted. The evaluator should also make sure that the parent is familiar enough with the procedure that fear of making a wrong move—e.g., leaving or returning at the wrong time—is eliminated. Although the evaluator cannot say this, because it may not be true, the “atmosphere” set for the parent should be confident (an unspoken “you’ll do fine”). Finally, it is the evaluator’s duty to make sure that no recent stressful separations have impinged upon the child, including a Strange Situation procedure conducted with the second parent within the last few weeks. As noted earlier, such experiences can yield disorganized behavior without in fact reflecting the history of parent-child interactions.

Similarly, Adult Attachment Interviews conducted as part of custody evaluations should be administered in a natural, but professional manner, and court assessors or the persons they retain should have sufficient training in the method to be relaxed and confident while asking the questions and follow-up probes from memory. As in the case of the Strange Situation procedure, at least 15 minutes should be spent establishing or re-establishing a positive relation with the parent prior to the administration of the Adult Attachment Interview.

(4) Present assessments clearly and accurately

Each assessment which we have reason to consider “validated” (above) comes with its own requirements for presentation to the judge. There will be times, unfortunately, when the “overview” report delivered to the judge by a less experienced clinician may be incomplete, pejorative with respect to parents, or because of excessive clinical language rendered too vague for interpretation. Therefore, each assessment—again, made by independent experts—must include a useful, and ultimately a standardized form of write-up.

(5) Consider contextual factors

As with the employment of any psychological measures, there will be times when seemingly valid results of attachment based assessments must be over-ridden by known contextual factors. For example, a father is clearly secure as assessed on the Adult Attachment Interview, and the child is assessed as secure with him, while the mother is assessed as insecure and the child is assessed as insecure with her as well. However, the father works long hours and has a new relationship with a partner who does not welcome the idea of caring for his children. Here, the daunting task of the custody evaluator is to weigh and measure the results of the attachment procedures with the remainder of the clinical material and the pragmatics presented by the situation.

In the end, specialized findings by experts in attachment assessments will aid substantially in the clinician’s evaluation of the case, and in turn, the court’s ruling. However, attachment assessments can only supplement, rather than supplant, the opinions of well-trained clinicians, and no single assessment, or even set of attachment assessments, should be considered outside of the clinician’s wider contextual vantage-point. Not only do circumstances alter cases but also, court assessors who have engaged in extensive interviews and observations may not always agree with the results of the attachment assessments.

IV. BRIEF CONCLUDING REMARKS

Custody decisions place a judge in an extraordinarily challenging position, and the associated concern for parents’ and children’s outcomes is immense. One of the conclusions that can be drawn
from the many papers in this Special Issue is that a judge will seldom be able to arrive at an order without an accompanying sense of compromise and imperfection. The process of custody decision—especially when the situation is contentious—is so complex that it is ordinarily beyond the judge’s power to both protect the child’s sense of security, and make decisions which do not cause regrettable pain to one or both of the parents.

The contributors to this Special Issue have strongly urged that the well-being of the child must take precedence over all else during this process, and in consequence, hope to have helped to reduce some of the stress involved in the decision-making process confronting the court. Nevertheless, judges will find themselves, time and again, forced to craft a custody order which they do not feel completely fulfills even this primary requirement. Happily, however, the judge can maintain continuing control, and can require further reviews in which previous decisions are checked against current outcomes. Attachment theory, and the accompanying methods of assessment recommended here can, we believe, assist in these difficult endeavors.

V. APPENDIX

In the History section which opened this monograph, we provided a brief description of each of the three central measures in the field of attachment: the Attachment Q-sort, the Strange Situation procedure, and the Adult Attachment Interview. In this section, we describe where guidance to the use of and (where applicable) certification in each of these measures can be obtained and—where direct training is required—provide a brief overview of the training (and certification) procedure itself. We also indicate where certified trainers, as well as coders, can be located. We then describe three presently “emerging”—and to us, especially promising—measures at greater length. We end by emphasizing the ways in which the “gold standard” attachment measures—if found applicable to the court as to the research setting—may assist the evaluator in developing a sense of a parent’s present ability to provide sensitive care and accordingly, offspring security.

