

# **VOLUME I**

## **Research Component**

### **Understanding parenting groups: parents' experiences and objective changes in parent-child interaction**

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## **Overview**

This thesis is submitted in partial fulfilment of the requirements for the degree of Doctor of Clinical Psychology (Clin.Psy.D) at the University of Birmingham. The thesis comprises two volumes.

### **Volume I**

This volume comprises three chapters. Chapter 1 presents a systematic literature review of how parenting groups impact observed parent-child interaction, focussing on the groups recommended to UK commissioners. Chapter 2 presents a qualitative evaluation of the Solihull Approach Parenting Group, “Understanding Your Child’s Behaviour” (UYCB). Chapter 3 presents an executive summary of the literature review and qualitative evaluation.

### **Volume II**

This volume comprises five Clinical Practice Reports. The first report presents the case of a 47-year old man diagnosed with depression, formulated from two perspectives (cognitive-behavioural and psychodynamic). The second report presents a service evaluation of a Community Mental Health Team’s compliance with the NICE guidelines for Obsessive Compulsive Disorder (OCD). The third report is a case study of a cognitive-behaviour therapy (CBT) intervention for an 84-year old woman with hoarding behaviour. The fourth report is a single-case experimental design evaluating the effectiveness of the Solihull Approach for a three-year old boy with sleeping problems. The fifth report is the abstract of an orally presented case study that described an integrative intervention for a 30-year old woman diagnosed with post-natal depression.

All names and other identifying information have been changed to ensure client confidentiality.

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# Literature Review

*How do parenting groups impact observed parent-child interaction? A systematic review of the parenting groups recommended to UK commissioners*

Prepared for submission to *The British Journal of Clinical Psychology*

## **Abstract**

**Objective:** Parenting groups are widely used to improve psychosocial outcomes for children and parents, and are believed to be effective because they improve parent-child interaction. However, little is known about the extent to which the different programmes have been evaluated using objective, observational measures of parent-child interaction, and the nature of any such changes. This review examines the extent and nature of changes in observed parent-child interaction following participation in parenting groups, focussing on those recommended to UK commissioners.

**Method:** A systematic search for quantitative evaluations of the parenting groups recommended to UK commissioners that included observational measures of parent-child interaction.

**Results:** Seventeen studies were identified, evaluating eight of the 21 recommended programmes; ten of these evaluated the Incredible Years programme. Almost all studies reported improvements in observed parent-child interaction following the intervention. Reported improvements included increases in positive interaction, decreases in negative interaction, and improvement in behavioural and emotional/behavioural aspects of interaction. Most of the studies reported summary, rather than detailed, variables of parent-child interaction.

**Conclusions:** Several of the recommended parenting groups are associated with observed improvement in parent-child interaction, although the evidence-base for the different interventions is variable. Further research is required to understand the nature of the changes in more detail and broaden the evidence-base beyond the Incredible Years.



## Introduction

Parenting groups are widely used to improve the well-being of parents and children. There are now a large number of manualised programmes (Lundahl, Risser & Lovejoy, 2006) ranging from those that aim to support parents with the normal demands of childrearing (universal) to those aimed at parents whose children have specific difficulties or vulnerabilities (targeted). Evidence for the effectiveness of targeted parenting groups is particularly strong (for example, Barlow et al., 2011; Furlong et al., 2012), and they are recommended as the treatment of choice for managing conduct disorder (NICE, 2013). The public health effectiveness of universal interventions is also supported (Nowak & Heinrichs, 2008; Simkiss et al., 2013). Responding to this evidence-base, the UK government has recently committed to increasing the provision of evidence-based parenting programmes as part of a national strategy (Department for Education, 2012a; Department of Health, 2010, 2011). To support commissioners in their selection of parenting programmes, the Department for Education (DfE, 2012) produced a list of manualised parenting programmes that have been evaluated using the Parenting Programme Evaluation Tool (National Academy for Parenting Practitioners, 2008) and judged to have evidence of improving children's behaviour and/or development.

The curricula of the parenting groups recommended by the DfE reflect a range of psychological models. However, they can be broadly categorised according to their theoretical orientation: 1) *behavioural or cognitive-behavioural programmes* (for example, the Incredible Years, Webster-Stratton, 1998), which teach social learning techniques and/or cognitive strategies to challenge unhelpful thoughts; and ii) *relationship programmes* (for example, Parent Effectiveness Training, Gordon, 1970), which aim to enhance communication and understanding of behaviour in the context of relationships (Barlow et al., 2014; Gibbs, Underdown, Stevens, Newberry, & Liabo, 2003). However, both types of parenting programme are believed to be effective because they improve the quality of parent-child interaction (Barlow, Smailagic, Ferriter, Bennett, & Jones, 2010).

Evidence for the effectiveness of parenting groups at improving parent-child interaction is based on a mixture of parent self-report and observational measures. For example, the meta-analysis carried out by Furlong et al. (2012) for the Cochrane Collaboration included 13

studies, nine of which used an observational measure of parenting practices (e.g. the Dyadic Parent-Child Interaction Scale, Eyberg & Robinson, 1981) , and eleven of which used self-report measures of parenting practices (e.g. the Parenting Scale, Arnold et al., 1961). Similarly, the Cochrane Collaboration review of interventions for teenage parents carried out by Barlow et al. (2011) included six evaluations of a variety of parenting groups; of these, one used an observational measure of parent-child interaction (Parent Early Child Relational Assessment, Clark, 1985), while four used parent self-report measures of attitudes towards the parent-child interaction (for example, the Adult-Adolescent Parenting Inventory, Bavolek & Keene, 1999).

Self-report and observational methodologies are not, however, equivalent modes of assessment. Firstly, robust trials of parenting groups have reported incongruent findings for observed measures of parent-child interaction and related self-report measures in both directions: for example, Hahlweg, Heinrichs, Kuschel, Bertram, & Naumann (2010) reported significant observed improvement in parent-child interaction in single-parent families ten months after a parenting group, inconsistent with the parent self-reported change. In contrast, Sanders, Markie-Dadds, Tully, & Bor (2000) found improvements in self-reported parent-child interaction, but not in observed interaction. Secondly, previous reviews have found that improvements in observed parent-child interaction have smaller effect sizes than those for self-reported improvements (Furlong et al. 2012; Novak et al., 2008). Thirdly, at a conceptual level, there are important differences between self-report and observational measures of parent-child interaction; compared to self-report measures, observational measures can provide objective information about “real” behaviour and processes, which are consistently defined and reliably scored (Aspland & Gardner, 2003). Furthermore, they are more resistant to fluctuations in parents’ mood (Eddy, Dishion, & Stoolmiller, 1998) and expectations (Johnson & Lobitz, 1974). For these reasons, observational measures may prove more reliable and valid than self-report measures in the evaluation of parenting groups (Aspland & Gardner, 2003; Hawes & Dadds, 2006).

The findings from systematic reviews of parenting groups clearly show that observational measures are used widely, though not universally. Studies also indicate that parenting groups do produce observable changes in parent-child interaction. However, our present

understanding of observed changes in parent-child interaction following parenting groups is limited by the scope of previous reviews. For example, the influential Cochrane Collaboration reviews (Barlow, Johnston, Kendrick, Polnay, & Stewart-Brown, 2006; Barlow et al., 2011; Barlow et al., 2010; Barlow, Smailagic, Huband, Roloff, & Bennett, 2014; Dowling & Gardner, 2005; Furlong et al., 2012; Morris, Milner, Trower, & Peters, 2011; Woolfenden, Williams, & Peat, 2001) are based entirely on RCTs. While RCTs ensure that treatment groups are balanced and minimise bias from researchers' expectations, it has been argued that exclusive reliance on such trials in parenting intervention research introduces other biases (specifically, the impossibility of blinding participants, difficulty maintaining researcher blindness, inevitable reliance on small numbers of outcome measures, and bias towards families most ready for change). At the same time, valuable information from other types of research (e.g. matched pairs, cohort studies) may be overlooked (Stewart-Brown et al., 2011).

Other restrictions of previous reviews are that they tend to focus on specific populations (e.g. ADHD, Zwi, Jones, Thorngaard, York & Dennis, 2011; conduct disorder, Dretzke, 2005; and teenage parents, Barlow et al., 2011), specific programmes (e.g. Nowak & Heinrichs, 2008), or include a mixture of group and individual interventions (e.g. Barlow et al., 2011). A more general review of the effectiveness of 14 studies by Thomas et al. (1999) focused on parenting groups led by professionals; it included five studies using observational measures of parent-child interaction, and four studies using self-report measures of parent-child interaction as part of the evaluation. The authors concluded that parenting groups were effective in improving parent-child interaction up to three years post-intervention, although the relative importance and reliability of the two types of measures, and the nature of changes, were not discussed.

As a consequence of previous review strategies, little is known about: i) the extent to which different programmes have been evaluated using observational measures; ii) the extent to which studies using observational measures observe changes in parent-child interaction; and iii) the types of changes in parent-child interaction observed following parenting groups. The present review therefore aimed to carry out a systematic literature search and synthesis of studies that used observational measures of parent-child interaction to evaluate parenting groups. This information will increase our understanding of the evidence-base for objective

change in parent-child interaction as well as highlight poorly covered areas that need further research. Information about the types of changes in parent-child interaction associated with particular programmes may also inform clinicians in their selection of interventions for individual families.

To maximise the relevance of this review to practitioners and researchers in the UK, the search was restricted to the manualised parenting programmes recommended by the Department of Education to UK commissioners. To ensure comparability of the findings, the review includes only those programmes that work solely with parents (rather than including some intervention with children and/or teachers). The focus on parent-only interventions provides information about the most basic form of intervention (parent groups), which can be cheaper and easier for services to implement. For the purpose of this review, as a first synthesis of the findings of studies using observational measures, “parent-child interaction” has been interpreted broadly to include any aspect of behaviour or relationship quality observed in the parent-child interaction. To avoid conflating results with changes in child behaviour, and because parent groups aim to exert change via the parent, the review has focused only on parental contributions to the interaction.

## **Method**

### *Search strategy*

Evidence-based parenting groups were identified from the UK Department of Education website: <http://education.gov.uk/commissioning-toolkit/Programme/Commissioners>. This search identified 31 separately labelled groups within 21 parenting programmes (see Table 1). Programmes that combined a parenting group with a child or teacher intervention were excluded (five programmes, see Appendix A).

Relevant articles investigating the effects of these groups were identified by: 1) searching four electronic databases (selected to cover a range of medical and social science publications); and 2) hand-searching the reference lists of articles that met the inclusion/exclusion criteria for the review (see Table 2).

# 1. Electronic database search

The following databases were searched: *PsycINFO* (1967 – April Week 4 2014), *Ovid MEDLINE (R)* (1946 – April Week 4 2014), *Embase* (1980 – 2014 Week 18), and *Assia* (1987 – 2014-04-30). Keyword searches in PsycINFO, MEDLINE, and Embase included the title, abstract, original title, and subject headings of documents. All available fields were searched in Assia, including the full text, if available. The search in Assia was restricted to items in peer-reviewed journals.

Separate searches were carried out for each parenting group using the following search string: [“exact name of parenting group”] AND [interact\* OR observ\* OR attachment OR relationship OR sensitivity OR responsiveness OR responsivity OR security OR reflective functioning OR mind-mindedness OR mentalisation OR mentalization]. The search terms aimed to capture observed interaction and attachment constructs and were agreed following discussion with supervisors who are experts in parenting and attachment. The exact name of the intervention was used as reported by the DfE, although possible variations between British and American spelling were accounted for. The full list of parenting group programmes and search terms is shown in Table 1.

**Table 1.** *List of parenting group programmes rated as evidence-based by the UK Department of Education (2012) and search terms used in electronic databases for this review*

Programme name	Search terms
1. Standard Triple P	“Triple P”
2. Stepping Stones Triple P - Standard and Group	
3. Lifestyle Triple P	
4. Pathways Triple P	
5. Standard Teen Triple P	
6. Selected Triple P	
7. Family Transitions Triple P	
8. The Incredible Years Early Years - BASIC and ADVANCE	“Incredible Years” OR “Webster-Stratton” OR “Webster Stratton”
9. The Incredible Years Toddler - BASIC and ADVANCE	

10. The Incredible Years School Age - BASIC and ADVANCE	
11. Family Foundations	“Family Foundations”
12. Keeping Foster and Kinship Parents Trained and Supported	“Keeping Foster and Kinship Parents Trained and Supported”
13. New Beginnings	“New Beginnings”
14. Parents Plus Adolescent Programme	“Parents Plus”
15. Parents Plus Children’s Programme	
16. Parents Plus Early Years	
17. Strengthening Families/Strengthening Communities	“Strengthening Communities”
18. A Supportive Programme for Parents of Teenagers	“Supportive Programme for Parents of Teenagers” OR “Supportive Program for Parents of Teenagers”
19. ADHD PEST	“ADHD PEST”
20. Family Links Nurturing Programme	“Family Links Nurturing Programme” OR “Family Links Nurturing Program”
21. Fostering Changes	“Fostering Changes”
22. Fun and Families	“Fun and Families”
23. Living with Children	“Living with Children”
24. Mellow Parenting	“Mellow Parenting”
25. Noughts to Sixes – From Pram to Primary School	“Noughts to Sixes”
26. Parent Effectiveness Training	“Parent Effectiveness Training”
27. Parenting Positively	“Parenting Positively”
28. Raising Children	“Raising Children”
29. Solihull Approach Parenting Group	“Solihull Approach Parenting Group” OR “Understanding Your Child’s Behaviour” OR “Understanding Your Child’s Behavior”
30. Take 3	“Take 3”
31. The Five Pillars of Parenting	“Five Pillars of Parenting”

Special consideration was given to the search for studies evaluating the “Incredible Years” BASIC and ADVANCE parenting programmes. While the DfE refer to this as “Incredible Years”, it is clear from the literature that “Webster-Stratton” is a widely used synonym. For this reason, “Webster-Stratton” and “Webster Stratton” were included as additional search terms. Studies that named the intervention as only the Incredible Years or Webster-Stratton were included if the intervention was indistinguishable from that described by the DfE. For the same reason, “Understanding Your Child’s Behavior” was included as an additional search term for the “Solihull Approach Parenting Group”.

A total of 739 articles were identified from the above searches. The abstracts of potentially relevant documents, and, where necessary, the full text, were reviewed to ascertain their relevance to the review. The inclusion and exclusion criteria used are shown in Table 2. Application of these criteria reduced the 739 articles to 16 studies.

