Measures for assessing parenting in research and practice

Marjorie Smith
Thomas Coram Research Unit,
Institute of Education, University of London
27-28 Woburn Square,
London
WC1H 0AA

Email: m.smith@ioe.ac.uk

Abstract

Concepts of parenting and their development are briefly reviewed, as well as the variety and scope of application of the term. Issues in relation to the assessment of parenting are discussed, and three questionnaire-type measures are reviewed – the HOME Inventories, the Parenting Stress Index and the Parenting Daily Hassles Scale. It is concluded that while these measures have a utility, theoretical developments in concepts of parenting will increasingly require the use of assessments more sensitive to the interactive and dynamic aspects of parenting. It seems probable that these will be observational methods or semi-structured interviews, rather than questionnaires.

Keywords: parenting; assessment; measures

Introduction

The first task in designing an assessment instrument is to understand properly what is being assessed. Parenting is a universally recognised concept, but difficult to define precisely. Although most closely associated with birth parents, it is also applied to adoptive or foster parents, grandparents, and it is now becoming acceptable to talk of 'the state as parent', particularly in relation to children looked after. Despite the ubiquity of the term, and the breadth of application, there is no definitive or accepted definition of what parenting is, and no accepted single theory of parenting (O'Connor, 2002).

Most definitions of parenting include an element of child rearing behaviour, for example the promotion of language or learning, or the provision of a stimulating home environment, as well as affective elements of the parent-child relationship and interactions, such as warmth and positivity, and negative aspects such as hostility. Parenting also includes parental beliefs or attitudes. Parenting beliefs encompass 'perceptions, expectations, knowledge, ideas, goals, and values about all aspects of child-rearing and development' (Bornstein, 2001). Beliefs and attitudes may identify important differences between parents, and at the same time they will relate to, and may explain, parenting behaviour.

Theories and concept of Parenting

To a large extent, the development of measures of parenting reflects the historical development of conceptions and theories of parenting. Early research on parenting

focused on child rearing tasks if the focus was on adults' behaviour (for example, Sears, Maccoby & Levin,1957), or socialisation, if the focus was from a child development perspective. Although both perspectives required an adult and a child, parenting was not viewed as an interactive activity. Child rearing was something that adults *did* to children, while child development studies viewed children as independent entities. Sears et al. (1957) concluded that there was good evidence for the importance of warmth, and of punishment practices on children's personalities, but were not able to detect any clear effects related to the tasks of child rearing.

Concepts of parenting behaviour from socialisation research generally include key dimensions of parental warmth/affection, and parental control (Maccoby & Martin, 1983). In their work on socialization, Lamb and Baumrind (1978) concluded that it was 'not particularly valuable to consider isolated parental attributes like punitiveness, warmth or control'. Rather they suggested that the effects of parenting depended on 'complex patterns of attributes' best identified by parenting style. A number of different parenting styles were identified, of which the most significant were authoritarian, authoritative, and permissive (Baumrind, 1971). Parents who were warm and sufficiently controlling were labelled authoritative, while those who were controlling and restrictive were labelled authoritarian, and those who were under-controlling were labelled permissive. In White populations in Western cultures, authoritative styles of parenting have generally been found to be associated with better child outcomes, such as social and emotional competence, behaviour and education attainment (Dornbusch et al.,1987; Lamborn et al., 1991). Evidence relating to

outcomes associated with different parenting styles in Asian cultures, or other non-white populations is less clear (Chao, 1994; Deater-Deckard, et al., 1996; Querido, Warner, & Eyberg, 2002). It should be noted that concepts of parenting style are independent of child behaviour (Baumrind, 1971).

Although it had long been observed that characteristics of the child, and particularly child temperament, influenced parenting behaviour (Levy, 1943; Thomas, Chess & Birch, 1968), it was some time before parenting came to be viewed as process that was described as one of reciprocal interaction (Rutter, 1979), with recognition of the central importance of relationships within the family (Hinde & Stevenson Hinde ,1987). In this conception, parenting is influenced by and expressed through a series of dyadic relationships. At the same time, it was recognised that other non-relationship factors, such as maternal depression, impacted on parenting behaviour (Easterbrooks & Emde, 1988; Radke-Yarrow, 1999).