A detailed description of the Attachment Q-sort procedure is available on Everett Water’s web-site (www.johnbowly.com), and should be read with care by anyone planning to undertake this structured form of home observation and assessment. As van IJzendoorn et al.’s meta-analysis has made clear (2004), only Q-sorts conducted in the home, and by observers (not by the parents) can be considered reliable. The website includes instructions on pre-training practice for making these structured observations, as well as instructions for conducting and analyzing them. These should be studied carefully, since as Waters makes clear, the Q-set items must be well understood (or even memorized) prior to undertaking the home observation so that the “observer” knows which aspects of behavior are most critical to look for. In addition, the observers themselves are instructed not merely to quietly observe, but also to occasionally be subtly “active” at times with child and parent.

Waters’ ideal had initially been three visits to the home, each lasting about three hours, and structured as follows: on the first, one observer visits; on the next; the first observer visits together with a second observer; on the third, the second observer visits alone, and the results across observations are combined into a final score. While this much visitation may not be required for research purposes, it is strongly advised in the custody context.

The Strange Situation procedure has been described in some detail in the History section of this monograph. A more specific description of the procedure itself as well as differing infant behavioral responses can be found in Main (2000) as well as Hesse and Main (2000). Regular trainings in the Strange Situation procedure are held yearly by Alan Sroufe and Elizabeth Carlson at the University of Minnesota. Here, participants are presented with and work through Strange Situation films of secure, insecure-avoidant and insecure-ambivalent infants during the first week, and of disorganized infants in the second. Information regarding these two-week trainings as well as descriptions of the follow-up certification process requiring four-category agreement across 30 cases (recorded on DVD) can be obtained from Dr. Alan Sroufe (srouf001@umn.edu).

Training in the analysis of transcripts of the Adult Attachment Interview takes place over a two-week period, and for attendees who wish to proceed to certification, a 30-case reliability test is
undertaken across the course of 15–18 months, with about 10–12 cases being coded during each six month period. There are a total of 11 trainers, each listed on Everett Waters’ web-site, www.john-bowlby.com, together with their accompanying e-mail addresses. Information regarding dates and locations of upcoming trainings, and new trainers are also posted, and updated as needed. The list of trainers can also be obtained from Dr. Naomi Griebneau Bahm, whose email is listed directly below.

Finding qualified AAI coders, and using validated coding systems. AAI training and certification should be obtained from one of the certified trainers listed on the above website. Individuals or courts wishing to obtain a copy of the Adult Attachment Interview protocol (which includes extensive directions for its administration), as well as individuals interested in training or practice in conducting the interview should contact Dr. Naomi Griebneau Bahm (attcourt@gmail.com).

As regards coding Adult Attachment Interviews for the courts, the experience and practice required for such assessments exceeds that which is needed in the research context. At the time of this writing, requisites for this level of coding are being further considered, and will be established as soon as possible. In the meantime, persons looking for coders with sufficient expertise in the analysis of Adult Attachment Interviews to code for the courts should contact Dr. Griebneau Bahm.

Cautionary Notes. The popularity of the Strange Situation and of the Adult Attachment Interview have recently led to a number of uncertified, and indeed often untrained individuals offering institutes in both systems, some of whom may supply self-devised reliability tests for agreement with the “trainer”. There are obvious problems with this in the context of the courts. We caution that any Strange Situation or Adult Attachment Interview classifications presented to the court from uncertified trainers or coders, or offering classifications based on “Strange-Situation-like” procedures or “AAI-like” interviews—and/or offering classifications based on “new” classificatory systems for use with the original procedures—will not have the validity which has been acquired through the meta-analyses of relations to child security and parental responsiveness presented above. Such tools would therefore not be considered as having met the requisites described in this paper for assessing either child or adult attachment status. Finally, we repeat the caveat found within the Judicial section. No interview should be conducted until the requisite privacy waiver(s) are signed.