**Table 2.** *Inclusion and exclusion criteria for the review*

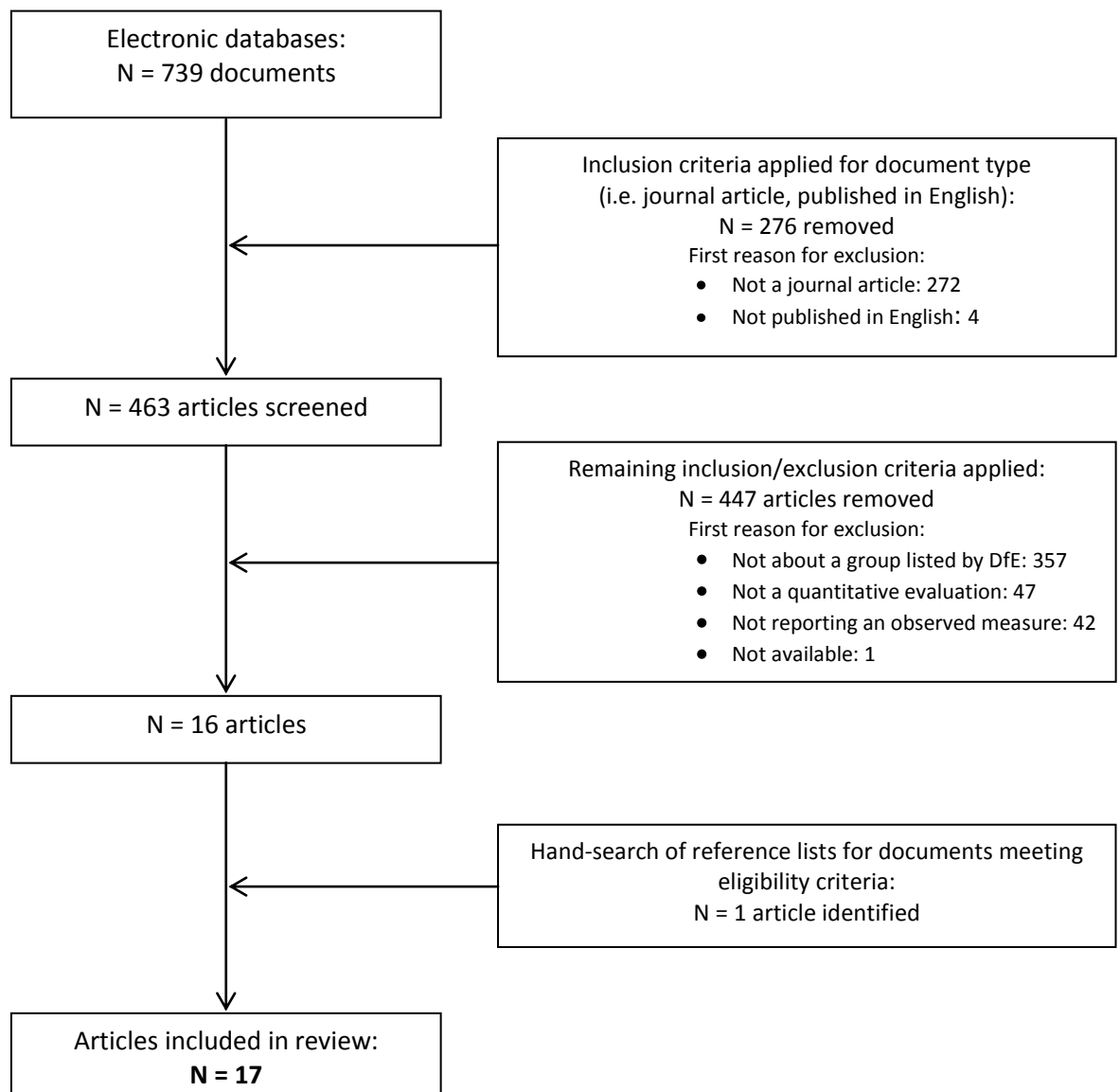
<b>Inclusion criteria</b>	<b>Exclusion criteria</b>
<i>Include if meets all of the following:</i>	<i>Exclude if any one of the following satisfied:</i>
<ul style="list-style-type: none"> <li>• Journal article, published in English</li> <li>• Empirical study evaluated a group-based parenting intervention listed as evidence-based by the UK Department for Education</li> <li>• Intervention delivered in a group setting with parents</li> <li>• Study used at least one observational measure of parent-child interaction</li> <li>• Study reported the parent-related code(s) for the observational measure</li> </ul>	<ul style="list-style-type: none"> <li>• Used modification of the manualised content (other than translation and minor cultural adaptations)</li> <li>• Precursor or preliminary version of a programme under a name different to that listed by the Department for Education</li> <li>• Intervention was delivered to children or teachers as well as parents</li> <li>• Study combined data from multiple trials in which none of the component trials met the eligibility criteria for review</li> <li>• Study combined data from observational and self-report measures to form composite variables</li> </ul>

## 2. Hand-searching reference lists

The reference lists of the 16 studies were hand-searched for other articles that satisfied the eligibility criteria. This yielded one additional article (Puckering, Evans, Maddox, Mills, & Cox, 1996). The reference list for this article was hand-searched for further articles that satisfied the eligibility criteria. No further articles were identified.

A schematic of the search strategy and article inclusion is shown in Figure 1.





**Figure 1.** *Schematic diagram of search strategy and articles obtained*

The full-text for one study (Parent Effectiveness Training, Larson, 1972) from the electronic search could not be retrieved for screening. The journal is no longer available electronically or within the University library. Contact details for the author could not be found.

### *Data extraction*

Data from each of the 17 studies was extracted using a tool developed for the review (Appendix B). This tool was based on guidelines published by the NHS Centre for Reviews and Dissemination (University of York, 2009) and included information relating to the study design, sample, measures, and limitations. Data are presented in Table 3.

**Table 3.** Data extraction for the 17 studies included in the review (grouped by intervention in chronological order)

Author (year) Country N recruited Population ( <i>targeted or universal</i> )	Programme (setting)	Details <i>Ages are mean unless otherwise stated; attrition is for observed measures</i>
<b>1. Schultz &amp; Nystul (1980)</b>  <i>Australia</i>  N = 50 <i>(intervention n = 10)</i>  Mothers of children aged 4 – 8 years, responding to public advertisement ( <i>universal</i> )	<b>Parent Effectiveness Training (PET)</b>  <i>10 sessions</i>  <i>Setting not reported (NR)</i>	<b>Aim:</b> To measure the relative ability of three models of parent group education to influence mother-child interaction
		<b>Design:</b> <u>Controlled Clinical Trial</u> , Follow-up: immediately post-intervention (PI) and 12 months PI <b>Groups:</b> 1) <i>PET</i> ; 2) <i>Behaviour Modification training</i> ; 3) <i>Adlerian Mother-Study groups</i> ; 4) <i>PET (1 month follow-up)</i> ; 5) <i>Control group (CG, mixture of parent information class and no intervention)</i>
		<b>Participants:</b> Parents (N=47): 23 – 50 years, average age NR, 0% male; Children (N=47): 4 – 8 years, average age NR, 68% male <i>Attendance: NR; Attrition: 6%</i>
		<b>Observational measure:</b> Coding developed for project, based on Bee (1967), Bing (1963) and Farina (1960) 20 codes, based on 8 factors: <i>Respect, Dominance, Independence of child, Fostering dependence, Dependence of child, Warmth, Mother achievement motivation, Disagreement</i> <b>Procedure:</b> Laboratory video-taped interactions: 7 minutes of jigsaw task (Bee, 1967; Bing, 1963); and problem-solving discussion based on The Family Interaction Task (Farina, 1960).
		<b>Observational findings:</b> <ol style="list-style-type: none"> <li>1. Compared to control group, PET and Behaviour Modification Therapy demonstrate greater <i>touching (warmth)</i>, <i>child speaks last (reduced maternal dominance)</i>, and <i>mother holds puzzle piece (mother achievement motivation)</i></li> <li>2. Compared to PET 1 month, PET 12 months demonstrates reduced negative encouragement (<i>fostering of dependency</i>)</li> </ol>
		<b>Limitations:</b> 1) intervention fidelity not monitored; 2) no intention-to-treat analysis; 3) small sample sizes

<b>2. Puckering et al. (1996)</b>  <i>Scotland</i>  N=1  Mother with parenting difficulties attending a Family Centre ( <i>targeted</i> )	<b>Mellow Parenting</b>  14 sessions (plus three booster sessions)  Family Centre	<b>Aim:</b> To illustrate process and changes in parent-child interaction, well-being and child behaviour following intervention
		<b>Design:</b> <u>Case Study</u> , Follow-up: 12 months PI
		<b>Participant:</b> 30 year old mother; 23 month old child
		<b>Observational measure:</b> Mellow Parenting Coding System, adapted from Puckering, Rogers, Mills, Cox, & Raff (1994) Codes: <i>Anticipation (positive and negative), Autonomy (positive and negative), Co-operation (positive and negative), Warmth and stimulation (positive and negative), Containment of distress (positive and negative), Miscellaneous (negative), Time spent in control, Parenting style</i> <b>Procedure:</b> Home video-taped meal-time interactions
		<b>Observational findings:</b> <ol style="list-style-type: none"> <li>1. Increased positive interactions (<i>Autonomy, Warmth and stimulation, and Containment of distress</i>)</li> <li>2. Reduced negative interactions (<i>Autonomy, Cooperation, Warmth and stimulation, Containment of distress, Miscellaneous negative</i>)</li> <li>3. Reduced amount of interaction concerned with controlling child</li> <li>4. Parenting style changed from restrictive, unattached, minimally responsive to appropriate control, warmth, calm involvement and high responsiveness</li> <li>5. Increased involvement</li> </ol>
		<b>Limitations:</b> 1) No statistical analysis; 2) single-case
<b>3. Puckering et al. (2011)</b>  <i>Scotland</i>  N = 12 ( <i>relevant manualised intervention n = 4</i> )  Parents of children aged 6 –	<b>Mellow Parenting</b>  14 weeks  One group delivered in a Special Education school; NR for	<b>Aim:</b> To assess whether it would be worthwhile to carry out an RCT to evaluate the effectiveness of intervention for RAD and different adaptations of the programme
		<b>Design:</b> <u>Cohort Study</u> , pooled data from three trials: Follow-up: immediately PI <b>Trials:</b> 1) <i>Mellow Parenting plus a child intervention</i> ; 2) <i>Mellow Parenting plus video interaction guidance and no child inclusion</i> ; 3) <i>Mellow Parenting</i>
		<b>Participants:</b> Parents (N=12): age NR, 0% (mothers only); Children (N = 12): Age NR, 75% male Attendance: NR; Attrition: 8%
		<b>Observational measures:</b> Mellow Parenting Rating System (Puckering et al., 1996) Codes: <i>Positive interactions</i> and <i>Negative interactions</i> (summarised from anticipation, warmth and stimulation,

9 years diagnosed with Reactive Attachment Disorder (RAD); recruited from previous research study of RAD or school for Emotional and Behavioural Difficulties ( <i>targeted</i> )	the two other groups	autonomy, cooperation, containment of distress and miscellaneous.) <b>Procedure:</b> observation of mealtime at home
		<b>Observational findings:</b> No significant differences between the three trials, so data combined (N=12) No changes
		<b>Limitations:</b> 1) Small sample with large SD; 2) adherence to group protocol not reported; 3) no intention to treat analyses; 4) attendance NR; 5) systematic differences in groups (group three recruited through a school, rather than a research study)
<b>4. Scott, Spencer, Doolan, Jacobs, &amp; Aspland (2001)</b>  <i>England</i>  N = 141 ( <i>intervention n = 90</i> ) ( <i>observed n = 20</i> )  Parents of children aged 3 – 8 years referred to mental health service for antisocial behaviour ( <i>targeted</i> )	<b>Webster-Stratton</b>  (indistinguishable from Incredible Years BASIC)  13 – 16 sessions  Child Mental Health Service	<b>Aim:</b> To evaluate the effectiveness of intervention for reducing antisocial behaviour in standard clinical settings
		<b>Design:</b> <u>Controlled Clinical Trial</u> ; Follow-up: 6 months post-baseline (PB) <b>Groups:</b> 1) <i>Incredible Years BASIC</i> ; 2) <i>Waiting list control</i>
		<b>Participants:</b> Parents (N=141): age NR, gender NR; Children (N=141): 5.9 years, 76% male <i>Attendance: 82% attended five or more sessions (considered to have dropped out if attended four or fewer); Attrition: 12%</i>
		<b>Observational measure:</b> Aspland (2001) coding system Codes: ratio of <i>Praise</i> to <i>Inappropriate commands</i> <b>Procedure:</b> Home video-taped structured play session (18 minutes)
		<b>Observational findings:</b> Compared to CG: 1. Intervention group demonstrated increased ratio of <i>Praise</i> to <i>Inappropriate commands</i>
		<b>Limitations:</b> 1) Short-term follow-up; 2) Intention-to-treat analysis not reported for observational data; 3) observational data only obtained for 20 participants, selected at random
<b>5. Gardner, Burton, &amp; Klimes (2006)</b>  <i>England</i>  N = 76 ( <i>intervention n = 44</i> )	<b>Incredible Years</b>  (indistinguishable from IY BASIC)  14 sessions	<b>Aims:</b> To evaluate the effectiveness of intervention delivered in community voluntary sector to reduce conduct problems
		<b>Design:</b> <u>Randomised Control Trial (RCT)</u> and <u>cohort study</u> for 18 month follow-up; Follow-up: 6 months PB, 18 months PB <b>Groups:</b> 1) <i>Incredible Years BASIC</i> , 2) <i>Waiting list control</i>
		<b>Participants:</b> Parents (N=76): 30.6 years, 10.5% male; Children (N=76): 5.9 years, 77% male <i>Attendance: 64%; Attrition: 16%</i>

<p>Parents of children aged 2 – 9 years with difficult to manage children referred by health and social services, and 29% self-referral; scored above cut-off on Eyberg Child Behaviour Inventory (ECBI) (<i>targeted</i>)</p>	Community venues	<p><b>Observational measures:</b> Own validated coding system (Gardner, Sonuga-Barke, &amp; Sayal, 1999b) Codes: <i>Positive parenting skills</i> (included praise, positive and proactive discipline); <i>Negative parenting</i> (included hit, yell, rude, threaten, negative command), <i>Child negative behaviour</i> (comprised non-comply, hit, yell, destructive, rude, threaten) <b>Procedure:</b> Home video-taped of structured and unstructured interaction (50 minutes)</p>
		<p><b>Observational findings:</b> Compared to CG:</p> <ol style="list-style-type: none"> <li>1. Increased <i>Positive parenting</i></li> <li>2. Decreased <i>Negative parenting</i></li> <li>3. All maintained at 18 months PB (cohort study only)</li> </ol>
		<p><b>Limitations:</b> 1) No control group for long-term follow-up; 2) outcome assessors not always able to remain blind to allocation; 3) low programme attendance; 4) no intention-to-treat analysis</p>
<p><b>6. Hutchings et al. (2007)</b></p> <p><i>Wales</i></p> <p>N = 153 (<i>intervention n = 104</i>)</p> <p>Parents of children aged 3 – 4 years living in Sure Start areas (socially deprived) and referred to Health Visitors with problem behaviour; scored above clinical cut-off on ECBI (<i>targeted</i>)</p>	<p><b>Incredible Years BASIC</b></p> <p>12 sessions</p> <p>Community venues</p>	<p><b>Aims:</b> To evaluate the effectiveness of intervention as preventative treatment for preschool children at risk of developing conduct disorder</p>
		<p><b>Design:</b> <u>RCT</u>; Follow-up: 6 months PB <b>Groups:</b> 1) <i>Incredible Years BASIC</i>; 2) <i>Waiting list control</i></p>
		<p><b>Participants:</b> Parents (N=153): 21.1 years at birth of first child, gender NR: Children (N=153): 46.1 months, 56% male <i>Attendance: 77%, 58% attended seven or more sessions; Attrition: 13%</i></p>
		<p><b>Observational measures:</b> Dyadic Parent-Child Interaction Coding System (DPICS, Eyberg &amp; Robinson, 1981) Codes: <i>Positive parenting</i> (sum of positive affect, physical positive, labelled and unlabelled praise, problem-solving), <i>Critical parenting</i> (sum of negative commands, critical behaviours) <b>Procedure:</b> Home video-taped interaction (30 minutes)</p>
		<p><b>Observational findings:</b> Compared to CG:</p> <ol style="list-style-type: none"> <li>1. Increased <i>Positive parenting</i></li> <li>2. Decreased <i>Critical parenting</i> (in per protocol analysis only)</li> </ol>
		<p><b>Limitations:</b> 1) No longer-term follow-up</p>

<b>7. Cummings &amp; Wittenberg (2008)</b>  <i>Canada</i>  N = 54 <i>(intervention n = 27)</i>  Parents of children aged 2 – 6 years referred to psychiatric clinic for externalising behaviour problems; diagnosis of ODD or BDD-NOS; CBCL or ECBI score above clinical cut-off ( <i>targeted</i> )	<b>Incredible Years BASIC</b>  12 – 14 sessions  Psychiatric outpatient clinic	<b>Aims:</b> To evaluate the effectiveness of Supportive Expressive Therapy – Parent Training (SET-PT, new therapy) to treat early appearing externalising behaviour problems, compared to IY (B)
		<b>Design:</b> <u>RCT</u> ; Follow-up: Immediately PI, 12 months PI <b>Groups:</b> 1) SET-PT ( <i>psychodynamic interaction</i> ); 2) <i>Incredible Years BASIC</i>
		<b>Participants:</b> Parents (N=54): 38.2 years, 4% male; Children (N=54): 4.2yrs, 61% male <i>Attendance: NR; Attrition: 41%</i>
		<b>Observational measures:</b> Crowell Coding Manual (Crowell & Fleishman, 1993) Codes: <i>Parent positive</i> (sum of positive affect, behavioural responsiveness, emotional responsiveness), <i>Parent negative</i> (sum of depression, irritability and anger, aggression) <b>Procedure:</b> Laboratory video-taped structured observation (45 minutes) based on Crowell procedure (Crowell & Fleishman, 1993)
		<b>Observational findings:</b> Compared to SET-PT: 1. Increased <i>Parent positive</i> for IY(B) PI and 12 months PI
		<b>Limitations:</b> 1) High attrition and demographic of drop outs differed significantly from completers (may have biased the sample of completers); 2) intervention fidelity assessed only through group leader checklists; 3) no intention to treat analysis; 4) unknown group attendance
<b>8. Bywater et al. (2009)</b>  <i>Wales</i>  N = 104  Parents of children aged 3 – 4 years at risk of conduct disorder; attending Sure Start centre and scoring above clinical cut-off on ECBI ( <i>targeted</i> )	<b>Incredible Years BASIC</b>  12 sessions  Venue NR	<b>Aims:</b> To evaluate the longer-term effects of intervention for children at risk of conduct problems
		<b>Design:</b> <u>Cohort Study</u> , (follow up to Hutchings et al., 2007): Follow-up: 6 months PB, 12 months PB and 18 months PB
		<b>Participants:</b> Parents (N=79): 21.5 years at birth of first child, Gender NR; Children (N=79): 46.3 months, 56% males <i>Attendance: 77%; Attrition: 24%</i>
		<b>Observational measures:</b> DPICS (Eyberg & Robinson, 1981) Codes: <i>Positive parenting</i> (sum of positive affect, physical positive, labelled and unlabelled praise, problem-solving); <i>Critical parenting</i> (sum of negative commands, critical behaviours) <b>Procedure:</b> Home observation, no further details reported