The impetus for concepts of parenting as multifactorial was mostly from the field of child abuse, and attempts to understand abusive parenting (Cicchetti & Rizley, 1981; Belsky & Vondra, 1989). These theories emphasise that parenting is multiply determined and multi-level, with historical and current influences. These include individual (parental personality or child characteristics), historical (parental developmental history) and social (marital satisfaction and social network support), as well as circumstantial (poverty, ignorance about child development) factors. Belsky and Vondra (1989) proposed that parenting was a 'buffered system', where interactions between sources of stress (such as having a difficult child) were buffered by parenting supports (such as

personal psychological resources or social support). Abusive or neglectful parenting was seen as the outcome of accumulated risk factors in conjunction with a lack of support or compensatory factors.

These multidimensional conceptions of parenting led to the identification of a number of key attributes of parenting 'capacity'. For example, the UK Framework for the Assessment of Children in Need and their Families (Department of Health et al., 2000) identifies the fundamental aspects of 'parenting capacity' as basic care; ensuring safety; emotional warmth; stimulation; guidance and boundaries; and stability.

Recent research has focused on bidirectionality in parenting (Kuczynski, 2003), with an interactive and process oriented model of parenting, where the focus is on the dynamic mechanisms rather than the outcomes of parenting. Behavioural geneticists have focussed attention on the shared and non-shared aspects of the environment for children in the home (Hetherington, Reiss & Plomin, 1994). Bidirectional theories of parenting emphasise the influence of child factors on the parent, and thus the non-shared aspects of parenting (O'Connor et al., 1998). To this, behavioural genetics has added the possibility that 'parents have no causally direct and verifiable effect on their children's behavioural/emotional and personality development because genetic factors account for what were heretofore considered to be environmental effects' (O'Connor, 2003, p147). More recent evidence would dispute this interpretation, and views family process as of relevance to understanding gene-environment interactions (Bakermans-Kranenburg & van IJzendoorn, 2010).

<u>Variations in parenting</u>

In addition to the determinants identified above, parenting differs across cultures (Garcia Coll, Meyer & Brillon, 1995; Bradley & Corwyn, 2005); by socioeconomic status (Zuckerman, Barrett & Bragiel, 1960; Hoff-Ginsberg & Tardif, 1995; Bradley & Corwyn, 2005); and generations. Importantly, parenting also differs according to the age of the child (Collins & Masden, 2003). This has implications for the applicability of measures of parenting, which tend to be restricted to particular child age ranges.

Parental attitudes and beliefs, while part of parenting, may differ significantly from parenting behaviour (Holden & Edwards, 1989). This is particularly evident when there is a difference between what is seen as socially desirable behaviour and normative behaviour, for example, in relation to the use of physical punishment. It is also clearly evident in relation to the impact of stressors on parenting – what parents would like to do, or feel is the right thing to do, may be very different from their actual behaviour with the child.

The main focus in parenting studies has been on mothers, and fathers have tended to be excluded. Despite some measures showing clear differences in the patterns of parenting between mothers and fathers, and the case for the importance of studying them separately being made (e.g. Schaefer, 1965), until relatively recently there has been little research on the role of father as parent. The recent substantial increase in research on the role of fathers as nurturing parents (Lamb, 2000) has not been reflected in the development of specific standardised assessments of fathering. The applicability to fathers of many parenting measures designed for mothers, is not known.

Why assess parenting?

Professionals working with children and families are sometimes required formally to assess the adequacy or quality of parenting provided for a child, for example, in child custody or child abuse evaluations where there are questions about the adequacy or safety of the caretaking situation. In these circumstances, clinicians usually assess parenting by interviewing parents and observing their behaviour with their children. Budd (2001) points out that the task of assessing parenting competencies is complicated by a lack of universally accepted standards of minimal parenting adequacy (or 'good enough parenting'), and the lack of appropriate measures for the task.

Research assessments of parenting are similar to the extent that the focus is generally on the quality of parenting, but they differ in that the focus is often on specific aspects of parenting in relation to a particular child outcome, rather than parenting in general. Recently there has been an attempt to standardise the sorts of questions asked to assess parenting in clinical interviews, into a standardised interview format suitable for use in research (Berg-Nielsen & Holen, 2003).