Emerging Systems for Assessing Attachment Security from Preschool to Middle Childhood

Separation-Reunion procedures for 3 to 7 years olds. In conjunction with their study of the Berkeley Social Development Project sample, Main and Cassidy (1988) devised a sixth year reunion procedure, in which 5 to 7 year olds were filmed in a laboratory room both throughout an extended period of play with a well-trained child examiner, and as their parents returned to sign forms and ready them for leave-taking. Remarkable variation in child response to this casual reunion with each parent was observed, and a four-category system of analysis of reunion response (secure, avoidant, ambivalent, and “D-controlling”, sometimes called controlling/disorganized) was developed (Main et al., 1985: Main & Cassidy, 1988). A small (four-study) meta-analysis showed strong prediction of secure vs. insecure responses to reunion with the mother at age six from secure vs. insecure responses to her in infancy (Fraley, 2002), as did another study (Gloger-Tippelt, Gomille, Konig & Vetter, 2002).

The Main and Cassidy classification system for six-year olds has been slightly modified and extended “downwards” to pre-school age children by Cassidy & Marvin (1992), and—termed the Preschool Attachment Assessment—has been found related to expectable aspects of social-emotional development, and has shown markedly strong relations to externalizing behavior across nine samples (Fearon et al., 2010). However—and somewhat surprisingly, given the strong first to sixth-year relations being established for the sixth-year system—Solomon & George (2008, p. 398) report relatively low continuity from infancy Strange Situations to the Preschool Attachment Assessment. Persons considering using either of these systems should first familiarize themselves with both their strengths and limitations as described by Solomon & George (2008, pp. 392–399). Continued work with both systems is underway.

Doll Play: the Attachment Story Completion Task (ASCT) for 3–8 year olds. Doll play procedures are frequently utilized in child custody assessments, and in our view stand as one of the most
potentially important of available child attachment measures. Thus, for example, whereas we have noted that parental worries regarding the Strange Situation within the custody context could negatively influence infant Strange Situation behavior, doll play procedures are less vulnerable to spurious outcomes, being conducted in the absence of the parent.

The use of doll play procedures in conjunction with attachment assessment originated in 1986, when Bretherton and Ridgeway developed and pilot-tested the ASCT (published several years following, see Bretherton et al., 1990). The ASCT consists of five story beginnings or “stems” regarding an event designed to elicit child-parent attachment behavior and/or parental care-giving at the representational level (a child causes a mishap at the dinner table, a child falls off a rock in the park, a child encounters a monster on going to bed, or the parents leave while the grandmother babysits and the parents return the next day). An interviewer narrates and enacts these stems with small family figures. As opposed to sheerly “projective” methods of assessment, then, the story-stems given to the child are descriptions of real-life situations, which are followed by the invitation “show me and tell me what happens next”. In the original study, story stem responses predicted differences only at the secure-insecure level (Bretherton et al., 1990) but studies reviewed since by Bretherton (personal communication, June 18, 2011) indicate that child disorganization can now be predicted (via the child’s telling of chaotic, bizarre stories) as well. A consensus coding system for the ASCT has not yet been established, but Bretherton and others working successfully with this system hope to develop both a training DVD, and eventually reliability checks which can be forwarded to users, again via DVD. The fact that a variety of story-stem doll play coding systems (although building on each other and based on similar underlying principles) have already yielded significant correlations with other validated attachment measures attests to the potential value of this procedure for child custody evaluations.

Inge Bretherton (ibrether@wisc.edu) can be consulted regarding doll play assessments, as can her collaborators: Timothy F. Page (tpage2@lsu.edu) and Angel L. Gullon-Rivera (gullonrivera@wisc.edu).

Child Security as Seen through Multiple Lenses: The Work of Meta-Analyses

To conclude, we reiterate that a child’s attachment security with a given parent can be assessed either directly via their response to that parent (as in “secure” Strange Situation responses observed in the laboratory, or “secure-base” behavior observed in the home) or indirectly, by observations of the parent’s care-giving behavior with the child (i.e., the parent’s responsiveness or sensitivity). The three central measures subjected to meta-analyses and recommended here have been shown to predict care-giving as well as child security, and have done so across multiple studies. The results of these studies can be summarized on the basis of the following meta-analyses conducted at Leiden University by Marinus van IJzendoorn and his colleagues:

(1) Infant security in the Strange Situation with the mother has been found significantly predicted by the mother’s sensitivity to infant signals and communications at a moderate level across 16 studies when researchers have used systems of assessing security comparable to Ainsworth’s (de Wolff & van IJzendoorn, 1997), and have been found related to the father’s sensitivity across 8 studies at a weaker but still significant level (van IJzendoorn & DeWolff, 1997).