		<b>Observational findings:</b> <ol style="list-style-type: none"> <li>1. Intervention effect established in RCT at 6 months PB (see Hutchings et al., 2007)</li> <li>2. Maintained for all measures at 12 months PB and 18 months PB</li> </ol>
		<b>Limitations:</b> 1) Lack of control group for 12 and 18 months PB; 2) raters not blind to condition after 6 months PB; 3) no formal assessment of intervention fidelity other than weekly supervision
<b>9. McGilloway et al. (2012)</b>  <i>Ireland</i>  N = 149 (96 for observational data) <i>(intervention n=103, 80 observational data)</i>  Parents of children aged 2 – 7 years referred to local organisations and health services for problem behaviour; ECBI score above clinical cut-off <i>(targeted)</i>	<b>Incredible Years BASIC</b>  14 sessions  Community venues	<b>Aim:</b> To evaluate the effectiveness of intervention for improving behaviour problems and social adjustment, and parental competence and well-being <b>Design:</b> <u>RCT</u> ; Follow-up: 6 months PB <b>Groups:</b> 1) <i>Incredible Years BASIC</i> ; 2) <i>Waiting list control</i> <b>Participants:</b> Parents (N = 149: 24.7 years mother's age at birth of first child, 4% male; Children (N=149): 57.3 months, 62% male <i>Attendance: 60%; Attrition: 8% (17% for observational data)</i> <b>Observational measure:</b> Dyadic Parent-Child Interaction Coding System – Revised (Robinson & Eyberg, 1981) Codes: <i>Positive parenting</i> (summary of praise and encouragements and positive physical behaviours), <i>Critical parenting</i> (summary of negative commands, critical statements, physical negative behaviours) <b>Procedure:</b> Live observation of 30 minutes home interaction engaged in play <b>Observational findings:</b> Compared to CG: 1. Reduced <i>Critical parenting</i> <b>Limitations:</b> 1) No independent measure of treatment fidelity (supervision and self-report checklists only); 2) observational data limited to half the sample, although no systematic bias (n=56); 3) low attendance in group (60%); 4) children lost to follow-up had higher SCR scores (less severe difficulties)
<b>10. Posthumus, Raaijmakers, Maassen, van Engeland, &amp; Matthys (2012)</b>  <i>Netherlands</i>	<b>Incredible Years BASIC and ADVANCE</b>  18 sessions plus 2 booster sessions	<b>Aims:</b> To evaluate the effectiveness of intervention for preventing conduct problems <b>Design:</b> <u>Controlled Clinical Trial</u> ; Follow-up: 1) immediately PI, 2) 1 year PI, 3) 2 years PI <b>Groups:</b> 1) <i>Incredible Years (BASIC and ADVANCE)</i> ; 2) <i>Treatment as usual</i> <b>Participants:</b> Parents (N = 144): 34.8 years, 14% male; Children (N=144): 51 months, 71% male <i>Attendance: 78%; Attrition: 22%</i> <b>Observational measures:</b> Dyadic Parent-Child Interaction Coding System – Revised (Robinson & Eyberg, 1981)



<p>N = 144 (intervention n=72)</p> <p>Parents of preschool children at risk of conduct disorder; population sample scoring at or above 80<sup>th</sup> percentile on CBCL (targeted)</p>	Community venues	<p>Codes: <i>Critical statements, Labelled praise,</i></p> <p><b>Procedure:</b> Videotaped home observation for 20 minutes: 5 minutes free play, 5 minutes child-led play, 5 minutes parent-led play, 5 minutes tidy up</p>
		<p><b>Observational findings:</b> Compared to CG:</p> <ol style="list-style-type: none"> <li>1. <i>Critical statements</i> reduced at PI, and maintained</li> <li>2. <i>Labelled praise</i> reduced at PI but not maintained</li> </ol>
		<p><b>Limitations:</b> 1) No intention-to-treat analysis</p>
<p><b>11. Azevedo, Seabra-Santos, Gaspar, &amp; Homem (2013)</b></p> <p><i>Portugal</i></p> <p>N=100 (intervention n=52)</p> <p>Mothers of children aged 3 – 6 years with early signs of ADHD; borderline cut-off on SDQ, 80<sup>th</sup> percentile WWPAS (targeted)</p>	<p><b>Incredible Years BASIC</b></p> <p>14 sessions plus 2 booster sessions</p> <p>University and clinic settings</p>	<p><b>Aims:</b> To evaluate the effectiveness of intervention for children at risk of ADHD</p>
		<p><b>Design:</b> <u>Controlled Clinical Trial</u>; Follow up: 6 months PB</p> <p><b>Groups:</b> 1) <i>Incredible Years BASIC</i>; 2) <i>Waiting list control</i></p>
		<p><b>Participants:</b> Primary caregivers (all female, 94% mothers) N=100: 35.5years; Children (N=100): 4.3 years, 72% male</p> <p><i>Attendance: 79%; Attrition: 13% (33% for observational data, some due to technical difficulties)</i></p>
		<p><b>Observational measures:</b> Dyadic Parent-Child Interaction Scale (DPICS, Eyberg &amp; Robinson, 1981)</p> <p>Codes: <i>Positive parenting</i> (summary of labelled and unlabelled praise, positive affect, physically positive behaviour, problem-solving)); <i>Coaching</i> (summary of descriptive/encouragement statements and questions, reflective statements and questions, problem-solving); <i>Critical parenting</i> (summary of critical statements, negative commands)</p> <p><b>Procedure:</b> Videotaped laboratory interaction (25 minutes)</p>
		<p><b>Observational findings:</b> Compared to control group:</p> <ol style="list-style-type: none"> <li>1. Increased <i>Positive parenting</i></li> <li>2. Increased <i>Coaching</i> (in per protocol analysis only)</li> <li>3. No change in <i>Critical parenting</i></li> </ol>
		<p><b>Limitations:</b> 1) Baseline differences in <i>Coaching</i> (superior in intervention group) not controlled for statistically; 2) Several observations missing due to technical difficulties</p>

<b>12. Azevedo, Seabra-Santos, Gaspar, &amp; Homem (2014)</b>  <i>Portugal</i>  N=52  Mothers of children aged 3 – 6 years with early signs of ADHD; borderline cut-off on SDQ, 80 <sup>th</sup> percentile WWPAS (targeted)	<b>Incredible Years BASIC</b>  14 sessions plus two booster sessions  University and clinic settings	<b>Aims:</b> To evaluate the 12-month efficacy of intervention for children at risk of ADHD
		<b>Design:</b> <u>Cohort Study</u> (follow-up to Azevedo et al., 2013); Follow-up: 12 months PB
		<b>Participants:</b> Primary caregivers (all female, 92% mothers) N=52; 36.4 years; Children (N=52): 4.2 years, 71% male <i>Attendance: 79%; Attrition: 15% (35% for observational data, some loss due to technical difficulties)</i>
		<b>Observational measures:</b> Dyadic Parent-Child Interaction Scale (DPICS, Eyberg & Robinson, 1981) Codes: <i>Positive parenting</i> (summary of labelled and unlabelled praise, positive affect, physically positive behaviour, problem-solving); <i>Coaching</i> (summary of descriptive/encouragement statements and questions, reflective statements and questions, problem-solving); <i>Critical parenting</i> (summary of critical statements, negative commands) <b>Procedure:</b> Videotaped free-play laboratory interaction (25 minutes)
		<b>Observational findings:</b> Compared to post-group assessment: 1. Improved <i>Positive parenting</i> maintained 2. Improved <i>Coaching</i> not maintained
		<b>Limitations:</b> 1) <i>Critical parenting</i> not reported so no assessment of “sleeper effects”; 2) no control group; 3) Several observations missing due to technical difficulties
<b>13. McGilloway et al. (2014)</b>  <i>Ireland</i>  N=103 (59 observational data)  Parents of children aged 2 – 7 years referred to local organisations and health services for problem	<b>Incredible Years BASIC</b>  14 sessions  Community venues	<b>Aim:</b> To evaluate the 12-month effectiveness of intervention for improving behaviour problems and social adjustment, and parental competence and well-being
		<b>Design:</b> <u>Cohort Study</u> (follow up to McGilloway et al., 2012); Follow-up: 6 months PB, 12 months PB
		<b>Participants:</b> Parents (N=103): 33 years, 5% male; Children (N=103): 59 months, 58% male <i>Attendance: 61%; Attrition: 16%</i>
		<b>Observational measures:</b> Dyadic Parent-Child Interaction Coding System – Revised (Robinson & Eyberg, 1981) Codes: <i>Positive parenting</i> (summary of praise and encouragements and positive physical behaviours), <i>Critical parenting</i> (summary of negative commands, critical statements, physical negative behaviours) <b>Procedure:</b> Live observation of 30 minutes home interaction engaged in play
		<b>Observational findings:</b> Compared to baseline: 1. Increase in <i>Positive parenting</i> , maintained at 12 months 2. Reduction in <i>Critical parenting</i> , maintained at 12 months

behaviour; ECBI score above clinical cut-off ( <i>targeted</i> )		<b>Limitations:</b> 1) fidelity assessed through checklist only; 3) low group attendance; 3) observational data for second cohort only due to technical difficulties; 4) implied greater social disadvantage in second cohort compared to first cohort, but not reported statistically
<b>14. Sharry, Guerin, Griffin, &amp; Drumm (2005)</b>  <i>Ireland</i>  <i>N = 29</i>  Parents of children aged 2 – 5 years referred to a child mental health service ( <i>targeted</i> )	<b>Parent Plus Early Years (PPEY)</b>  7 group sessions and 5 individual sessions  Clinic	<b>Aim:</b> To evaluate the effectiveness of intervention in addressing the needs of parents of preschool children referred to general mental health clinics
		<b>Design:</b> <u>Cohort</u> ; Follow-up: immediately PI
		<b>Participants:</b> Parents (N = 24): age NR, 4% male; Children (n=25, one set of twins): 3.9years, 68% male, almost all had multiple difficulties (e.g. developmental, behavioural, emotional) <i>Attendance: NR; Attrition: 17%</i>
		<b>Observational measures:</b> Forehand (1978) coding system Codes: <i>Commands, Questions, Parent attends, Rewards, Negatives, Child attends</i> <b>Procedure:</b> Clinic video-taped 5 minute play session and tidy up
		<b>Observational findings:</b> Compared to baseline: 1. Reduced <i>Commands</i> at PI 2. Increased <i>Parent attends</i>
		<b>Limitations:</b> 1) No control group; 2) modest sample size; 3) intervention fidelity monitored only through supervision; 4) attendance not reported
<b>15. Feinberg, Kan, &amp; Goslin (2009)</b>  <i>USA</i>  <i>N = 169 (intervention n = 89)</i>  Couples expecting first child, recruited through	<b>Family Foundations</b>  8 sessions  Antenatal clinic in hospital	<b>Aims:</b> To evaluate the effectiveness of intervention to improve co-parenting, parenting quality, and reduce later childhood problems
		<b>Design:</b> <u>Controlled Clinical Trial</u> ; Follow-up: 6 months PI <b>Groups:</b> 1) <i>Family Foundations</i> ; 2) <i>treatment as usual plus a brochure about choosing childcare</i>
		<b>Participants:</b> Expectant couples (N=169): 29.0 years; 50% male (by design of being heterosexual couples); Children (N=170, one set of twins): 1 year, gender NR <i>Attendance: 69%; Attrition: 8%</i>
		<b>Observational measure of parent-child interaction:</b> Own coding system (adapted from prior systems) Codes: <i>Positivity</i> (sensitivity, positive affect, support for exploration); <i>Negativity</i> (irritability, anger, hostility towards child)

antenatal services, health settings and public advertisement ( <i>universal</i> )		<b>Procedure:</b> Home observation of 12 minutes free play and 6 minutes parents trying to help child achieve a demanding task
		<b>Observational findings of parent-child interaction:</b> Compared to CG: 1. Increased <i>Positivity</i> 2. Reduced <i>Negativity</i> (fathers only)
		<b>Limitations:</b> 1) No longer-term follow-up; 2) middle class and well-educated sample by excluding young (under 18 years) and single parents
<b>16. Hahlweg et al. (2010)</b>  <i>Germany</i>  N = 280 <i>(intervention n=186)</i>  Parents of children aged 2 – 6 years attending mainstream primary schools ( <i>universal</i> )	<b>Triple P (Standard)</b>  4 group sessions and 4 optional individual telephone calls  Community venues	<b>Aims:</b> To evaluate the effectiveness of interventions for preventing child behaviour problems
		<b>Design:</b> <u>Controlled Clinical Trial</u> ; Follow-up: 12 months PB <b>Groups:</b> 1) <i>Triple P</i> ; 2) <i>No intervention</i>
		<b>Participants:</b> Parents (N=280 families): 35 years (mothers) and 38 years (fathers), 3% male for observational data, Children (N=280): 4.5 years, 51% male <i>Attendance: 88.4 % mothers attended 3 – 4 sessions; 6.3% fathers attended 3 – 4 sessions; 23% declined telephone contact; Attrition:16%</i>
		<b>Observational measures: Revised Family Observation Schedule (Sanders, Tully, &amp; Hynes, 1996)</b> Codes: <i>Positive parent</i> (praise, contact, question, instruction, attention, affection); <i>Negative parent</i> (negative physical contact, aversive question or instruction, aversive attentions, interruption), <b>Procedure:</b> Home observation, 20 minute structured task, adapted from Mahon & Estes (1993)
		<b>Observational findings:</b> Compared to CG: 1. Two-parent families: no significant difference 2. Single-parent families: increased <i>positive parenting</i> , reduced <i>negative parenting</i>
		<b>Limitations:</b> 1) More single parents in CG so separated analyses to control (resultant loss of power), 2) Statistics difficult to interpret using non-standard measures of effective size

<b>17. Sleet et al. (2013)</b>  <i>England</i>  N = 163 (intervention n=88)  Mother and baby dyads in Mother and Baby Unit prisons (targeted)	<b>New Beginnings</b>  8 sessions  Prison	<b>Aims:</b> To evaluate the outcomes of intervention on mother and baby dyads in prison
		<b>Design:</b> <u>Cluster RCT</u> ; Follow-up: immediately PI <b>Groups:</b> 1) <i>New Beginnings</i> ; 2) <i>TAU</i>
		<b>Participants:</b> Mothers (N=163): 28.6 years; Children (N=163): 4.7 months, 39% male <i>Attendance: 87%; Attrition: 49%</i>
		<b>Observational measures:</b> Coding Interactive Behaviour Scales (Feldman, 1998) Factors: <i>Dyadic attunement, positive engagement</i> <b>Procedure:</b> Videotaped free play for 10 minutes
		<b>Observational findings:</b> Compared to CG: 1. Superior <i>Dyadic attunement</i> 2. Superior <i>Positive engagement</i> increased (in per protocol analysis only)
		<b>Limitations:</b> 1) no longer-term follow-up; 2) high attrition (due to mothers moving to other prisons); 3) groups not well-matched (control group more ethnically diverse and had higher levels of reflective functioning, results may therefore reflect regression to the mean).

### *Quality assessment*

The quality of each study (pertaining to its report of observational measures of parent-child interaction) was rated using the Quality Assessment Tool for Quantitative Studies. This tool was developed by the Effective Public Health Practice Project (EPHPP, Appendix C) and comprises six component ratings, from which a judgement of the overall methodological quality is made. The six components are: 1) selection bias; 2) study design; 3) confounders; 4) blinding; 5) data collection methods; and 6) withdrawals and drop-outs. Each component, and ultimately the overall methodology, receives a rating of ‘weak’, ‘moderate’ or ‘strong’.

The EPHPP tool has been shown to have moderate to substantial inter-rater reliability ( $\kappa=0.61$  to 0.74), and acceptable construct validity (63–92% agreement) when compared to ratings made using the established Guide to Preventative Community Services (Thomas, Ciliska, Dobbins, & Micucci, 2004). Moreover, the EPHPP tool has been shown to have inter-rater reliability for overall judgements of methodological bias superior to the Cochrane Review Risk of Bias Tool (Armijo-Olivo, Stiles, Hagen, Biondo, & Cummings, 2012). To reduce subjective bias in the use of this tool, 10% of the studies ( $n=2$ ) were reviewed by a colleague. Discrepancies were discussed and the second rater was satisfied that author’s scoring was justified.

Following this process, the level of evidence provided by each study was rated according to the criteria published by NICE (2006, Appendix D). Ratings are based on the study design and risk of bias, and range from 1<sup>++</sup> (high quality) to 4 (low quality).