Ways of assessing parenting

Parenting has been assessed by observation, interviews, or by means of standardised questionnaire measures or rating scales. For research purposes, it has been assessed either by naturalistic observations, usually made in the home, or structured observations made while completing a standardised task requiring parent-child interaction (Patterson, 1982; Radke-Yarrow, Richters & Wilson, 1988); by semi-structured or structured interviews (for example, Rutter & Brown, 1966; Quinton & Rutter, 1988; Golombok et al., 1995); by self or other report using either standardised

questionnaires or rating scales; or combinations of these methods (e.g. Dunn et al., 2000). It is not proposed here to discuss the advantages and disadvantages of direct observations versus report, since these are well documented elsewhere (see Kochanska, Kuczynski & Radke-Yarrow, 1989, or Aspland & Gardner, 2003 for discussion of this in relation to family behaviours), but the measurement method has implications for the sort of information that can be obtained, and for the validity of that information. Both retrospective recall and observations are subject to biases of different sorts (Radke-Yarrow, 1963; Radke-Yarrow, Campbell & Burton, 1970; Kochanska et al., 1989). Self-report and other-report of parenting are also likely to differ in systematic ways, as parents are more likely than others to have a comprehensive and wide ranging knowledge of their parenting across different contexts, but, unlike independent reports, self report is known to be subject to biases, such as that of social desirability (Zaslow et al., 2006). An investigation of the predictive validity over a four year period, of three different methods of assessing parenting in preschool children (maternal self-report using standardised measures, an interview and observational measure - the HOME-SF, and structured observations of interaction during teaching tasks), showed that each method significantly predicted cognitive and socio-emotional outcomes in children, with the best prediction from observations, and the weakest from self-report measures (Zaslow et al., 2006).

<u>Children as Informants</u>

Most non-observational measures of parenting are based on self-report by the parent or parents themselves, either in an interview situation, or using a standardised

questionnaire measure. Despite the interactive nature of the task, and the fact that children's reports have been shown to be as valid as direct observation (Golden, 1969), the use of pre-adolescent children as informants on their parents' behaviour is somewhat less common. One exception is the Alabama Parenting Questionnaire, which has a version for completion by children (Frick, 1991; Essau, Sasagawa & Frick, 2006) assessing (current) perceptions of their parenting, and has been used and validated with children aged 6-13 years (Shelton, Frick & Wooton, 1996). The scale comprises 42 items assessing parenting across five domains: parental involvement, positive parenting, poor monitoring/supervision, inconsistent discipline, and corporal punishment.

There are, however, several questionnaire measures designed for adolescents, assessing young people's perceptions of such things as parenting style (Parenting Style Scale: Lamborn et al., 1991), parental behaviour (Parental Perception Inventory: Hazzard, Christensen & Margolin, 1983), or specific behaviours such as parental discipline (Cornell Parent Behaviour Inventory: Devereux, Bronfenbrenner & Rodgers (1969). The Parental Bonding Instrument (PBI: Parker, Tupling & Brown, 1979) is another measure for completion by adolescent children, or retrospectively by adults, reporting on their perceived levels of care and over-protection up to the age of 16 years.

Probably the most widely known and used parenting measure for completion by children is Schaefer's Child Report of Parent Behavior Inventory (CRPBI: Schaefer, 1965). The original inventory had 260 items, but it has been gradually shortened to a 56 item scale (Margolies & Weintraub, 1977) assessing three dimensions of parenting from the child's perception: acceptance versus rejection; psychological autonomy versus

psychological control; and firm control versus lax control. Separate forms are

completed for each parent, so that mothering is treated independently of fathering.

Questionnaire measures for assessing parenting

Given the multidimensional nature of parenting, it is not surprising that there is a huge

number and great variety of potential measures of different aspects or dimensions of

parenting. These range from measures of parenting attitudes (see Holden & Edwards,

1989); parenting style (e.g., Lamborn et al, 1991); parenting satisfaction, competence or

self- efficacy beliefs (e.g. Johnston & Mash, 1989; Campis, Lyman & Prentice-Dunn,

1986**)**; parenting stress (e.g. Abidin, 1990), to parenting skills and behaviour (Margolies

& Weintraub, 1977; Block, Block & Morrison, 1981). In addition, there is a range of

questionnaires assessing particular aspects of parenting, such as nurturance or physical

discipline (see Locke & Prinz, 2002 for a review of some of these), including some with a

very specific focus – for example, on dysfunctional discipline styles (Arnold et al., 1993),

or the potential to abuse (Milner, 1986).