(2) The Attachment Q-sort, when assessed by observers focusing upon secure-base behavior in the parent’s presence in natural environments, has been found impressively predictive of both Strange Situation behavior with the mother in 17 samples, and maternal sensitivity to the infant in 18 samples (see van IJzendoorn et al., 2004).

(3) The Adult Attachment Interview has been found very strongly predictive of infant Strange Situation behavior to the parent across 18 samples, and strongly predictive of the parent’s observed responsiveness to the offspring in 10 further samples (van IJzendoorn, 1995). A strong majority of these studies focused upon mother-child dyads.
But why should we recommend measures which have simply tied one estimate of the probability of child security/parental sensitivity to another, and advocate use of more than one measure of this kind? The answer lies in the necessary adherence to the principle that, especially where individual lives are concerned, providing converging evidence—i.e., regarding the likelihood of child security vs. insecurity with a given parent—is a necessity. It seems doubtful that any parent would wish to have the “attachment” portion of the evaluator’s assessment depend upon a single measure, whenever additional measures—perhaps converging, perhaps diverging, but in either case available to the further deliberations of the evaluator and the court—are available. One estimate (such as the infant’s Strange Situation response) taken on one particularly “bad” day might make a parent look unable to provide security to their child—whereas, with the Adult Attachment Interview added in, together with Q-sorted home observations, an impression of security may prevail.

NOTES

* Mary Main and Erik Hesse gratefully acknowledge the Amini Foundation for the Study of Affects for their generous funding of their work in attachment across the past decade. As well, they thank their friends of many years, Judith and Robert Wallerstein, for their repeated suggestions that it would be desirable to add an “applied” element to their theoretical and research work. They thank Judith Wallerstein in particular for introducing them to Jenn McIntosh, the editor for this Special Issue. We hope that this now completed monograph in part fulfills their wishes. Finally, with Siegfried Hesse, we thank Dr. Naomi Gribneau Bahm for her unceasing assistance with this project.

1. Although in many states custody issues involving the courts will be confined to heterosexual couples, the view taken here is that any adult individuals capable of providing sensitive, responsive care to a child should be considered legitimate parenting figures. Therefore, although this paper uses the terminology of male-female parenting couples, its principles necessarily apply equally well to gay and lesbian individuals and couples.

2. We note that the prevailing terms “custody” and “visitation” tend to distract from the focus of interest on the child, since they both have echoes in criminal law. Perhaps “care” would be better than “custody”, and “parenting” better than “visitation” in the family law context. We will, however, continue to use the traditional terms in this paper.

3. There will, of course, be unfortunate exceptions to the above, and custody issues can only be decided on a case-by-case basis. Thus, where children have witnessed frightening violence by one parent toward the other, the arrangements for joint custody recommended here may not apply, and visits with the child may necessarily be supervised (Lieberman, this Issue).

4. Intriguingly, however, more recent studies indicate that it may be a particular subset of orphanage children—more specifically, those who exhibit “disinhibited” rather than “unaffectionate” behavior patterns—that fail to form attachments through at least late middle childhood (Rutter et al., 2009).

5. It should be noted, however, that Rutter (1972) stressed that such separations were not determining of children’s adverse outcomes, but rather were “risk” factors. Bowlby’s position published one year later was similar: “Why some individuals should recover, largely or completely, from experiences of separation and loss while others seem not to is a central question, but one not easily answered. In living creatures variation of response is the rule and its explanation is often hard to fathom.” Bowlby went on to make explicit comparison between exposure to separation and loss, and the contraction of poliomyelitis: “Of all those who contract poliomyelitis, less than 1 per cent develop paralysis and only a fraction of 1 per cent remain crippled. . . .”