## **Results**

### *Description of studies*

#### i. Sample size

The combined sample contained 1436 parents (including six non-parent primary care-givers), and 1269 children (338 parents were recruited as couples but assessed individually; two sets of twins). The above totals exclude the participants ( $n=215$ ) involved in Azevedo et al. (2014), Bywater et al. (2009) and McGilloway et al. (2014) to avoid double-counting since these were follow-up studies of Azevedo et al. (2013), Hutchings et al. (2007), and McGilloway et al. (2012), respectively. The individual sample sizes ranged from 12 to 338

parents, excluding a case study with a single participant (Puckering et al., 1996). The mean number of parents recruited to each study (excluding the three follow-up cohorts) was 108 (SD=91.3). Attrition ranged from 0 – 49% (mean=20%, SD=13.4).

ii. Sample characteristics

The studies were carried out in a range of countries. Reflecting the nature of the specific interventions, three studies recruited participants from the general population (Feinberg et al., 2009; Hahlweg et al., 2010; Schultz & Nystul, 1980); the remaining 11 studies targeted parents who were experiencing difficulties with parenting and/or their child's behaviour. The three samples recruited from the general population were relatively advantaged in terms of education and/or social status compared to the wider population. In contrast, six out of the 11 targeted samples were relatively disadvantaged economically and/or socially. Three targeted samples had average levels of education above that of the wider population (Azevedo et al., 2013; Cummings & Wittenberg, 2008; Posthumus et al., 2012); two targeted studies did not report this information (Puckering et al., 2011; Sharpy et al., 2005).

The mean ages of parents ranged from 25 – 38 years, although mean age was not reported in three studies. Five studies were designed to only include mothers. The percentage of fathers participating in the remaining studies ranged from 3 – 14%, although it was 50% in Feinberg et al. (2009) as parents were recruited as heterosexual couples. The gender ratio was not reported in two studies (Scott et al., 2001; Hutchings et al., 2007).

The mean age of the children in the studies varied from 0.4 – 5.9 years (range 0.1 to 9 years). Shultz & Nystul (1980) studied children in the range 4 – 8 years but did not report mean age. Ten of the 14 studies reported that over 60% of the children in their sample were boys.

By design, the children recruited to the targeted interventions presented a range of behavioural and emotional difficulties (e.g. conduct problems). The exception to this was the study by Slead et al. (2013), who assessed babies residing with their mothers in prison. Children with developmental or learning disabilities, or mental health problems were explicitly excluded from five studies; only four of the remaining six studies (excluding Slead et al., 2013) reported whether the children had other conditions.

### iii. Interventions

The most frequently studied intervention (six studies, three follow-up studies) was the Incredible Years BASIC programme. One study (Posthumus et al., 2012) evaluated the Incredible Years ADVANCED programme, which is an eight session extension to the BASIC programme for parents with complex interpersonal difficulties. Four studies (Azevedo et al., 2013; Cummings et al., 2008; Hutchings et al., 2007; Posthumus et al., 2012) used the Early Years version of the programme. The remaining studies did not specify which age-related version was used.

Two studies evaluated Mellow Parenting, although one of these studies, Puckering et al. (2011), was a multi-trial study in which two out of three trials evaluated the intervention with adaptations for children with Reactive Attachment Disorder (RAD); nevertheless, they found no significant differences between the intervention versions and data were pooled for the analysis.

Finally, each of the following interventions were evaluated by a single study: Parent Effectiveness Training (Schultz & Nystul, 1980), Parents Plus Early Years (Sharry et al., 2005), Family Foundations (Feinberg et al., 2009), Triple P (Hahlweg et al., 2010) and New Beginnings (Sleed et al., 2013). A summary of the interventions is presented in Table 4.



**Table 4.** *Summary of interventions evaluated in the review (adapted from DfE, 2012)*

<b>Intervention</b> <i>Number of studies</i>	<b>Target population</b>	<b>Delivery</b>	<b>Long-term aims</b>	<b>Theoretical basis and mechanism of change</b>	<b>Curriculum content</b>
Incredible Years BASIC (IYB)  <i>9 studies</i>	<i>Targeted</i>  Parents of children age 1 -12 years: <ul style="list-style-type: none"> <li>• Living in poverty;</li> <li>• Risk of abuse;</li> <li>• Social or emotional behaviour; problems, or</li> <li>• ADHD</li> </ul>	<i>12 sessions</i> <ul style="list-style-type: none"> <li>• Videotaped vignettes</li> <li>• Group discussion</li> <li>• Role play</li> <li>• A workbook</li> <li>• Self-reflection and goal-setting</li> </ul>	To prevent conduct disorder, delinquency, drug abuse and violence	<i>Cognitive/behavioural-based</i>  Parents learn effective behaviour management strategies and perceive themselves as more competent; parent-child relationship improves and leads to improved child self-regulation and behaviour	<ul style="list-style-type: none"> <li>• Positive behaviour management strategies (e.g. praise, incentives, responsibility)</li> <li>• Reduce harsh discipline</li> <li>• Boundary setting with gentle consequences for non-compliance</li> <li>• Improving parent-child interaction (e.g. through child-led play)</li> <li>• Parental support of social, emotional and academic achievement</li> </ul>
Incredible Years ADVANCE (IYA)  <i>1 study</i>	<i>Targeted</i>  As for BASIC, but parents with more complex interpersonal issues	<i>8 sessions</i> As for BASIC	As for BASIC	<i>Cognitive/behavioural-based</i>  To supplement BASIC as parents learn CBT strategies to manage their own difficulties, improve communication, and problem-solving skills	<ul style="list-style-type: none"> <li>• Communication skills</li> <li>• CBT strategies to manage anger and depression</li> <li>• Parent and child problem-solving skills</li> </ul>
Mellow Parenting (MP)  <i>2 studies</i>	<i>Targeted</i>  Parents of children age 0 – 5 years: <ul style="list-style-type: none"> <li>• Complex health and social needs; and</li> <li>• Child protection concerns</li> </ul>	<i>14 sessions</i> <ul style="list-style-type: none"> <li>• Two home visits</li> <li>• Review of filmed interactions</li> <li>• Psychotherapeutic group discussion</li> <li>• Shared lunch and activity with children (filmed)</li> <li>• Homework</li> </ul>	Improved parent and child well-being, positive parent-child interaction, normalise child development, improved parental competence, child removed from Child Protection Register	<i>Relationship-based</i>  Parents have the opportunity to repair difficult feelings from their own childhood that may be interfering with their ability to parent sensitively; sensitive parenting fosters child development and well-being	<ul style="list-style-type: none"> <li>• Links between childhood experience and current parenting</li> <li>• Child development education</li> <li>• Observation skills</li> <li>• Behaviour management</li> <li>• Sibling issues</li> </ul>

**Table 4.** *Continued.*

<b>Intervention</b> <i>Number of studies</i>	<b>Target population</b>	<b>Delivery</b>	<b>Long-term aims</b>	<b>Theoretical basis and mechanism of change</b>	<b>Curriculum content</b>
Parent Effectiveness Training (PET)  <i>1 study</i>	<i>Universal</i>  Parents with normal parenting concerns interested better understanding their child aged 0 - 18 years	<i>8 sessions</i> • Facilitator presentation • Group discussion • Role play • Workbook	Improved parent-child relationship, increased parental understanding and respect for child, reduced family conflict and improved child self-esteem	<i>Relationship-based</i>  Parents have a better understanding of their child's needs and can help them make better choices about their behaviour; child learns less disruptive methods of expressing needs; family conflict is reduced and self-esteem increases	<ul style="list-style-type: none"> <li>• Distinguish acceptable from unacceptable behaviour</li> <li>• Active listening</li> <li>• Expressing feelings ("I messages")</li> <li>• No-lose problem-problem solving for unacceptable behaviour</li> <li>• Resolving behaviour and values conflict</li> </ul>
Triple P (Standard)  <i>1 study</i>	<i>Universal to mild targeted</i>  Parents of children aged 2 – 12 years with mild behaviour problems	<i>4 sessions</i> • Videotaped vignettes • Workbook • Homework • Role play • Group discussion • Four individual telephone sessions	Improved social interaction, self-regulation of anger and mood, child independence and problem-solving; improved parental competence and well-being	<i>Cognitive/behavioural-based</i>  Parents are taught to replace behaviours that reinforce unacceptable behaviour with positive strategies to encourage acceptable behaviour and improve family interaction	<ul style="list-style-type: none"> <li>• Strategies to promote child competence and development (e.g. praise and play)</li> <li>• Strategies to reduce unacceptable behaviour (e.g. time-out)</li> <li>• Strategies to anticipate and manage difficult situations</li> </ul>
Family Foundations (FF)  <i>1 study</i>	<i>Universal</i>  Parents expecting their first child	<i>9 sessions</i> • Videotaped vignettes • Role play • Group discussion • Homework • Handouts	Increased warmth and sensitive parenting, improved child self-regulation and behaviour	<i>Cognitive/behavioural and relationship-based</i>  Improved parental self-regulation leads to better coping with stressful transition to parenthood; co-parenting relationship improves, reduced family stress promotes attachment security, behaviour self-regulation and learning	<ul style="list-style-type: none"> <li>• Coping strategies for transition to parenthood</li> <li>• Co-parenting strategies (communication, conflict resolution)</li> <li>• Sensitive responding to child</li> <li>• Advice for sleep routine</li> <li>• Child development</li> </ul>

**Table 4.** *Continued.*

<b>Intervention</b> <i>Number of studies</i>	<b>Target population</b>	<b>Delivery</b>	<b>Long-term aims</b>	<b>Theoretical basis and mechanism of change</b>	<b>Curriculum content</b>
Parents Plus Early Years (PPEY)  <i>1 study</i>	<i>Targeted</i>  Parents of children aged 1 – 6 years: • Behaviour, emotional, learning, or development problems; • ADHD	<i>8 – 10 sessions</i> • Videotaped vignettes • Role play • Group discussion • Homework • Handouts • Optional individual sessions	Improved prosocial behaviour/reduced antisocial behaviour, improved parent and child well-being; improve school achievement	<i>Cognitive/behavioural-based</i>  Parents are helped to reflect on the consequences of their actions and given knowledge of effective parenting strategies; parents make better discipline choices and respond more positively to child	<ul style="list-style-type: none"> <li>• Positive parenting practices (e.g. child-led play, active listening, praise, encouragement)</li> <li>• Positive discipline practices (effective rules and consequences)</li> <li>• Increase parental support of language and learning development</li> </ul>
New Beginnings (NB)  <i>1 study</i>	<i>Targeted</i>  Incarcerated mothers experiencing difficulties in parent-infant relationship	<i>12 sessions</i> • Therapeutic discussions • Review of filmed interactions	Improved sensitivity to child needs and parental well-being; improved child confidence and development	<i>Relationship-based</i>  Mothers are helped to improve their own representations of being parented, which improves maternal ability to respond sensitively to her child's needs (improved reflective functioning); promotes attachment security	<ul style="list-style-type: none"> <li>• Links between own childhood and baby's needs</li> <li>• Encouraged to consider child's perspective</li> <li>• Interpersonal skills</li> <li>• Reflection on parental responses</li> <li>• Preparation for separations</li> </ul>

### *Design and quality*

Eight studies were described as Randomised Controlled Trials (RCTs). However, three of these studies (Azevedo et al., 2013; Feinberg et al., 2009; Hahlweg et al., 2010), did not describe the randomisation procedure and so only met the EPHPP criteria for a Controlled Clinical Trial (CCT), rather than an RCT. Three additional studies met criteria for a CCT, and five studies met criteria for a cohort study. One RCT (Gardner et al., 2006) included a cohort analysis because the follow-up period extended beyond the waiting list for the control group. The study carried out by Puckering et al. (1996) was a case study using quantitative measures but did not apply statistical analyses.

Eleven studies compared outcomes for two or more treatment conditions. The intervention of interest was compared with a waiting list control group in five studies and with routine treatment or minor intervention (e.g. a brochure on childcare, Feinberg et al., 2009) in four studies. Cummings and Wittenberg (2008) evaluated a new psychodynamic parenting intervention by comparing it to the Incredible Years (BASIC). The most complex design was reported by Schultz and Nystul (1980). This comprised five groups and compared the 12-month outcomes for the intervention of interest (PET) with two distinct interventions (Behaviour Modification Training and Adlerian Mother Study Groups), 1-month outcomes for PET, and a control group. Parents in the control group either received no intervention or attended a general parent information class.

Post-intervention assessment ranged from within two months of completing the intervention (seven studies) to two years after participants completed the intervention (Posthumus et al., 2012). Six studies had a follow-up period of at least one year.

A summary of the EPHPP ratings of bias and NICE levels of evidence assigned to each study (Table 5) shows that three studies (Gardner et al., 2006; Hutchings et al., 2007; McGilloway et al., 2012) received the highest rating for level of evidence. Two of these studies, Hutchings et al. (2007) and McGilloway et al. (2012), presented an intention-to-treat analysis, further reducing the risk of a Type I error (Gupta, 2011), which suggested that the findings of these two studies are particularly robust. ‘Weak’ ratings for bias (four studies) resulted from measures that were shown to be reliable but of unknown validity (Feinberg et al., 2009;

Schultz & Nystul, 1980), samples that may not be representative of the target population (Feinberg et al., 2009; Hahlweg et al., 2010; Puckering et al., 1996; Schultz & Nystul, 1980), inadequate blinding of the participants (Hahlweg et al., 2010), and weak study design (Puckering et al., 1996).

**Table 5.** Ratings of methodological quality assessed using the EPHPP Quality Assessment Tool and NICE (2006) criteria for judging level of evidence

Study	Intervention	Selection bias	Study design	Confounders	Blinding	Data collection methods	Withdrawals and drop-outs	Global rating of bias*	Level of evidence**
1 Schultz et al., 1980	PET	Weak	Strong	Strong	Moderate	Weak	Strong	Weak	2 <sup>-</sup>
2 Puckering et al., (1996)	MP	Weak	Weak	NA	Moderate	Strong	NA	Weak	3
3 Scott et al., 2001	IYB	Moderate	Strong	Strong	Moderate	Weak	Moderate	Moderate	2 <sup>+</sup>
4 Sharry et al., 2005	PPEY	Moderate	Moderate	NA	Moderate	Strong	Strong	Strong	2 <sup>++</sup>
5 Gardner et al., 2006	IYB	Moderate	Strong	Strong	Moderate	Strong	Strong	Strong	1 <sup>++</sup>
6 Hutchings et al., 2007	IYB	Moderate	Strong	Strong	Moderate	Strong	Strong	Strong	1 <sup>++</sup>
7 Cummings et al., 2008	IYB	Strong	Strong	Strong	Strong	Strong	Weak	Moderate	1 <sup>-</sup>
8 Bywater et al., 2009	IYB	Moderate	Moderate	NA	Weak	Strong	Moderate	Moderate	2 <sup>+</sup>
9 Feinberg et al., 2009	FF	Weak	Strong	Strong	Moderate	Weak	Strong	Weak	2 <sup>-</sup>
10 Hahlweg et al., 2010	Triple P	Weak	Strong	Strong	Weak	Strong	Moderate	Weak	2 <sup>-</sup>
11 Puckering et al., 2011	MP	Weak	Moderate	NA	Moderate	Strong	Strong	Moderate	2 <sup>+</sup>
12 McGilloway et al., 2012	IYB	Moderate	Strong	Moderate	Moderate	Strong	Strong	Strong	1 <sup>++</sup>
13 Posthumus et al., 2012	IYA	Weak	Strong	Strong	Moderate	Strong	Moderate	Moderate	2 <sup>+</sup>
14 Sleet et al., 2013	NB	Moderate	Strong	Moderate	Moderate	Strong	Weak	Moderate	1 <sup>+</sup>
15 Azevedo et al., 2013	IYB	Moderate	Strong	Weak	Moderate	Strong	Moderate	Moderate	1 <sup>+</sup>
16 Azevedo et al., 2014	IYB	Moderate	Moderate	NA	Weak	Strong	Strong	Moderate	2 <sup>+</sup>
17 McGilloway et al., 2014	IYB	Moderate	Moderate	NA	Weak	Strong	Strong	Moderate	2 <sup>+</sup>

\*EPHPP global ratings are assigned as Strong (no Weak ratings), Moderate (one Weak rating), and Weak (two or more Weak ratings); \*\*Levels of evidence classified using criteria published by NICE (2006).

Interventions: FF = Family Foundations, IYB = Incredible Years (BASIC), IYA = Incredible Years (ADVANCE), MP = Mellow Parenting, NB = New Beginnings, PET = Parent Effectiveness Training, PPEY = Parents Plus Early Years

### *Observational measures*

Ten studies (evaluating Incredible Years, Mellow Parenting, and Triple P) used published coding systems to assess parent-child interaction (see Table 6). The remaining studies used either an unpublished coding system or developed a novel coding system based on an existing system(s) (see Table 7).