This brief review focuses on three standardised questionnaire-type measures, two of

which are well known, and have been widely used, and the third is a newer measure

increasingly being used in parenting studies. All three measures are potentially

applicable both in research contexts and to clinicians, although one of them is

preferably administered in the home environment. The measures are chosen for

different reasons: the first measure – the HOME inventory – is selected on the basis that

it is one of the most comprehensive assessments of parenting available, covering a wide

range of aspects of parenting, and for this reason it is also one of the most widely used

scales. It is suitable for assessing both normative and disrupted or abnormal parenting, but possibly less sensitive to variations of parenting quality within the normal range. The other two measures are of parenting stress. These have been selected as there is good evidence that parenting stress is an important factor in disrupting parenting, and impacting negatively on child well being and outcomes (Webster-Stratton, 1990; Conger et al., 1992; Deater-Deckard, 1998). It is also often a reason for parents to seek professional help or a cause of them coming into contact with it, and for the adequacy of their parenting to be assessed.

Stress may result from factors in the parent, such as depression or anxiety; factors in the child such as difficult behaviour; or factors in the environment, such as poverty, a poor neighbourhood, or a lack of social support – or combinations of these. The effects appear to be both indirect and direct, through disruptions to parenting behaviour with increasing negativity to the child and more punitive and harsher discipline, and a less stimulating environment for child rearing; and poorer parent child relations (Conger, Patterson and Ge, 1995; Deater-Deckard 2004). There are also bidirectional (and potentially cumulating) effects of parenting stress as a result of children's behaviour or attributes. Parenting has also been shown to be susceptible to low levels of stress (Abidin, 1992; Crnic & Greenberg 1990).

The two scales selected for review, the Parenting Stress Index and the Daily Hassles scale, are consistent with concepts of parenting as multiply determined and multi-factorial, as they assess the extent to which 'unbuffered' sources of stress impact on parenting behaviour (e.g. Belsky, 1984), but the scales relate to slightly different

conceptual approaches to parenting stress and its impacts, which have been identified

as the parent/child relations theory and the daily hassles theory (Deater-Deckard 2004).

The Home Observation for Measurement of the Environment/The HOME Inventory

(Caldwell & Bradley, 1984; Bradley et al., 2000)

The authors of the HOME originally described the inventory as designed to measure the

quality and quantity of stimulation and support available to the child in the home

environment, rather than as an assessment of parenting. It is, however, now widely

accepted and used as a measure of parenting capacity and the quality of parenting (e.g.

Kendrick et al., 2000; Bradley & Corwyn, 2005).

The HOME inventory is completed by means of an observation and interview session in

the child's home when the child and parent (mother) are present, and the process takes

about an hour. The original version of the HOME Inventory was for children aged from

birth to three years, but three more versions for children up to the age of 15 years have

since been developed. Each comprises a number of items clustered into subscales (see

Table 1) which were based on research and theory, and demonstrated to have high

internal consistency, but subsequently verified by factor analytic techniques. There are

detailed descriptions of each item to be scored, and each is simply scored as present or

absent (1 or 0) to give subscale scores and a total score. There was no standard

interview, although some sample questions were provided, but 'researchers' were

instructed to complete some items by observation, others by interview, and some by a

mixture of these. Many items require the interviewer to make judgements – for

example, the item 'Parent's voice conveys positive feelings for child', from the

Emotional and Verbal Responsivity subscale is described, as 'When speaking of or to

child, mother's voice conveys positive feeling: What you are looking for is evidence that

the mother feels good about her child – sounds animated when speaks about him, does

not use a flat or querulous tone of voice.'

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TABLE 1 ABOUT HERE

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 The origin of the HOME inventory was for research purposes, and it has largely been

used in that context until recently. In the UK, however, the inclusion of the HOME as

part of the assessment tools of the Framework for Assessment of Children in Need and

their Families (Department of Health et al., 2000) has extended its use to practitioners.

At the same time, more detailed instructions for interviewing, and training programmes

have been provided.