6. There are several descriptions available of the three “phases” of children’s responses to major separations. Those described here are drawn from Robertson & Bowlby, 1952; Bowlby, 1973, pp. 6, 26–28; Robertson & Robertson, 1971, 1989; and Heinicke & Westheimer, 1966, as well as conversations between the first author, Mary Ainsworth and John Bowlby.

7. Later, in a controlled study of 20 children whose mothers were having a second baby (10 placed in residential settings, 10 remaining home), Heinicke and Westheimer (1966) noted impressive reunion avoidance specific to the previously most favored person in all ten of the children who had been placed in the residential setting.

8. James and Joyce Robertson undertook a series of films of toddlers separated from their parents and placed in unfamiliar environments (Robertson & Robertson, 1967–1972). In one, the effects of going to hospital without parental visitation (“A Two-Year-Old Goes to Hospital”, Robertson, 1953) were documented. In another, a 17 month old who had clearly been happy within his family was filmed during a nine-day placement in a residential nursery while his mother had a second baby (“John, age 17 Months, for Nine Days in a Residential Nursery”, Robertson, 1969). Over this period, John was observed to remain initially “hopeful”, and on father’s visits accompanied him to the door, looking pleasingly into his face and bringing his outdoor shoes. He also appeared to favor a particular nurse who could at times comfort him but was often too busy or absent. The Robertson believed that the fact that nurse “Mary” could not serve as a satisfactory substitute parenting figure had an exacerbating effect on John’s steadily deteriorating condition. After his brief days of “Protest” (see Robertson & Robertson,
became 62% secure, 15% avoidant, 15% disorganized, and 9% ambivalent. Bakermans-Kranenburg (1999). The distribution of infants in low-risk samples (when including the disorganized classification) of a middle-class sample of Minnesota infants could not be fit into one of Ainsworth’s three Strange Situation classifications. Of a middle-class sample of Minnesota infants could not be fit into one of Ainsworth’s three Strange Situation classifications.

9. Three of the 26 infants were unable to participate in the Strange Situation procedure, due to illness or other factors. Twin studies have further underscored this idea, showing that the three original Ainsworth categories are strongly associated with environmental factors (“shared environment” [see Bohorost et al., 2003]).

11. Secure and insecure children did not differ in IQ.

12. The concept of the internal working model is complex, and goes beyond the scope of this presentation. Briefly, in keeping with his belief that the great majority of children’s troubles were based upon real-life experiences with their parenting figures, Bowlby advanced the idea that—based on those experiences—children internalize representational models or schemas of their experience in relation to their primary caregivers, and these models lead to differing expectations of how they will, and also should, be treated by new persons. To the degree that they provide a reasonable representation of the wider world, these models can be adaptive; but, in meeting with new conditions (e.g., sensitive treatment by a new parenting figure, when parenting by an earlier figure had been insensitive) the expectations carried forward from earlier experiences can be troublesome.

13. Children were administered an adaptation of Hansburg’s (1972) Separation Anxiety Test (Kaplan, 1987). Here they were presented with a series of six pictures of well-described parent-child separations, and for each were asked what the pictured child would feel, and what the child would do. These responses, like those in the Adult Attachment Interview, were transcribed verbatim and analyzed for their conversational properties. Following free sandbox play children were offered a Polaroid photograph of themselves and their parents which had been taken at the beginning of the laboratory procedures, and reactions to the presentation of the photograph were filmed. Finally, casual, unstructured conversations recorded at day’s end when parents and children were reunited were transcribed and analyzed. Each of these procedures involved representation or discourse; each was found related to Strange Situation behavior five years earlier.

14. Behavioral assessments included the now well-known “sixth-year reunion procedure” (Main & Cassidy, 1988) which filmed a parent’s return to the room following an hour’s separation in which the child was occupied with a variety of tasks. No instructions were given to the parent other than to sign some forms, and ready the child for leave-taking. Children’s responses to the mother upon reunion were strongly related to their infant Strange Situation response, and responses to the father’s (equally casual) return also reflected the child’s Strange Situation to him during infancy. A small four-study meta-analysis of this procedure, which included three studies conducted in other laboratories continued to indicate very strong relations to early Strange Situation response (Fraley, 2002). Since then, the AAI has also been found predictive of responses to the sixth-year reunion procedure, even when conducted in non-European languages, such as Japanese (Behrens, Hesse, & Main, 2007).