**Table 6.** Published measures of observed parent-child interaction reported in this review

Measure Number of studies	Description	Observed situation	Reliability information	Validity information
1. Dyadic Parent-Child Interaction Coding System (DPICS) and revised version (DPICS-R)  (Eyberg & Robinson, 1981, 2000)  7 studies (all IY)	DPICS comprised 22 categories that included child deviance, nurturing parental behaviour (e.g. <i>praise</i> ), and harsh parental behaviour ( <i>critical statement</i> ).  DPICS-R comprises 43 codes grouped into parent behaviour, child deviance, child responses to commands, and parent and child affect (e.g. <i>parent positive affect</i> ).  The manual permits selection of relevant categories and construction of composite variables.	Structured interaction, lasting 25 - 30 minutes	Good inter-rater reliability (unspecified reliability coefficient of 0.91, Robinson & Eyberg, 1981)	Discriminant function analysis of clinical status correctly classifying 94% of families as clinical or non-clinical with respect to conduct disorder (Robinson & Eyberg, 1981).
2. Mellow Parenting Observation System (MPOS)  (Puckering et al., 1996)  2 studies (both MP)	Comprises six categories, each with a positive and negative element: <i>anticipation of child need, autonomy, responsiveness, co-operation, comfort of distress, and control</i> . Coding guidelines available from <a href="http://www.biomedcentral.com/1471-2431/14/223/additional">http://www.biomedcentral.com/1471-2431/14/223/additional</a> .	Videotaped mealtime	Moderate inter-rater reliability for total positive and negative interactions (ICC = 0.53, and Kentall's $\tau = 0.6$ , respectively), although inter-rater reliability for individual domains appears to be poor (Puckering et al., 2014; Thomson et al., 2014).	Concurrent validity with self-report measures of family functioning (Puckering et al., 2006), and predictive validity (positive interactions only) for later diagnoses of conduct disorder (Thomson et al., 2014)
3. Gardner Coding System  (Gardner, 1987)  1 study (IY)	Comprises 30 codes that capture negative and positive aspects of family interaction (for example, <i>physical positive, negative command</i> ).	Unstructured home interaction, lasting 50 minutes	Moderate inter-rater reliability (77% agreement, Gardner, 1987), although this appears to have been improved in the present study (mean ICC=0.95)	Significant differences in the scores of families with and without behaviour problems (Gardner, 1994; Gardner, Sonuga-Barke, & Sayal, 1999), and concurrent change with parent-reported child behaviour following an intervention (Gardner, Shaw, Dishion, Burton, & Supplee, 2007).



**Table 6. Continued.**

Measure <i>Number of studies</i>	Description	Observed situation	Reliability information	Validity information
4. Revised Family Observation System (FOS-R-III)  (Sanders, Tully & Hynes, 1996)  <i>1 study (Triple P)</i>	Comprises 15 codes for parent behaviours (e.g. <i>approval, aversive contact</i> ) in the parent-child interaction in common childcare situations.	Non-prescriptive, although situation should capture a range of common childcare situations  (Hahlweg et al., 2010 coded a structured home interaction, lasting 20 minutes)	Good inter-rater reliability (93.2 – 96.2% agreement) for overall parent non-aversive behaviour, and parent aversive behaviour (Sanders & Christensen, 1985).	Significant differences between families with and without conduct disorder and depression (Dadds, Sanders, Morrison, & Rebgetz, 1992).
5. Coding Interactive Behaviour Scales (CIB)  Feldman (1998)  <i>1 study (NB)</i>	Comprises 22 items relating to parent behaviour (e.g. <i>acknowledging, appropriate range of affect</i> ) and 5 items relating to the overall quality of interaction.	Non-prescriptive  (Sleed et al., 2013 coded an unstructured interaction, lasting ten minutes)	Acceptable internal consistency for the scale was found to be acceptable (Cronbach's $\alpha$ : 0.77 – 0.91, Feldman et al., 2003).  Good inter-rater reliability for the two subscales used in the present study ( $\alpha$ =0.905 and 0.957, Sleed et al., 2013).	Significant differences between families receiving a universal neonatal intervention to improve bonding and families receiving treatment as usual (Feldman et al., 2003), significant differences between clinical and non-clinical families (Feldman, 2007), and concurrent change with related self-report measures following a parenting intervention (Paris, Bolton, & Spielman, 2011)

**Table 7.** *Unpublished and novel observational measures of parent-child interaction reported in the review*

Study <i>Intervention</i>	Type of measure	Description	Observed situation	Reliability information	Validity information
Scott et al. (2001)  <i>Incredible Years</i>	Unpublished coding system	Coding system developed by Aspland (2001). Further details not available.*  Scott et al. (2001) report data for <i>parental praise</i> and <i>inappropriate commands</i> , which were combined to give a ratio.	Observed 18 minute structured interaction at home (videotaped)	Details not available*  Scott et al. (2001) report good inter-rater reliability (ICC=0.96)	Details not available*
Sharry et al. (2005)  <i>Parents Plus Early Years</i>	Adapted/novel coding system	Based on Forehand et al. (1978).  Comprised five parent codes: <i>commands</i> , <i>questions</i> , <i>attends</i> , <i>rewards</i> , and <i>negative interaction</i> (any action of criticism or correction).	Observed five minute free play interaction in a clinic room (videotaped).	Sharry et al. (2005) report good inter-rater agreement (95% overall agreement for observed codes).	The original coding system has concurrent validity with changes in parental attitudes following a parenting intervention (Peed, Roberts, & Forehand, 1977).
Schultz and Nystul (1980)  <i>Parent Effectiveness Training</i>	Adapted/novel coding system	Based on Bee (1967), Bing (1963), and Farina (1960).  Comprised 20 codes, which were grouped into eight categories following principal component analysis: <i>respect</i> (e.g. mother seeks child's opinion), <i>dominance</i> (e.g. child passively accepts), <i>warmth</i> (e.g. touching), <i>dependence</i> (e.g. negative encouragement), <i>independence</i> (e.g. child speaks first), <i>fostering dependence</i> (e.g. urging), <i>disagreement</i> (e.g. mother disagrees) and <i>mother achievement motivation</i> (e.g. praise).	Observed 15 minute structured interaction in a laboratory room (videotaped).	Schultz & Nystul (1980) report adequate inter-rater reliability: over 90% agreement for 17 codes; over 75% agreement for three codes.	The use of principal components analysis provides some evidence of internal validity (Clark & Watson, 1995).

**Table 7. Continued.**

<b>Study Intervention</b>	<b>Type of measure</b>	<b>Description</b>	<b>Observed situation</b>	<b>Reliability information</b>	<b>Validity information</b>
Feinberg et al. (2009)  <i>Family Foundations</i>	Adapted/novel coding system	Based on Biringen (2005), Britner, Marvin, & Pianta (2005), Margolin, Gordis, & Oliver (2004), McHale, Kuersten-Hogan, & Lauretti (2001), Mills-Koonce et al. (2007), Schoppe-Sullivan, Mangelsdorf, Frosch, & McHale (2004), Zahn-Waxler et al. (1994)  Comprised two codes for parental behaviour: <i>positivity</i> (defined as sensitivity, positive affect, support for exploration), and <i>negativity</i> (defined as irritability, anger, and hostility towards the child).	Observed 12 minute structured interaction (both parents with child) at home (videotaped); mother and father behaviour coded separately.	Feinberg et al. (2009) report good to fair inter-rater reliability (ICC range 0.69 to 0.73).	Validity of the novel system does not appear to have been assessed, although several codes overlap with the Caregiver Behaviour System (Britner et al., 2005), for which there is evidence of validity (see Britner et al., 2005).
Cummings and Wittenberg (2008)  <i>Incredible Years</i>	Adapted/novel coding system	Based on the Crowell Coding Manual (Crowell & Fleischman, 1993).  Comprised two summary variables: <i>parent negative</i> (sum of depression, irritability and anger, and aggression); and, <i>parent positive</i> (sum of positive affect, behavioural responsiveness and emotional responsiveness)	Observed 45 minute structured interaction in laboratory (videotaped)	Cummings & Wittenberg report acceptable internal consistency for <i>parent positive</i> (Cronbach's $\alpha > 0.7$ ) and poor internal consistency for <i>parent-negative</i> was $\alpha=0.57$ .  Cummings & Wittenberg (2008) report good overall inter-rater reliability for observed codes (mean ICC=0.9).	Validity of the novel system does not appear to have been assessed, although the foundation coding system correctly discriminated attachment status of 93% mother-child dyads (n=60) (Crowell & Feldman, 1988).

\* Emailed author to request unpublished thesis (14/11/2014)

In summary, the 14 studies reported a total of 44 distinct but overlapping variables that reflected the parental contribution to the parent-child interaction (excluding the three follow-up studies to avoid double-counting). Ten of these studies reported using composite variables containing more than one specific behaviour or construct. Sixty-six percent of the variables (ten studies) reflected behavioural aspects of the interaction (for example, *praise*), while 27% of the variables (seven studies) appeared to reflect a combination of emotional and behavioural aspects of the interaction (e.g. *sensitivity*, *positive affect*). Two variables (*containment of distress*, positive and negative), appeared to reflect an emotional aspect of the interaction, and one variable (*miscellaneous*) was not classified. Twelve studies included variables that reflected both positive and negative aspects of the interaction (improvements in parenting are indicated by increased positive and/or reduced negative aspects of the interaction.) In total, 22 variables (50%) described positive aspects of the interaction, and 20 (45%) described negative aspects of the interaction (two variables, *ratio of praise to inappropriate commands*, and *style* were not classified). These classifications are shown in Table 8.

### *Study outcomes*

#### i. Overview

All but one of the studies (n=16) identified changes in observed parent-child interaction following the intervention. Fifteen of these studies reported changes consistent with the authors' hypothesised expectations. However, Cummings and Wittenberg (2008) found a greater effect of the Incredible Years on *positive parenting* (in this case, a combination of positive affect, behavioural responsiveness, and emotional responsiveness) than a novel psychodynamic intervention, contrary to the authors' hypothesis. The only study that found no effect of the intervention was Puckering et al. (2011), which analysed composite variables of *positive* and *negative interactions* following Mellow Parenting. In total, 73% of the variables reported in the 14 evaluations had changed following the intervention (see Table 8). To avoid double counting, the findings from the three follow-up studies are shown as maintenance effects (discussed below). For completeness, this includes follow-up findings for the separate cohort analysis carried out by Gardner et al. (2006) after the control group had received the intervention.

**Table 8.** *Study variables and outcomes following the intervention*

**a) Parental contributions to parent-child interaction**  
*Changes following intervention*

<b>Study</b> <i>(Time of evaluation)</i>	<b>Variable</b>	<b>Positive/ negative</b>	<b>Behavioural (B)/ Emotional (E)</b>	<b>Effect size</b>	<b>Maintenance of changes if assessed in a separate cohort analysis</b> <i>(Study, time of evaluation)</i>
Schultz and Nystul (1980) <i>12 months PI</i>	Touching Child speaks last Mother holds puzzle piece	Positive Positive Negative	B B B	NR NR NR	NA
Puckering et al. (1996) <i>12 months PI</i>	Autonomy (+) Autonomy (-) Cooperation (-) Warmth and stimulation (-) Warmth and stimulation (+) Containment (+) Containment (-) Miscellaneous (-) Time spent controlling Parenting style	Positive Negative Negative Negative Positive Positive Negative Negative Negative Positive	B B B B/E B/E E E B B B	NR NR NR NR NR NR NR NR NR NR	NA
Scott et al. (2001) <i>6 months PB</i>	Praise: Inappropriate commands	NA	B	0.76 SD (medium)	NA
Sharry et al. (2005) <i>Immediate PI</i>	Commands Attends	Negative Positive	B B	NR NR	NA
Gardner et al. (2006) <i>6 months PI (RCT)</i>	(includes: praise, positive and proactive discipline) (includes: hit, yell, rude threaten, negative command)	Positive Negative	B B	d=0.38 (small) d=0.74 (medium)	Yes ( <i>Gardner et al., 2006; 18 months PB</i> ) Yes ( <i>Gardner et al., 2006; 18 months PB</i> )
Hutchings et al. (2007) <i>6 months PB</i>	(positive affect, physical positive, labelled and unlabelled praise, problem-solving) (negative commands, critical behaviours)	Positive Negative	B/E B	d=0.57 (medium) d=0.58 (medium) <sup>#</sup>	Yes ( <i>Bywater et al., 2009; 18 months PB</i> ) Yes <sup>#</sup> ( <i>Bywater et al., 2009; 18 months PB</i> )

**Table 8a. Continued.**

Study (Time of evaluation)	Variable	Positive/ negative	Behavioural (B)/ Emotional (E)	Effect size	Maintenance of changes if assessed in a separate cohort analysis (Study, time of evaluation)
Cummings and Wittenberg (2008) <i>12 months PI</i>	(positive affect, behavioural responsiveness, emotional responsiveness)	Positive	B/E	d=4.97 (very large)	NA
Feinberg et al. (2009) <i>6 months PI</i>	(sensitivity, positive affect, support for exploration)	Positive	B/E	d=0.45 (small)	NA
	(irritability, anger, hostility towards child)	Negative	B/E	d=0.6 (medium)*	
Hahlweg et al. (2010) <i>12 months PB</i>	(praise, contact, question, instruction, attention, affection)	Positive	B	ES=0.32**	NA
	(instruction, aversive attentions, interruption)	Negative	B	ES=-0.02**	
McGilloway et al. (2012) <i>6 months PB</i>	(negative commands, critical statements, physical negative behaviour)	Negative	B	d=0.63 (medium)	Yes (McGilloway et al., 2014; 12 months PB)
Posthumus et al. (2012) <i>2 years PI</i>	Critical statements	Negative	B	NR	NA
Sleed et al. (2013) <i>Immediate PI</i>	Dyadic attunement	Positive	B/E	$\eta_p^2=0.084$ (medium)	
	Positive engagement	Positive	B/E	$\eta_p^2=0.070$ (medium) <sup>#</sup>	
Azevedo et al. (2013) <i>6 months PB</i>	(labelled and unlabelled praise, positive affect, physically positive behaviour, problem solving)	Positive	B/E	$\eta_p^2=0.018$ (large)	Yes (Azevedo et al., 2014; 12 months PB)
	(descriptive/encouragement statements and questions, reflective statements and questions, problem- solving)	Positive	B	$\eta_p^2=0.06$ (small) <sup>#</sup>	No (Azevedo et al., 2014; 12 months PB)

Shading highlights different studies; \*Fathers only; \*\*Single-parents only (where study also reports data for two-parent families); <sup>#</sup>per protocol analysis only (where study also reports data for an intention-to-treat analysis); NR = Not reported; NA = Not applicable; Effect sizes classified according to Cohen's (1988) guidelines.

**Table 8.** *Continued.*

**b) Parental contributions to parent-child interaction**

*No changes following intervention*

<b>Study</b> <i>(Time of evaluation)</i>	<b>Variable</b>	<b>Positive/ negative</b>	<b>Behavioural (B)/ Emotional (E)</b>	<b>Changes at follow-up if assessed in a separate cohort analysis</b> <i>(Study, time of evaluation)</i>
Schultz and Nystul (1980) <i>12 months PI</i>	Negative encouragement	Negative	B	NA
Puckering et al. (1996) <i>12 months PI</i>	Anticipation (+) Anticipation (-) Cooperation (+)	Positive Negative Positive	B B B	NA
Sharry et al. (2005) <i>Immediate PI</i>	Questions Rewards Negatives	Positive Positive Negative	B B B	NA
Cummings and Wittenberg (2008) <i>12 months PI</i>	(depression, irritability, anger and aggression)	Negative	B/E	NA
Puckering et al. (2011) <i>Immediate PI</i>	(positive anticipation, warmth and stimulation, autonomy, cooperation, containment, control) (negative anticipation, warmth and stimulation, autonomy, cooperation, containment, control)	Positive  Negative	B/E  B/E	NA
Hahlweg et al. (2010) <i>12 months PB</i>	(praise, contact, question, instruction, attention, affection) (instruction, aversive attentions, interruption)	Positive  Negative	B  B	NA
McGilloway et al. (2012) <i>6 months PB</i>	(praise, encouragement, positive physical behaviour)	Positive	B	No, although significant improvement compared to baseline for the intervention cohort ( <i>McGilloway et al., 2014; 12 months PB</i> )
Posthumus et al., (2012) <i>2 years PI</i>	Labelled praise	Positive	B	NA
Azevedo et al. (2013) <i>6 months PB</i>	(critical statements, negative commands)	Negative	B	NR ( <i>Azevedo et al., 2014, 12 months PB</i> )

## ii. Positive and negative aspects of interaction

Of the 12 studies that analysed both positive and negative aspects of the parent-child interaction, seven found expected changes in both (i.e. increased positive aspects, reduced negative aspects). Two studies reported a change in positive interactions only (Azevedo et al., 2013; Cummings & Wittenberg, 2008), and one study reported a change in only negative aspects of the interaction compared to a no-intervention control group (McGilloway et al., 2012). However, there appeared to be little overall difference in the proportion of positive and negative variables that changed following the intervention (68% and 70%, respectively).