The applications and properties of the HOME have been the subject of many excellent

reviews both by the original authors (e.g. Elardo & Bradley, 1981; Bradley, 1994; Bradley

et al, 1994; Bradley, Corwyn & Whiteside-Mansell, 1996; Bradley et al, 2001; Bradley &

Corwyn, 2005) and others (e.g. Totsika & Sylva, 2004) so it is not proposed to rehearse

these here. It is relevant to note, however, that the psychometric properties of the scale

have been found to be 'robust', with alpha coefficients for the total scores all above .90,

and inter-rater agreement of between 90-95%. There is ample evidence of its

concurrent and predictive validity in a wide range of different circumstances and

contexts (Bradley, 1994), and its sensitivity to change in evaluations of interventions

(Kendrick et al., 2000; Totsika & Sylva, 2004). However, largely as a result of the dichotomous scoring method, the HOME differentiates poorly between acceptable and more optimal parenting (Bradley, 2004).

There is evidence that the HOME works somewhat differently in different ethnic groups or cultures (Bradley et al., 2001), and that some items are not seen as appropriate or adaptive in cultures distinct from the North American environment in which it originated, with the result that the scale has been adapted for local use (Bradley & Corwyn, 2005). Despite this, there is evidence of a moderate but consistent relationship in a wide range of cultures, between socioeconomic status and HOME scores (r's generally between .3 - .5); and between aspects of parenting, such as warmth and responsiveness, and stimulation and teaching, and child outcomes, such as language development, intellect and educational attainment, and behaviour (Bradley & Corwyn, 2005). There was less consistent evidence across different cultures of an association between parental physical punishment or harsh discipline and children's adaptive functioning, but this is consistent with other findings which suggest cultural and circumstantial differences in the way in which physical punishment relates to child outcomes (Deater-Deckard et al., 1996; Deater-Deckard & Dodge, 1997)

A short form of the HOME (HOME-SF) was developed for the US National Longitudinal Survey of Youth (NLSY) (Bradley et al., 2001; Mott, 2004). Although about half the length of the original scale, this is in most ways similar to the original HOME, although some of the original dichotomous questions and scorings have been changed to score in one of three or four categories. Retained factors in the HOME-SF are learning stimulation,

parental responsiveness, teaching (EC version only) and the single item relating to physical punishment.

Recognising the potential lack of applicability as a clinical instrument with socially disadvantaged or excluded populations, Ertem and colleages (1997) developed a supplement to the HOME scale for children living in impoverished urban environments (SHIF). Additional items scored include those relating to the 'temporal structure and daily routines' (for example, 'Family has regular and appropriate morning routine') as well as more directly to care-taking practices ('Child is not left to feed self'). In addition to providing additional clinical information, the twenty item supplement is reported to be easy to administer and to have good psychometric properties, but does not appear to have been very widely used.

The Child Care HOME (CC-HOME) Inventories are designed to be applicable for children in non-parental care, but in family or home-like settings (Bradley, Caldwell & Corwyn, 2003). They would be applicable for both looked after children in family homes, or home based day care situations such as childminders. There are currently two versions of the CC-HOME, one for children aged under three years (IT-CC-HOME) and one for children aged between three and six years (EC-CC-HOME). They can be completed during a 45-90 minute visit to the child care setting, conducted when both the child and primary care giver are present. Reliability and validity (assessed against two measures of the family day care environment) were demonstrated at levels that were consistent with the original HOME scales.

The Parenting Stress Index (Abidin, 1990)

The most recent version of the Parenting Stress Index (PSI – Form 6) is a 101 item questionnaire for completion by parents in relation to the child they are 'most concerned about'. It is described as being for use by clinicians and researchers for early identification screening, individual diagnostic assessment, assessment of intervention effectiveness and research on the effects of stress on parenting. There is no specified child age range, although it is considered particularly applicable for parents of children aged up to three years (Loyd & Abidin, 1985), but norms for mothers are provided for children aged 1 to 12 years, and for fathers in relation to children aged up to six years. The included items are guided by a theoretical model of the common stressors that can result in dysfunctional parenting. They relate to child characteristics (47 items in six subscales: Adaptability, Acceptability, Demandingness, Mood, Distractibility/Hyperactivity and Reinforces Parent) and to personal, pathological, and situational parent factors (54 items in seven subscales: Depression, Attachment, Restrictions of Role, Sense of Competence, Social Isolation, Relationship with Spouse and Parent Health). There are also 19 optional life stress items. Examples of included items are, 'There are some things my child does that really bother me a lot' (child domain: demandingness), and 'I feel capable and on top of things when I am caring for my child' (parent domain: sense of competence subscale). Responses are on a five point Likert scale from 'strongly agree' (1) to 'strongly disagree' (5), and some scores are reversed for subscale scoring. In addition to the subscales scores, the index produces child and parent domain scores, and a total score.