15. The Adult Attachment Interview originated in response to a joint request from doctoral students Carol George and Nancy Kaplan to find or develop a measure additional to their already planned studies of Berkeley families at six years of child age. George’s thesis focused upon filming family’s responses to the Robertsons’ film “Thomas” and Kaplan’s on children’s responses to the Separation Anxiety Test. Here Main suggested that a transcribed family history interview might be appropriate to both purposes. A majority of the initial questions were devised by George and Kaplan, and the resultant interview ultimately termed the “Adult Attachment Interview”.

16. Bakermans-Kranenburg and van IJzendoorn (2009) conducted a recent meta-analysis of 10,000 AAIs. The distribution for non-clinical mothers indicated the following proportions: 58% secure, 23% dismissing, 19% preoccupied, and 18% additionally unresolvable/cannot classify. The distribution was similar for fathers, and there were no gender differences for the dismissing and preoccupied classifications.

17. “Cannot classify” encompasses all globally anomalous transcripts which cannot readily be assigned to the secure, dismissing or preoccupied categories, and several sub-types are being uncovered (see Hesse, 2008).

18. The fifth and final landmark move cited by Rutter is the inclusion of “Reactive Attachment Disorder” in the Diagnostic Classification Scheme of the American Psychiatric Association, and he describes strikingly different outcomes for two subsidiary types: unaffectionate, and disinhibited. However, children with Reactive Attachment Disorder are fortunately rare, and determining their placement would no doubt involve the courts in discussions with specialist psychiatrists. Since children with Reactive Attachment Disorder would not ordinarily be under consideration in normative custody disputes, this “final landmark” is not considered further here.

19. The first published reference to unclassifiability was made by Sroufe and Waters (1977a), who reported that 10% of a middle-class sample of Minnesota infants could not be fit into one of Ainsworth’s three Strange Situation classifications.

20. As was the case with Ainsworth’s original categories, disorganized attachment status was independent across parents, indicating that a neurological cause is ordinarily highly unlikely.

21. A meta-analysis of infant and child disorganized attachment status was conducted by van IJzendoorn, Schuengel & Bakermans-Kranenburg (1999). The distribution of infants in low-risk samples (when including the disorganized classification) became 62% secure, 15% avoidant, 15% disorganized, and 9% ambivalent.
22. The reference to disorganized attachment status as observable in young children, in addition to infants, comes from a discovery made by Main and Cassidy (1988) that at age six previously disorganized children frequently showed “organized” albeit inappropriate role-inverted behavior toward the parent, which was termed “D-controlling” or “D-punitive”.

23. Infants who have been consistently rejected in the home environment may, as the reader is aware, fail to overtly monitor the parent’s whereabouts during the Strange Situation procedure, and do not approach them on reunion. However, as noted earlier, studies conducted in both Minnesota (Sroufe & Waters, 1977b) and Germany (Spangler & Grossmann, 1993) have established the presence of physiological indices of distress in the mother’s absence in avoidant infants, despite their apparently suppressed levels of overt monitoring. Additionally, as stress involving this procedure mounts (as when yet a third separation is added), these “avoidant” infants also in fact approach the attachment figure, sometimes in strong distress. Each of these studies implies that monitoring of the parent’s whereabouts is present even for insecure-avoidant infants, while being behaviorally suppressed.

24. Recent studies have indicated that a “critical period” for the formation of first attachments does, as Bowlby believed, exist. This may particularly pertain to institutionalized children described as having developed “dissiminated” reactive attachment disorder, a condition which seems to persist to at least age 11 (Rutter et al., 2009, p. 535).

25. Citing the De Wolf & van IJzendoon (1997) meta-analysis of 950 children for whom both mother and father data were available, Bretherton calculates that 45% were secure with both parents, 38% with one, and 17% with neither (Bretherton, 1992a, p. 16).

26. It is the observation of the authors that giving children an excessive number of expensive toys or other desirable items occurs not infrequently on the part of well-meaning “visiting” parents. Whether interactions with the child are “sensitive” or not, excessive gift-giving can sometimes introduce an undesired focus upon material items on the part of the child, drawing the child’s attention away from the parent themselves.