Effect sizes were reported in only nine studies (see Table 8), and available for just 15 (48%) variables that changed significantly following the interaction. The largest effect sizes were found for *positive parent* behaviour following the Incredible Years as compared to a novel psychodynamic intervention (Cummings & Wittenberg, 2008), and a waiting-list control group (Azevedo et al., 2013). Eight variables had medium effect sizes: four for reductions in negative interactions, three for increases in positive interactions, and one could not be classed as either positive or negative. Three variables with small effect sizes were for positive aspects of the parental interaction. Hahlweg et al. (2010) reported effect sizes for two variables using Rustenbach's statistic (Rustenbach, 2003), which suggests that, in this case, stronger effects were observed for increasing positive aspects, rather than decreasing negative aspects, of the interaction; however, broad criteria for interpreting Rustenbach's statistic were unavailable. Overall, there did not appear to be any pattern in the relative effect sizes for changes in positive and negative aspects of parental interaction.

Taking the strength of the evidence into account, the five studies rated as having the highest level of evidence (1<sup>+</sup> or 1<sup>++</sup>), reported a mixture of changes in both positive and negative aspects of parent-child interaction following the intervention; three studies found evidence of reduced negative parental interaction, and four studies found evidence of increased positive interaction.

## iii. Behavioural and emotional/behavioural variables

A similar proportion of behavioural and emotional/behavioural variables changed following the intervention, (66% and 79%, respectively). The two variables with large effect sizes both



reflected emotional/behavioural aspects of the interaction. Medium effect sizes were found for four behavioural variables, and for four emotional/behavioural variables; small effect sizes were found for two behavioural and one emotional/behavioural variable.

Taking the strength of the evidence into account, the five strongest studies reported a mixture of changes in both behavioural and emotional/behavioural aspects of parent-child interaction following the intervention; four studies found evidence of improved behavioural aspects of interaction, and three studies found evidence of improved emotional/behavioural aspects of interaction.

#### iv. Types of intervention

There did not appear to be any pattern in the findings of studies that evaluated cognitive-behavioural-based (n=9) and relationship-based (n=4) interventions; both types of intervention were associated with changes in approximately two-thirds of the variables reported (67% and 71%, respectively). However, since four of the five strongest studies were cognitive-behaviour-based interventions (all Incredible Years), evidence for these groups may, on the whole, be stronger. Only one relationship-based group (Sleed et al., 2013) reported effect sizes, making it difficult to compare the magnitude of effects between the two types of interventions.

#### v. Universal versus targeted populations

Eighty-eight percent of reported variables changed following universal interventions, while 67% changed following targeted interventions. This apparent difference should be interpreted cautiously: the changes reported by Hahlweg et al. (2010) were found for only single parents, who may resemble the targeted populations more closely than two-parent families in terms of child behaviour. Furthermore, the three studies with a universal sample also had the weakest methodological quality.

#### vi. Congruence with self-report measures

Twelve studies included self-report measures that related to parenting practice or the parent-child relationship (e.g. Parenting Stress Index, Abidin, 1995). Of these, observed changes in parental behaviour were consistent (congruent) with all self-report measures in eight studies;

and consistent with at least one self-report measure in two studies (Bywater et al., 2009 and Sled et al., 2013). Incongruent changes were reported as follows:

1. Bywater et al. (2009) found that observed changes in *positive parenting* were maintained at 18 months, but not self-reported quality of parenting (indicated by the Parenting Scale, Arnold et al., 1961);
2. Cummings and Wittenberg (2008) found superior improvement in *positive parenting* following the Incredible Years compared to a psychodynamic intervention, but not in self-reported quality of the parent-child relationship and parenting stress (Parenting Stress Index, Parenting Satisfaction Scale, Guidubaldi & Cleminshaw, 1994);
3. Hahlweg et al. (2010) found that improvements in observed parenting of single parents were not supported by improved self-report on the Positive Parenting Questionnaire (novel measure, Hahlweg et al., 2010) or the Parenting Scale. Similarly, the statistically non-significant changes in the observed parenting of two-parent families were incongruent with improved self-report using the same questionnaires;
4. Sled et al. (2013) observed improvements in *dyadic attunement* and *positive engagement*, but not on the Mother Object Relations Scale (Milford & Oates, 2009).

vii. Changes in observed interaction over time

Eight studies presented follow-up data on the initial post-intervention assessment, providing an indication of changes in observed interaction over time. Two of these studies found further improvement in observed variables. These were: 1) Schultz and Nystul (1980), who found that *negative encouragement* had reduced between one and 12 months post-intervention (although this analysis was based on two different groups assessed at the different time points); and 2) Puckering et al. (1996), who found that their single participant had improved in *cooperation, warmth and stimulation, containment, miscellaneous negative behaviour*, and time spent *controlling* the child between one and 12 months post-intervention. All eight studies reported maintenance in improvements of at least one variable over the follow-up periods, which ranged from one to two years. Improvements that had not been maintained (returned to baseline) were increased *anticipation* (Puckering et al., 1996), *labelled praise* (Posthumus et al., 2012), and *coaching* (Azevedo et al., 2014). The longest assessment periods (15 – 24 months post-intervention) were associated with maintenance of

improvements in praise, positive discipline, positive affect and physical behaviour, and reduced aversive physical and verbal behaviour, and criticism (Bywater et al., 2009; Gardner et al., 2006; Posthumus et al., 2012).

## **Discussion**

### *Overview*

This systematic review assessed whether the parenting groups recommended to UK commissioners effect changes in observed parent-child interaction and the nature of any such changes. The search strategy and selection process resulted in 17 studies, evaluating eight of the 21 recommended parenting group programmes. This statistic suggests that assessment of observed parent-child interaction for the remaining 13 programmes is not yet available. Nevertheless, the overall findings from this review indicate that participation in recommended parenting groups is associated with improvement in observed parent-child interaction. This is consistent with findings from previous systematic reviews using other search strategies (for example, groups for particular childhood conditions, and/or RCTs), suggesting that evidence for observed improvement in parent-child interaction is also found in the wider literature.

### *Evidence for specific interventions*

Consistent with other reviews (for example, Thomas et al., 1999; Furlong et al., 2012), the most evaluated programme was Webster-Stratton's Incredible Years (ten studies). Moreover, these studies had the strongest methodologies and reported the largest effect sizes for changes in the interaction. The Incredible Years even outperformed an individually administered psychodynamic intervention in improving observed parental emotional and/or behavioural responsiveness (which was expected to improve more in the psychodynamic intervention given its emphasis on reflection and mentalizing, Cummings & Wittenberg, 2008). Exclusion of the Incredible Years from the review would not have changed its overall finding that parenting groups are associated with observed changes in parent-child interaction, but would have reduced our confidence in the findings.

The next most evaluated programme was Mellow Parenting (2 studies). However, we reiterate that the study carried out by Puckering et al. (2011) was the only study to find no change in parent-child interaction, while Puckering et al. (1996) reported a change based on a

single participant. Possible reasons for the non-significant finding may be the small sample size (n=12), and/or the particularly serious difficulties of the children (all diagnosed with Reactive Attachment Disorder). In support of these possibilities, a previous study evaluating the unnamed precursor of Mellow Parenting applied to mothers with parenting difficulties (n=21) *did* find improvements in parent-child interaction (Puckering et al., 1994).

The other interventions were all evaluated in single studies with varying levels of evidence: the strongest evidence was for Parents Plus and New Beginnings, while the weakest evidence was for Triple P, Parent Effectiveness Training, and Family Foundations. Only one evaluation of Triple P was identified; this is surprising given its established status as a public health intervention (Bunting, 2004) and may reflect a limitation of the search strategy (see below). While 64 English language articles were originally identified for Triple P, 63 were excluded for: not including observational measures of any type (12 articles), not reporting a parent variable for observed measures (1 article), not reporting an empirical evaluation (20 articles), evaluating the non-group formats or versions/modifications of the programme not recommended by the DfE (23 articles), and for not being about parenting at all (7 articles).

There were no particular patterns in the findings for targeted versus universal interventions, or cognitive-behavioural versus relationship-based parenting groups. However, the dominance of high quality studies evaluating the Incredible Years meant that the evidence for observed changes was strongest for targeted and cognitive-behavioural-based groups.

#### *Extent of changes in parent-child interaction*

The majority of variables assessing parent-child interaction improved following the intervention, with reported effect sizes that were small to medium. However, several variables did not change (15 variables, nine studies) suggesting that improvements in parent-child interaction are not all-encompassing and may depend upon the exact measure and/or population. For example, the finding by Hahlweg et al. (2010) that observed changes in parent-child interaction occurred for single but not two-parent families might be explained by the pre-intervention difference in child behaviour problems. In this study, the children of single parents presented more behaviour problems than the children of two-parent families (the reason for carrying out separate analyses). It is possible, therefore, that the single parents

were more motivated to implement the skills developed in the group, consistent with previous findings that larger effect sizes for improved parent-child interaction were associated with more severe conduct disorder and deprivation (Furlong et al., 2012).

#### *Range of changes in parent-child interaction*

The studies used a range of observational measures that coded a large number of variables. Each study used a unique set of variables; even studies that used the same measures ultimately constructed different composite variables. Most studies constructed variables based on a broad category of interactions (for example, *positive parent behaviour*), though a small number based their findings on highly specific aspects of the interaction (e.g. *mother holds puzzle piece*). The validity of such “micro variables” had not been established specifically; however, in each case the variables were adapted from previously validated measures and, in the case of Schultz and Nystul (1980), a principal components analysis was used to identify variables significantly related to underlying constructs of interest (e.g. *mother achievement motivation*). In some sense then, the persistence of improvements despite this diversity of variables adds weight to the consensus that observed changes in parent-child interaction are real.

Within this review, variables were categorised into those reflecting behavioural aspects of the interaction (for example, *parental praise, shouting*), and those that might reflect a more emotional/behavioural or relational aspect of the interaction (for example, *dyadic attunement, emotional responsiveness*). The majority of variables were considered behavioural, reflecting the finding that the frequently used DPICS (usually accompanying Incredible Years interventions) focuses on more behavioural aspects of the interaction. Fewer variables for emotional/behavioural aspects of the interaction were reported. However, similar proportions of both types of variable changed following the intervention, and the largest effect sizes were for emotional/behavioural changes, supporting the view that parenting groups are able to facilitate change in more abstract qualities of parent-child interaction.

Similarly, most of the variables related to either positive or negative aspects of the interaction, which should increase or decrease, respectively, as the quality of parent-child interaction improves. This distinction is useful since there is evidence that these constructs are not

simply the complement of each other and that improvements in both types are valuable targets for change. For example, Dallaire et al. (2006) found that positive parenting behaviours alone did not moderate the effects of negative parenting behaviours on children's depressive symptoms. Within the scope of the present review, there did not appear to be any pattern in the proportion of positive and negative aspects that changed following the intervention. This is consistent with the findings of the meta-analysis of parenting groups for conduct disorder (Furlong et al., 2012), which found similar effect sizes for changes in both positive and negative interactions.

Finally, the majority of studies reporting data for self-report measures related to parent-child interaction reported changes congruent with improvements in the observed interaction. The only study to find a complete discrepancy between observed and self-report measures was Hahlweg et al. (2010), who found that, for single parents, improvements in observed interaction were incongruous with self-reports. The authors proposed that single parents may have compared themselves unfavourably to their two-parent family counterparts in the group and consequently underestimated their own parenting skills. The incongruences found in two other studies (Bywater et al., 2009; Sled et al., 2013) were alongside other congruent changes in both observed interaction and self-report. This suggests that observed changes in observed interaction broadly mirror changes in self-report. However, this is not absolute and discrepancies may easily reflect differences in the focus of the measures.

#### *Persistence of changes in parent-child interaction*

The eight studies that reported a follow-up assessment all found that at least one post-intervention improvement was maintained; in contrast, only a small number of variables were reported to have improved or deteriorated since the first post-intervention assessment. Moreover, the majority of these changes at follow-up were found in the case study, which did not report a statistical analysis of changes. Overall, the maintenance of changes suggests that changes in observed behaviour are relatively stable while the relative lack of evidence for further improvements suggests little evidence for “sleepers effects” (improvements that may take time to become established). As a word of warning, however, only one study (Posthumus et al., 2012) reported a follow-up period of more than 18 months post-baseline making it difficult to evaluate any longer-term effects on observed parent-child interaction.

### *Strengths and limitations of the literature*

The studies included in this review included participants from a range of countries and social demographics, used a range of reliable and validated measures to observe parent-child interaction, and included studies with very high ratings as levels of evidence. Moreover, it seems an internally consistent literature.

A limitation shared with other reviews (e.g. Barlow et al., 2010), is that a significant proportion of the reviewed studies evaluate the Incredible Years programme. This focus on the Incredible Years may restrict the generalizability of the findings to populations other than parents of children with conduct disorder. Similarly, the follow-up periods for assessment are relatively short, limiting understanding of the longer-term effects of parenting groups (Dretzke et al., 2005; Furlong et al., 2012).

In an effort to review the full range of studies evaluating observed parent-child interaction, this review has included some studies with very small numbers of participants, particularly for Mellow Parenting. However, given that Mellow Parenting is an intensive group for severely troubled families, recruitment of larger samples may simply not be possible.

Finally, although the studies used a range of variables for assessing parent-child interaction, the majority of studies reported findings for composite variables. Such composite variables are not compatible with a more fine-grained analysis of the types of change observed in parent-child interaction.

### *Strengths and limitations of the review*

This is the first systematic review of studies selected on the basis of their assessment of observed parent-child interaction. There are, however, several limitations. Firstly, the review was restricted to parenting programmes recommended to UK commissioners. While we hope that this focus makes the review helpful to UK practitioners, it does reduce its relevance to the international community (although many of the recommended programmes are used internationally). Secondly, this review excluded programmes that included interventions with children and/or a teacher. As a result, the findings may underestimate the effect that multi-modal parenting programmes can have on parent-child interaction. For example, addition of

the child training to the Incredible Years parent group is associated with greater improvements in negative parent behaviour (Webster-Stratton, Reid, & Hammond, 2004). Thirdly, the search strategy of using the exact name of the parenting intervention reported by the DfE means it is possible that studies using less well-known or idiosyncratic synonyms have not been included. In addition, it means that studies not reporting the name of the intervention in the search fields will not have been identified. Fourthly, the review did not include precursor versions of the recommended programmes; while this had the advantage that it restricted the review to the current, recommended curriculum, it means that the evidence-base for these programmes may be underestimated. Fifthly, the restriction to published studies in peer-reviewed journals may have biased the studies towards significant results, since these are more likely to be published (Hopewell, Loudon, Clarke, Oxman, & Dickersin, 2009).

#### *Implications for research*

This review has shown that the information regarding observed changes in parent-child interaction is available for only a minority of the parenting programmes recommended by the DfE. As a first step, researchers evaluating the other programmes may wish to consider including observational measures in future trials.

To enhance understanding of the types of change observed in parent-child interaction following parenting programmes, researchers may wish to consider increasing the range of outcome measures, and reporting more detailed data (rather than conflating measures in composite variables). Increasing the range of outcome measures might also improve understanding of discrepancies between self-report and observed measures, where these occur. It has been suggested, for example, that reliance on measures developed for a clinical population may not be sensitive to changes in the general population (Hahlweg et al., 2010). Finally, given the tendency for variables to reflect behavioural aspects of the interaction, future studies may wish to consider assessing indicators of more emotional and relational aspects of interaction quality that might relate to attachment. Given that attachment security has been proposed to underpin several important outcomes in child behaviour, mental health (Bowlby, 1998; Vondra, Shaw, Swearingen, Cohen, & Owens, 2001), as well as parent-child



interaction (De Wolff & van Ijzendoorn, 1997), this information might enhance understanding of the mechanisms underlying the effectiveness of parenting groups.

### *Implications for clinical practice*

Clinicians should be aware that evidence for observed changes in parent-child interaction for the different recommended programmes is variable. The information provided here regarding the exact variables that have been shown to change following the intervention may inform decisions about what might be most helpful for an individual family (for example, whether there is greater need to promote positive parenting or reduce critical practices). In addition, these findings illustrate the value of observed measures of interaction as objective and sensitive indicators of change following parenting interventions. Clinicians may, therefore, wish to consider increasing their routine use of observational measures to evaluate individual progress (Crowell & Fleishman, 1993) and to share meaningful findings with families when practicing collaborative empiricism (Dattilio & Hanna, 2012).