The psychometric properties of the scale are generally good, with reliability (alpha coefficients) for the two domains of .90 and .93, and .95 for the total score, and stability over time, assessed by test-retest reliabilities, also high, ranging in different studies from .65 to .96 for the total score. The PSI also performs well in relation to all the major tests of validity (Abidin, 1990). The factor structure of the PSI, however, is less clear, with significant overlap between subscales, and some parent domain factors loading most highly on child domain subscales.

The PSI has now been used in a wide variety of both research and clinical applications, including with parents of children with physical handicaps, physical illnesses, behavioural disturbance, developmental delays, and with at risk populations.

It has been translated and validated for use in a number of different non-English speaking countries (for example, Bigras, LaFreniere & Dumas, 1996; Őstberg, Hagekull & Wettergren, 1997; Yeh, Chen & Chuang, 2001) and the psychometric properties of the scale appear to hold up well for parents with young children.

There is a shortened version of the PSI (PSI-SF: Abidin, 1995) which was developed for screening purposes, and comprises 36 items from the original scales. The subscale structure of this differs, with only three subscales (parental distress, parent-child dysfunctional interaction, and difficult child) but the overall correlation between the total scores of the original and short forms is .94, with a correlation of .92 between the PSI parent domain and the PSI-SF parental distress subscale, and of .87 between the PSI Child domain and the PSI-SF difficult child subscale (Abidin, 1995).

Parenting Daily Hassles Scale (Crnic & Greenberg, 1990; Crnic & Booth, 1991)

The Parenting Daily Hassles (PDH) Scale which is designed for parents of young children, aims to assess the minor parenting stresses within the context of parent child relationships. The scale is a 20 item measure of typical everyday events in parenting and parent-child interactions, with hassles conceptualised as ' the irritating, frustrating, annoying, and distressing demands that to some degree characterize everyday transactions with the environment' which are then associated with the mother responding irritably to her child. Sample items are, 'Constantly clearing up children's messes'; 'being nagged, whined at or complained to', and 'children interrupt adult conversations or interactions'. For each item the parent is asked to rate the frequency with which it occurs on a 4-point scale (rarely, sometimes, a lot, constantly), and how much they are irritated or hassled by the event (on a five point scale, from 'not at all' to 'a great deal'). This produces two scores, a frequency and an intensity score, which were highly correlated. The reliability of these scales is acceptable, with alpha coefficients of .81 and .90 respectively. Analyses of the intensity scores revealed two factors which were moderately correlated (r=.5), one relating to parenting tasks, and one to challenging child behaviour. Scores generally increase with child age from birth to three years, and are associated with measures of social support and social cognition, as well as with child negative child outcomes. Parenting hassles relating to challenging child behaviour are more strongly associated with negative child outcomes, than are hassles related to parenting tasks (Crnic & Booth, 1991; Coplan, Bowker & Cooper, 2003).

This scale relates to 'everyday parental stress' rather than the more pathological stress or more severe behavioural problems measured by the Parenting Stress Index (Crnic &

Low, 2002). There is rather less information overall about the applications and uses of this scale, although it has been used in a variety of situations with parents of physically ill or disabled children, with teenage mothers, and other 'at risk' groups, and translated into several different languages. A slightly adapted version of the scale is included in the UK Frameworks for Assessment, Family pack of questionnaires and scales (Department of Health et al., 2000). The information provided notes that parents enjoy completing this short scale as it resonates with their experiences of parenting, and social workers reported during piloting 'that it depicted concisely areas of pressure felt by the carer'.

Conclusions

Parenting is a complex and multi-level construct with no single or comprehensive theory, and the wide variety of assessments and methods of assessment of different parental attributes or aspects of parenting reflects this complexity. Many of these measures have been developed and used for particular purposes, and subsequently used by others, with little attention paid to their validity or reliability (McGuire & Earls, 1993). There are no questionnaire-type measures of parenting that could be described as comprehensive in that they assess all aspects of parenting, although some have broader, and others more specific, application. As a result, it is not uncommon for those assessing parenting to use a clutch of different measures to assess different aspects of parenting.