27. The first author has been aware of the potential for this type of outcome (Main & Solomon, 1990) ever since acting as a research assistant to Ainsworth in a study intended to assess short-term stability of Strange Situation behavior over the course of two weeks. Upon return for the second administration of the procedure some infants showed fear even upon entering the hallway of the building, and cried on seeing the laboratory door. Additionally, the great majority of the infants in this uncompleted study showed odd, unclassifiable/disorganized behavior during the procedure itself. Since it is, of course, impossible that the mothers of all these infants had become frightened, frightened, dissociative or maltreating across the preceding two weeks, the likeliest explanation of infant unclassifiability/disorganization was an excessive fear of separation due to the exceedingly close spacing of the procedures. Thus, disorganization must have been an artifact of the procedure, and therefore unrelated to the mother. This experiment was of course terminated well before its intended completion, and serves as a reminder of the care which must be taken when utilizing the Strange Situation.

28. As the field of genetics grows more sophisticated, some differences may be found controlled by short-term “epigenetic effects” (see Polan & Hofer, 2008) which determine which genes are more likely expressed, and which suppressed, in accordance with an individual’s, parent’s, or grandparent’s history (see Weaver et al., 2004). The present authors would find it interesting to examine the two major three-generation studies of attachment in this light. In the first (Benoit & Parker, 1994), grandmother to mother to infant matches were marked, a finding which may be attributable not only to similarity in interaction patterns, but also by epigenetic effects. In the second, by Avi Sagit-Schwartz and colleagues (2003), grandmothers born outside of Israel and orphaned by the Holocaust were studied with their daughters and granddaughters in the Israeli context. Here the three-generation sequence was broken, with the understandable prevailing insecurity of the grandmothers turning into a normal distribution of security among their daughters. In addition to the positive and hopeful culture of Israel into which these young women were born, an effect of “epigenetics” may conceivably have been carried forward. Thus it seems possible that the security of many of the (insecure) orphaned mothers’ daughters may have been partially epigenetically transmitted from the security of their grandmothers (the orphaned Israeli mother’s mother prior to the onslaught of the Holocaust).

29. These films can be obtained on loan from the Penn State Audio-Visual services, University Park, Pa.

30. We are using the term “child” here to cover “children” as well. While this may initially seem to be a mere formalism, a discussion of the complexities involved where arrangements for several children are to be set in place are beyond the scope of this paper. In general, we advocate leaving children in the same home as a comfort to one another, but cases involving children of older ages, or serious sibling rivalry established long prior to the divorce, involve complications which cannot be discussed further here.

31. The writers consider it good practice for evaluators and attorneys to obtain training in the Strange Situation and the Adult Attachment Interview as well as practicing home observations of parents and children sharpened by study of the Q-sort procedure (see johnbowlby.com for further information). But if custody evaluators and attorneys concerned with children should acquire expertise in the central methods of assessing attachment, similarly attachment researchers, also concerned with children, should increase their understanding of the father’s role in child development and security. Attachment researchers should now also begin validating and standardizing the Preschool/Sixth-Year Reunion measures, and eventually providing more standardized forms of doll play to increase their understanding of both positive and negative parental effects upon a child’s development.

32. The Q-sort procedure necessitates that the home observers themselves complete the Q-sorting assessments immediately following the observation.

33. Very low scores on the Q-sort have been considered the equivalent of “disorganized” by several investigators. Systems which use only the three-category system for either parents or children, in contrast, are not able to provide such an equivalent.
34. As will be noted below, stability from age one to three appears to remain problematic for the Cassidy & Marvin procedure; while five tests of stability from age one to age six have been successful for the sixth-year Main & Cassidy procedure, one of which was conducted in the laboratory of the originators.

35. The authors of this paper will provide new forms of standardized write-ups which can accompany each Adult Attachment Interview classification provided for the courts. This document will eventually be made available to certified coders working for the courts by writing to Dr. Naomi Grineau Bahm “attcourt@gmail.com”.

REFERENCES