### *Conclusion*

At present, only around 40% (8/21) of the group-based parenting programmes recommended to UK commissioners appear to have been evaluated using observed measures of parent-child interaction. This sparse coverage limits the evidence for their effectiveness and understanding of the mechanism(s) of change. However, the findings for the remaining parenting groups indicate that they are associated with improvement in parent-child interaction. Improvements are found via both increases in positive aspects and reductions in negative aspects of interactions, as well as for both behavioural and emotional/behavioural aspects of interaction. These findings are consistent with previous reviews that have focused on particular populations, study designs, and/or a mixture of observational and self-report measures. Further research should consider using observational assessment for parenting groups not yet assessed in this way, and broadening the use of stable observational measures, perhaps with a greater focus on attachment.

## **Practitioner points**

### Implications of the work

- Practitioners can be confident that several of the evidence-based parenting groups recommended to UK practitioners are associated with improvements in observed parent-child interaction.
- Practitioners should be aware that evidence for the effectiveness of the different group programmes is variable. In particular, the “Incredible Years”, a cognitive-behavioural-based intervention for parents of children with conduct disorder, has an extremely thorough literature of carefully designed studies.
- Practitioners may wish to consider increasing their routine use of objective measures of parent-child interaction to evaluate the effectiveness of group interventions for individual families, and identify areas requiring further intervention.
- Further research is required to understand the nature of changes in parent-child interaction in more detail, and to broaden the evidence-base so that more groups have an evidence-base similar to that of the Incredible Years.

### Limitations of the study

- This review was restricted to parenting groups recommended to UK practitioners (although many of the recommended programmes are used internationally).
- The search strategy will not have identified studies using idiosyncratic names for the parenting groups (including names for precursor versions of the interventions), or those that do not report the name of the intervention in the search fields.
- This review was restricted to studies in peer-reviewed journal, which may have biased the studies towards significant results.

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# Research Paper

*Parents' experiences of being in the Solihull Approach parenting group, "Understanding Your Child's Behaviour": an Interpretive Phenomenological Analysis*

Prepared for submission to *Child: Care Health & Development*

## **Abstract**

**Background:** The Solihull Approach parenting group programme, “Understanding Your Child’s Behaviour” (UYCB) is associated with quantitative improvements in child behaviour and parental well-being. However, little is known about parents’ in-depth experiences of participating in UYCB or their reflective views. Such information might reveal mechanisms of change and inform programme development.

**Method:** An Interpretive Phenomenological Analysis (IPA) of ten parents’ experience of participating in UYCB, immediately after completion and again ten months later.

**Results:** Four themes were identified: Satisfied Customers, Development as a Parent, Improved Self-belief, and the “Matthew Effect” (reflecting the finding that parents who initially benefited from the group reported further benefits at follow-up, while those who did not (n=2) experienced deterioration). Group processes of containment and peer-support were highly valued, although some participants struggled with the technical language. The two participants whose children had the most complex needs felt the group was insufficient intervention.

**Conclusion:** The findings suggest that UYCB achieves its aims and communicates its theoretical principles, although change also appears to occur through group processes found in other parenting programmes (e.g. peer-support and reassurance). Positive outcomes appear to be maintained, even reinforced, ten months later. Recommendations for programme development include simplified language and separate groups for parents with complex needs.

## Introduction

Parenting groups are widely used as an intervention for families experiencing difficulties with their children's behaviour. In particular, group-based parent training programmes are considered cost-effective with respect to managing conduct disorder and recommended as the treatment of choice (NICE, 2013). Rigorous systematic reviews consistently indicate that parenting groups are effective in the short-term at reducing child behaviour problems, improving parent-child interactions, and improving parental well-being (Barlow et al., 2011; Barlow, Smailagic, Huband, Roloff, & Bennett, 2014; Furlong et al., 2012). Pooled evidence for longer-term benefits of parenting programmes is less consistent, although improvements in child behaviour and parent-child responsiveness have been reported (Barlow et al., 2011; Barlow, Smailagic, Ferriter, Bennett, & Jones, 2010).

Since the introduction of parent training as an intervention for disruptive child behaviours in the 1960s (Lundahl, Risser, & Lovejoy, 2006), a large number of manualised group-based training programmes have been developed. Initially, these interventions were based on two premises: that parents have a greater influence on children's behaviour than therapists (because of their extended interaction in the natural environment), and that delivery of group interventions is more efficient than individual interventions (Graziano & Diament, 1992). The continued development of group-based parenting programmes has reflected evidence that: i) parenting practices can contribute to the development and maintenance of child problem behaviour (e.g. Lytton, 1990); ii) negative parenting practices are associated with child mental health problems (e.g. Vostanis et al., 2006); and iii) that parental psychosocial well-being is associated with responsive parenting and positive child cognitive development, behaviour, and well-being (e.g. Kane & Garber, 2004; Murray, 1992; Stein et al., 1991).

The parenting programmes currently available range from those aiming to support parents with the normal demands of childrearing (universal) to those aimed at parents whose children have specific difficulties (targeted). Parenting programmes can generally be categorized according to their theoretical orientation: 1) *cognitive-behavioural programmes* (for example, the Incredible Years, Webster-Stratton, 2001), which teach social learning techniques and/or cognitive strategies to challenge unhelpful thoughts that influence behaviours; and ii) *relationship-based programmes* (for example, Parent Effectiveness Training, Gordon, 1970),



which aim to enhance communication skills and understanding of behaviour in the context of relationships. However, there is considerable overlap between the different types; for example, most aim to help parents find alternatives to punishment and engage with their children (Gibbs, Underdown, Stevens, Newberry, & Liabo, 2003).

The present study focuses on one of the more recently developed relationship-based programmes, Understanding Your Child's Behaviour (UYCB), which aims to help parents with universal to complex issues (Douglas, 2006). UYCB is based on the distinctive Solihull Approach model (Douglas & Ginty, 2001); which provides a framework for educating parents about the development of healthy parent-child relationships and effective behaviour management. The model proposes that *containment* in the parent-child relationship (supporting the child to remain calm, process emotions, and regain the capacity to think) facilitates *reciprocity* (being in-tune with their child's emotions and developmental perspective), which in turn facilitates effective *behaviour management* (clear, consistent boundaries appropriate to the individual child and situation). As a parallel process within UYCB groups, parents are provided with a containing experience to reduce the impact of their own anxieties on their ability to think, enabling them to reflect on the meaning of their child's behaviour. It has been reported that they are thus better able to sensitively manage their child's behaviour (Bateson, Delaney, & Pybus, 2008).

UYCB has an emerging evidence-base; in 2012 the DfE rated it as having "preliminary" evidence as a promising intervention. The basis for this was a small, uncontrolled pilot study carried out by Bateson et al. (2008), which found that participation in a group was associated with reduced problem behaviour and parental anxiety. Since the DfE review, a much larger uncontrolled study also found that attendance in the group is associated with improved child behaviour and parental well-being three months post-group (Smith, 2013). In addition, the findings of a large qualitative study using brief feedback questionnaires after each session indicated that parents were highly satisfied with the intervention (Johnson & Wilson, 2012). This latter study also used Content Analysis to identify themes in parents' feedback (n=199) to open questions about the course as a whole. The themes identified were 'Making changes', 'Improved interactions', 'Feelings', 'Increased knowledge' and 'Improved understanding', which the authors linked to the theoretical concepts of the Solihull Approach, and argued

were indicative of parents' understanding of the model. However, little is known about parents' in-depth experience of the intervention, or their reflective views on the group in the longer-term.

The in-depth experiences and reflective views of parents attending other parenting group programmes (particularly, the Incredible Years) have been explored in other studies. For example, several qualitative studies have used interviews to identify aspects of the programme that parents found helpful and unhelpful, perceived changes in the parent-child relationship, perceived changes in parents' understanding of their children's behaviour, and whether parents have been able to implement the material (Patterson, Mockford, & Stewart-Brown, 2005; Petra & Kohl, 2010; Polansky, Lauterbach, Litzke, Coulter, & Sommers, 2006). Such qualitative findings have enhanced understanding of the components that make different parenting groups meaningful and helpful to parents and possible mechanisms of change (Kane, Wood, & Barlow, 2007), as well as factors that may influence longer-term outcomes (Furlong & McGilloway, 2014).

The present study therefore aimed to examine in-depth the experiences and reflective views of parents who have attended a UYCB group. The main objectives were to understand how parents made sense of participating in the group, whether they have been able to implement new knowledge and skills, and how the group may have been relevant to them, approximately ten months after completing it. The methodology chosen was Interpretive Phenomenological Analysis (IPA), since this is a rigorous approach committed to understanding the experiences of participants in a specific context (Smith, Flowers, & Larkin, 2009). It was hoped that the findings would contribute to an improved understanding of possible reasons for the previously reported effectiveness of the UYCB group and inform future developments.

## Method

### *Ethics*

This study was approved by the NRES West Midlands and Staffordshire Committee.

### *Intervention*

UYCB is a ten-week parenting programme for parents of children aged 0–18 years, meeting each week for two hours. The sessions include a break and refreshments, and a crèche if necessary. The groups are run in community venues and facilitated by two community practitioners (e.g. family support workers, psychologists) trained in the Solihull Approach and group delivery. Facilitators are provided with a manual outlining the session content and mode of delivery (see Table 9).

**Table 9.** *Session content for UYCB*

Session	Title
1	Introduction
2	How are you and your child feeling?
3	Tuning into your child's development
4	Responding to your child's feelings
5	Different styles of parenting
6	Parenting child partnership – having fun together
7	The rhythm of interaction and sleep
8	Self-regulation and anger
9	Communication and attunement – how to recover when things go wrong
10	Celebration

**Modes of delivery include:** video, group discussion, small group discussion, role-play, and homework

Parents self-refer to the group, which is advertised through universal children's services. However, the group is recommended to parents known to be experiencing difficulties, and a small number of parents are required to attend for legal reasons (e.g. as part of a Court Order).

Generally, parents of children known to have very complex issues are directed to more intensive services (e.g. CAMHS). The group and crèche are provided free of charge.

### *Intervention fidelity*

To enhance fidelity of the group, facilitators receive either regular supervision from a Clinical Psychologist, or are invited to attend a delivery support group. Fidelity for this study was monitored using a session checklist, developed by Smith (2013). Facilitators were asked to indicate the degree to which they felt able to cover the manualised goals for each session using a 6-point Likert scale (ranging from 0=“not at all easy” to 5=“very easy”). The average total session score was 4.49 ( $SD=0.27$ , range=3.90 - 4.95), indicating that, overall, the facilitators felt able to adhere to the manual. One facilitator completed checklists for only seven of the ten sessions. Another facilitator reported combining sessions 9 and 10 due to time constraints.

### *Procedure*

Participants were interviewed twice by the lead researcher: first within seven weeks of completing the group (Time 1, mean=3.7 weeks,  $SD=2.2$  weeks), and again nine to eleven months after completing the group (Time 2, mean=9.8 months,  $SD=0.83$  months). One participant (Tamara) withdrew from the study after the first interview. Participants were interviewed at their preferred location: seven at home and three in a clinic. Participants with a child aged three years or older completed the Strengths and Difficulties Questionnaire (SDQ, Goodman, 1997) immediately after the first interview. If they had more than one child, they were asked to complete the questionnaire for the child they primarily attended the group for; this is consistent with the routine evaluation procedure used by the groups. The facilitators provided pre-group SDQ scores if these were available. The SDQ scores were reviewed after analysis of the interview data to avoid influencing the researcher’s assumptions about any effect of the group.

### *Recruitment procedure*

The sample population were parents attending one of the ten UYCB groups known to be running in the North and South of the West Midlands between March and June 2013. Each group was visited once by a member of the research team between its second and fifth

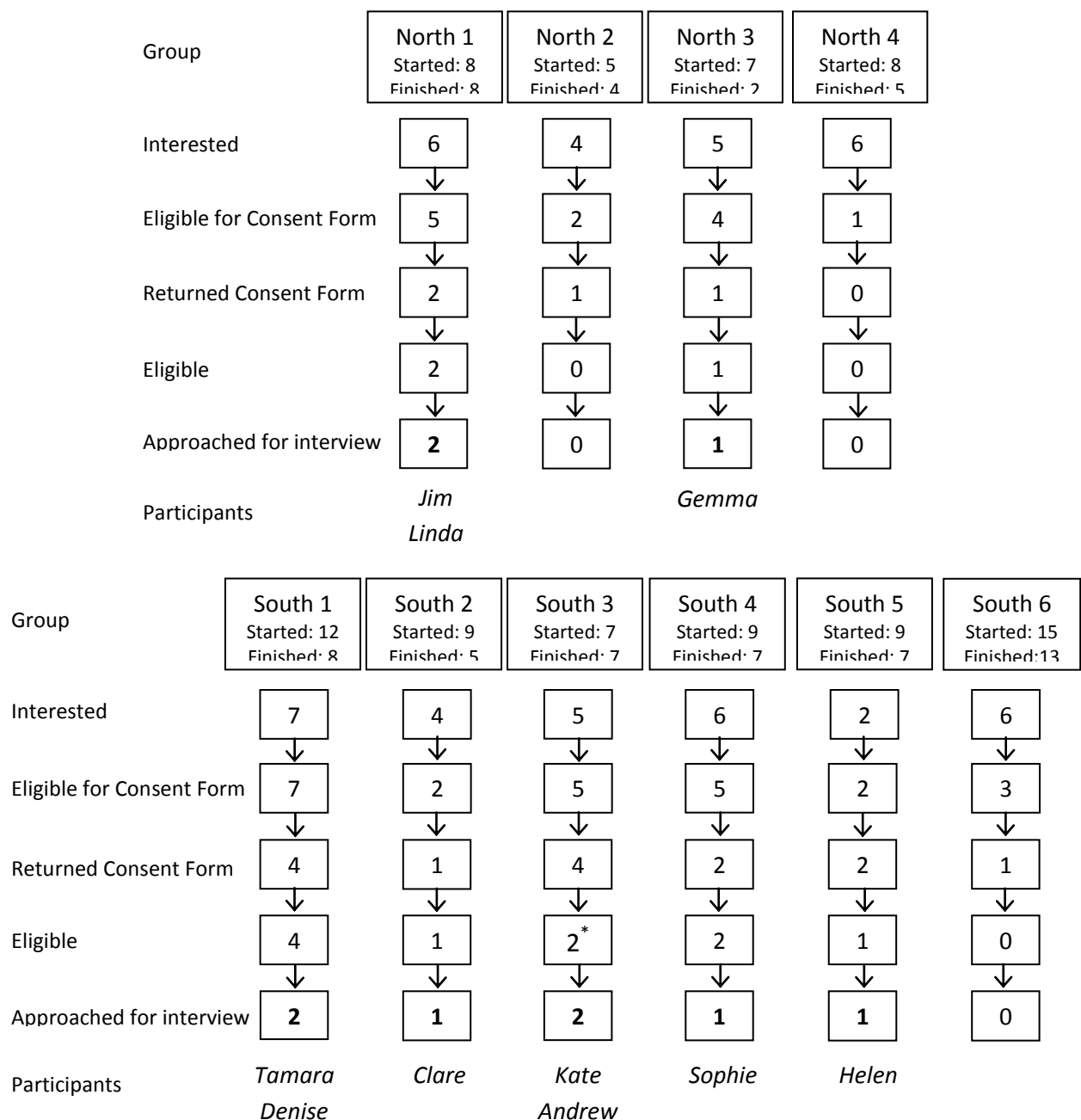
sessions. The researcher briefly described the study and requested contact details of any parents who were interested. It was explained that participants would receive a £10 shopping voucher for each of the two interviews. Interested parents (n=50) were then contacted by telephone, screened for eligibility, and given the opportunity to seek clarification. Eligible parents who continued to express interest (n=35) were posted the Information Sheet and Consent Form (see Appendices D and E) and asked to return the Consent Form by post (n=18). Following completion of the group, the facilitator was asked to confirm eligibility of the consenting parents.

#### *Inclusion/exclusion criteria*

The inclusion criteria were developed to balance the requirement in interpretive analysis of a fairly homogenous sample (Smith et al., 2009) with the diversity of the population attending the groups. To enhance homogeneity, parents under 18 years old were excluded, as were parents whose attendance in the group was mandatory. Parents who were unable to communicate in English were excluded because IPA requires attention to language use. Finally, parents were required to have joined the group by the second session and to have missed no more than two consecutive sessions. This criterion has proved satisfactory in a related study (Johnson & Wilson, 2012).

#### *Sampling*

The predetermined sample size was ten participants, to be balanced as far as possible across the North and South of the region. This is important to address geographical differences in social factors (relatively greater deprivation in the North) and familiarity with the programme (which was originally established in the South). Three eligible parents in the North and ten eligible parents in the South returned a Consent Form. To achieve a more geographically balanced sample, all the consenting parents from the North groups were approached for interview. For the South groups, one parent was chosen at random from each of the five represented groups. Two parents were then chosen at random from the remaining sample to reach the predetermined sample size. The sampling procedure is summarised in Figure 2.