The standardised measures that have been more widely used have generally been those that have followed the theoretical developments in concepts of parenting, with a discernable shift over time from measures that focused exclusively on parents'

behaviour in child rearing tasks, to parenting style. These have been the subject of much research attention to ascertain the number and type of factors that determine parenting. Measures of parenting style have been followed by measures more consistent with concepts of parenting determined by multiple factors, and process models. Those that have stood the test of time and been widely used appear to be those that focus on qualitative aspects of the parent-child relationship, and are either more comprehensive in scope, such as the HOME inventories, covering aspects of both child rearing behaviour and the parent-child relationship and interactions, or consistent with 'buffered' or bidirectional theories of parenting, in that they are particularly sensitive to stressors, and combinations of parent and child factors that are disruptive to the parent-child relationship and parenting behaviour. Measures of parenting stress demonstrate that attributes of both the parent and child are important in the relationship. There is evidence of children's impacts on parenting, as well as theories of differential susceptibility hypothesising that some children are particularly sensitive to the nature of their parenting (Pluess & Belsky, 2010).

This change in focus and conceptualisations of parenting has been associated with a change, at least in the USA - in the UK historically there has been a greater tendency for parenting researchers to use semi-structured interview techniques - in the ways in which parenting has been assessed, with a shift away from self–reports and standardised questionnaires, towards observational methods and semi-structured interviews. This is consistent with more nuanced understandings of parenting as interactive and bidirectional, and with the findings of Zaslow and colleagues (2006) that

observations were more strongly predictive of child outcomes than self-report. It also explains why the HOME inventories, which have been very widely used, are successful measures, as despite the fact that they are included here on the basis of their dichotomous scoring system, methodologically they are both observational and interview measures. The change in methods used to assess parenting has cost implications, since compared to questionnaires, both observations and interviews are more time consuming and require more training and supervision to achieve good reliability. A further consideration relevant to application in clinical practice is that the HOME inventories need to be administered in the home environment.

Assessments of parenting generally lag well behind the current conceptual and theoretical perspectives on parenting. With the increasing interest in the dynamic and interactive aspects of the parent child relationship, the focus has shifted from parent or child characteristics to the bidirectional and dynamic aspects of these in combination, and to explaining how and why various child outcomes are associated, rather than simply what outcomes are related (Kuczynski, 2003). For example, Stattin and Kerr (2000) found that adolescents' willingness to disclose – an interactive variable reflecting rather subtle aspects of the quality of the parent-child relationship, was more predictive of their antisocial behaviour, than parents' reports of monitoring, but the parental and child precursors of this adolescent behaviour are not known. Behavioural genetic studies remind us that genetic influences are also relevant to relationship quality, suggesting that some parents may be more sensitive to daily stressors than others (e.g. van IJzendoorn, Bakermans-Kranenburg & Mesman, 2008). In order to assess these

subtle and complex dynamic interactions adequately, it seems likely that future

developments in the assessment of parenting will continue the trend away from

questionnaire-type measures, towards observational methods and semi-structured

interview techniques.

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Table 1: Home Observation for the Measurement of the Environment (HOME) Scales

Inventory	Age range (yrs)	No. items	Subscales (no. items)
Infant/toddler (IT)	Birth – 3	45	Emotional and verbal responsivity of parent (11) Acceptance of child's behaviour (8) Organisation of physical and temporal environment (6) Provision of appropriate play materials (9) Parent involvement with child (6) Opportunities for variety in daily stimulation (5)
Early Childhood (EC)	3 – 6	55	Learning stimulation (11) Language stimulation (7) Physical environment (7) Warmth and affection (7) Learning stimulation (5) Modelling of social maturity (5) Variety in experience (9) Acceptance of child (4)
Middle Childhood (MC)	6 – 10	59	Emotional and verbal responsivity (10) Physical environment (8) Learning materials and experiences (8) Provision for active stimulation (8) Encouraging maturity (7) Emotional climate (8) Parental involvement (4) Family participation in developmentally stimulating experiences (6)
Early Adolescent (EA)	10-15	60	Physical environment (7) Learning materials (10) Modelling (10) Fostering self-sufficiency (6) Regulatory activities (10) Variety of experiences (8) Acceptance and responsivity (9)