**Figure 2.** Participant recruitment from UYCB groups in the North and South of the West Midlands

Figure 2 shows: i) the numbers of parents starting and completing each UYCB group known to be running in North and South of the West Midlands between March and June 2013; ii) the number of parents expressing initial interest in participating in the research; iii) the number of interested parents eligible to be posted a Consent Form; iv) the number of parents who returned the Consent Form; v) the number of parents who returned the Consent Form who were still eligible to participate in the research; and vi) the number of parents approached for interview. Names have been changed to protect confidentiality

\*The first parent selected for interview could not be contacted and a second parent was selected at random.

Efforts were also made to recruit ten participants who met the same inclusion criteria but did not complete the group. However, only one parent who returned a Consent Form withdrew from the group (North 2) and further efforts to recruit potential participants were unsuccessful. Therefore, the study focused only on parents who completed the group.

### *Participants*

The participants were eight mothers and two fathers who had attended a UYCB group in the West Midlands between February and July 2013. Table 10 summarises the participants' characteristics. Four children had a diagnosis of a mental health disorder (parent report): two children had a diagnosis of ADHD (Jim's nine-year old son and 16-year old daughter); one child had a diagnosis of Autism Spectrum Disorder (ASD) and had experienced a psychotic episode between Time 1 and 2 (Linda's ten-year old); and one had a diagnosis of "sensory issues" and was under assessment for ADHD (Clare's four-year old).

**Table 10. Participant profile**

Participant	Location	Sex	Age (yrs)	Ethnicity <sup>1</sup>	Mental health problems (self-disclosed)	Education	Relationship status	Ages of children (yrs) at Time 1, post-intervention	Age of child for SDQ (yrs) <sup>2</sup>	SDQ total difficulties score and classification <sup>3</sup>	
										<i>Pre-group</i>	<i>Post-group</i>
Jim	North	M	51	WB	None	CSE	Single	28, 26, 24, 16, 12, 9	9	NA	15
Linda	North	F	43	WB	None	Apprenticeship	Married	16, 10	10	NA	21
Gemma	North	F	21	WB	None	NVQ Level 1	Single	3	3	NA	14
Sophie	South	F	39	WB	None	NVQ Level 2	Single	15, 13, 11, 6, 2	N/A	N/A	N/A
Helen	South	F	37	WB	None	Degree	Married	19 months	N/A	N/A	N/A
Clare	South	F	38	WB	Depression	NVQ Level 1	Single	6, 4, 16 months	6	NA	28
Tamara	South	F	22	W/BC	None	GCSE	Single	5, 2	5	16	4
Kate	South	F	28	WB	Anxiety	PG Diploma	Married	8.5 months	N/A	N/A	N/A
Andrew	South	M	35	WB	None	Degree	Married	7, 5, 3	3	16	14
Denise	South	F	29	BB	None	AS Level	Single	2	N/A	N/A	N/A
<b>Mean</b>			<b>34.3</b>								
<i>SD</i>			<i>9.4</i>								<i>16</i>
										<i>8.0</i>	

<sup>1</sup> WB = White British, W/BC = White and Black Caribbean, BB = Black British

<sup>2</sup> N/A = not available for children younger than three years

<sup>3</sup> NA = not available from facilitator; SDQ scoring classification for Total Difficulties: 0 – 13 = normal, 14 – 16 = borderline, 16 – 40 = abnormal



## *Measures*

Two measures were used:

- 1) *Strengths and Difficulties Questionnaire* (SDQ, Goodman, 1997). The SDQ is a 25-item questionnaire for parents to provide information about their child's emotional and behavioural difficulties. It is widely used in clinical practice and research and has been shown to have satisfactory internal consistency (Cronbach's  $\alpha=0.7$ ), satisfactory test-retest reliability (ICC=0.88), and good concurrent validity (Muris, Meesters, & Van Den Berg, 2003). The questionnaire has two versions: one for parents of children aged 3–4 years, the other for parents of children aged 4–16 years.
- 2) *Semi-structured interview*. The interview schedule (see Appendix F) was developed following IPA guidance (Smith et al., 2009). The questions were reviewed by an academic, considered expert in IPA, and a Parenting Co-ordinator for CAMHS, who has experience of the parents' perspectives, and amended in response to their comments. The topic areas for the first interview included: pre- and post-group experiences of parenting; expectations about the group; the experience of being in the group; the possible influence of the group on parenting skills; parenting practices; their child; the parent-child relationship; understanding of any changes; and limitations of the group. The second interview was similar, but in addition queried changes in any specific difficulties that parents had discussed previously, as well as the possible influence of the group from their child's perspective. The interviews were audio recorded and transcribed verbatim. Participants had the opportunity to review their transcripts before analysis.

## *Data analysis*

Data were analysed by the lead researcher following IPA guidance (Smith et al., 2009). On a case-by-case basis, the transcripts were read and re-read and first reflections noted. The transcripts were then annotated for descriptive, linguistic, and conceptual features, and coded for emergent themes. Connections between the codes for each transcript were then identified to generate a thematic structure for each interview. The final superordinate and subordinate themes were generated by comparing thematic structures.

### *Validity checking*

The research team discussed the analysis at several stages. A selection of notes and codes were reviewed by the project supervisors and an independent researcher. The researchers checking the codes were satisfied with the lead researcher's interpretation. The research team reviewed and agreed the thematic structure.

Further credibility checks were: 1) reviewing agreement between the thematic structures of the first and second interviews; 2) comparing reported experiences with pre- and post-SDQ scores (where possible,  $n=2$ ), as a form of 'triangulation'; and 3) reviewing the final themes with a Clinical Psychologist who provides supervision to group facilitators and is independent of research activity.

### *Researcher perspective*

The lead researcher is a Trainee Clinical Psychologist who has worked in Solihull CAMHS (linked to the Solihull Approach) and received training in the Solihull Approach. To avoid influencing the researcher's assumptions about group processes, the lead researcher did not attend groups or train in group delivery. The project supervisors are Clinical Psychologists in CAMHS (not Solihull) and work using a variety of models, including the Solihull Approach.

## **Results**

### *SDQ scores*

The pre- and post-intervention SDQ scores are presented in Table 1. Of note, the parent of one child age three (Andrew) had completed the 4 – 16 years questionnaire version, rather than the 3 – 4 years questionnaire, prior to starting the group. This might have reduced the total difficulties he reported prior to the group.

### *Interview characteristics*

The average length of interviews at Time 1 was 30 minutes ( $SD=9$  minutes,  $range=19 – 41$  minutes), and the average length at Time 2 was 27 minutes ( $SD=13$  minutes,  $range=13 – 55$  minutes).

### *Validity checks*

The themes identified for each participant's first and second interviews were broadly consistent. The differences identified tended to reflect the development of ideas or skills that were reported at Time 1, or a change in circumstances that was linked to the children's health, rather than different themes. The two participants for whom pre- and post-group SDQ scores were available both reported an overall improvement in their children's behaviour that was consistent with the change in their SDQ scores. Finally, the Clinical Psychologist reviewing the themes was satisfied that they were credible and consistent with her experience of working with facilitators and parents.

### *Themes*

Four superordinate themes were identified, as summarised in Table 11. Themes 1 – 3 were generated from the analysis of the entire data set, whereas Theme 4 was the result of the pairwise comparison.

**Table 11.** *Theme summary*

<p><b>1. Satisfied customers</b></p> <ul style="list-style-type: none"><li>a) Improvement in specific problems</li><li>b) Success with new ideas</li><li>c) Improved experience of parenting</li><li>d) Valuing the group context (<i>containment and peer-support</i>)</li><li>e) A word about reciprocity</li></ul> <p><b>2. Development as a parent</b></p> <ul style="list-style-type: none"><li>a) Increased psychological mindedness</li><li>b) Strategic behaviour change</li></ul> <p><b>3. Improved self-belief</b></p> <ul style="list-style-type: none"><li>a) Increased confidence in parenting efficacy</li><li>b) Improved coping</li></ul> <p><b>4. Follow-up: the Matthew effect</b></p> <ul style="list-style-type: none"><li>a) Further improvement for those with mild initial difficulties or perceived improvement at Time 1 (majority, the experientially “rich”)</li><li>b) Deterioration in parenting experience for those with the most difficulties and least perceived improvement at Time 1 (minority, the experientially “poor”)</li></ul>
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## 1. Theme 1: Satisfied customers

Eight of the participants were extremely positive about their experience of being in the group and its effects on their experience of parenting, *“it helped me a lot. I don’t think I would have been able... I think it’s helped me and [child] a lot that group”* (Gemma, Time 2). The two remaining participants (Linda and Clare) were not wholly negative about the group, but both felt that, as parents of children with complex needs and developmental disorders, it was insufficient support for their level of difficulties:

*Linda: The group don’t really seem to, um, how can I say? [pause] to apply to me really, you know.*

*Interviewer: You can be honest about that.*

*Linda Yeah, yeah, at the end of the day, I mean, you know, about keeping calm and that sort of thing [was helpful], but, so at the end of the day, I don’t think it really, I don’t think it really knew how severe [child] was. (Linda, Time 2)*

All participants indicated that they would encourage parents to remain in the group, and three participants said they would recommend the group to others, *“it’s really good; I’d recommend people to go there as well”*. (Tamara, Time 1)

### *a) General improvement in specific problems*

Nine participants reported an improvement in specific difficulties with at least one of their children since attending the group (see Table 12). This was the case even for Kate and Helen, who attended with very young children (6 months and 17 months); within four weeks of completing the group, Kate reported an improvement in her son’s sleep, and within two weeks of completing the course, Helen felt that her daughter’s tantrums had reduced, *“I think there’s less tantrums because I communicate better with her.”* (Helen, Time 1)

Sophie and Gemma reported improvement in specific difficulties (sleep and tantrums, respectively) at Time 1, and then a small deterioration between Time 1 and Time 2. However, they both indicated, through their use of the word, “just”, that these behaviours were more manageable than before the group:

*“He still does get up now and again, but he doesn’t make a big drama, he literally just walks down, sits on the stairs, looking round, you can hear him, and then you just pick him up and take him back to bed”.* (Sophie, Time 2)

The exceptions to the positive trend were Linda’s ten-year old son and Clare’s four-year old daughter. At Time 1, Linda felt that her son’s aggressive behaviour had not changed; at Time 2, she felt that her son had become more aggressive in combination with a recent psychotic episode, but had improved with medication. She also expressed some frustration at her perceived lack of support from services. Similarly, Clare felt that her daughter’s aggressive behaviour had not changed at Time 1, and was worse at Time 2, and she expressed feeling increasingly overwhelmed. She attributed the deterioration to her daughter’s developmental condition and a lack of support she had to manage this:

*“She keeps flipping, she goes like, one minute she’ll do something and then she’s, and then she’ll like sometimes she’ll say she’s sorry but then other times she blatantly won’t and she’ll carry it on and on and on until she, she reduces me to tears, because I’m that fed up that I can’t shout at her anymore, I can’t seem to, to, to sort of like... it’s like she’s in control of me at the moment, and this is why I’ve gone on this [ADHD] course to see if I can get some tips and some small support with her because I do feel like I need more support on, on with her”*  
(Clare, Time 2)

and,

*“If I had more support with her I’d be able to handle the whole thing properly”*  
(Clare, Time 2)

However, Clare also has a six-year old son and she indicated that he had become a little less aggressive since she attended the group, *“he’s calmed down a bit, like I said, the only time he’ll say [hurtful] things is when he’s really angry”* (Clare, Time 2). This improvement is consistent with Clare’s view that the failure of the group with her daughter was connected to her other issues.

**Table 12.** *Perceived change in specific difficulties*

Participant	Difficulties	Time 1: Parents' perceived change in difficulty (based on interview question)	Time 2: Parents' perceived change in difficulty from Time 1 (based on interview question)	New challenges at Time 2
Sophie	Aggression	Improved	Further improvement	
	Sleep problems	Improved	A little worse from Time 1, but manageable	
Helen	Tantrums	Improved	Further improvement	Potty training
	Sleep	Not improved	Improved	
Clare	Aggression (son)	Small improvement	Further small improvement	Soiling and smearing
	Aggression (daughter)	Not improved	Worse	
Tamara	Tantrums	Improved	NA	
	Bedtime compliance	Improved	NA	
Kate	Sleep	Improved	No change	Tantrums
Andrew	Lack of compliance (youngest son)	Improved	Further improvement	
	Computer obsession (middle son)	Improved	Further improvement	
Denise	Tantrums	Small improvement	Further improvement	
Jim	Bedtime compliance	Improved	No change	
	Hyperactivity/aggression (son)	Not improved	Improvement (medication)	
Linda	Aggression	Not improved	Improvement (medication)	Psychotic behaviour
Gemma	Sleep	Improved	Further improvement	
	Tantrums	Improved	A little worse from Time 1, but manageable	Biting and pinching
	Potty training	Improved	Further improvement	

*b) Success with new ideas*

All the participants except Linda experienced success having applied ideas introduced by the group. Eight participants appeared immensely satisfied with the effectiveness of new ideas or strategies, such as rephrasing requests to consider the child's perspective, and taking more time to listen to children. This was interpreted from participants' use of strong positive adjectives (e.g. "brilliant"). For example:

*"In terms of rephrasing it, erm I mean you can always try a bribe! But before you try that [laughs], erm the park situation would be try and give them a bit of a countdown, so 'right, we're going to go in ten minutes', 'we're going to go in five minutes', that works brilliantly, rather than them having a great time and then suddenly saying, 'Right, that's it, stop that, we're going to do something else', you know, giving them time to adjust."* (Andrew, Time 1)

and the confidence with which participants described sharing new strategies with friends:

*"I have got a few close friends, and I'm just like, 'just try sitting down with them', 'I haven't got time for that', [I] said 'you'll be surprised', and my one friend has phoned back, 'Oh my god, it has made a difference, just that 5 seconds of listening!'"* (Sophie, Time 2)

Five participants indicated that strategies suggested by the group did not always work, or took some time to establish, for example:

*"So I've learnt to do that with my son as well, to give him a warning, we're going in a minute [laugh]; Interviewer: "and that makes him easier does it at the park?" Tamara: "Sometimes, it don't work all the time [both laugh]."* (Tamara, Time 1)

However, for three participants, the incidences of strategy failure were described in a context of overall satisfaction and communicated with a sense of manageability, for example, through the use of humour or laughter. Linda and Clare both indicated that most of the strategies suggested were inappropriate for their children with developmental disorders:

*“I’ve tried to sit and talk to him more now. Sit down and talk to him instead of, you know, just shouting and bawling at him, I do try and sit and have a chat, but you can’t get anything out of him. You know, he won’t tell you nothing.”* (Linda, Time 1)

*c) Improved experience of parenting*

All the participants indicated at least one way in which their experience of parenting had improved since attending the group. For Linda, this was limited to feeling better for shouting at her son less. Other positive changes were perceptions of an improved relationship with their child (seven participants), an increased sense of parental control (seven participants), and increased enjoyment of parenting (seven participants).

Regarding relationships, six parents indicated that they felt closer to their child, either through increased contact or physical affection, for example:

*“They like to do their own thing. But now, if I go anywhere now, ‘I’m coming Dad, I’ll come with you’, even if it’s for the shops, ‘can I come with you Dad?’ ‘Yeah, come on then’.* [unclear few words]. *Wherever I’m going, they want to come, like. You know what I mean, and I think that’s nice, like. You know what I mean. Makes you feel nice inside.”*  
(Jim, Time 1)

Five parents explicitly linked the improvement in their relationship to changes in their communication (e.g. being more aware of their child’s non-verbal communication), which is a key message from the group:

*“It’s [mother-child relationship] probably closer, since we, since we started the group, yeah, because I’m just more aware of her feelings, so I think we are a little bit closer”*  
(Helen, Time 1)

while Jim attributed the improvement in his relationships to paying more attention to his children, and Denise and Andrew considered their relationships had improved since trying to have more fun with their children:



*Interviewer: Do you have a sense of what's made that difference [feeling closer to children]?*

*Jim: I dunno, I think it's, like, paying a lot more attention, if you know what I mean. [pause] Like, proper attention to them, like. Like, what they want and what they don't want. You know what I mean.*

*Interviewer: And that's something that's come, come from the group?*

*Jim: Yeah. (Jim, Time 1)*

*Denise: Or like, he'll rather come and get my attention, want to have a hug and a kiss, so yeah, it is nice*

*Interviewer: Yeah. Do you have a sense of what's made that difference?*

*Denise: Erm, [pause] Maybe he feels a bit more happier, I don't know, erm [pause] maybe it's because he thinks it's a lot more fun, I don't know, I really don't know [laughs]. (Denise Time 2)*

Kate and Gemma both felt that the group had not impacted their long-standing good relationships with their children.

Several descriptions of success with specific strategies indicated an increased sense of parental control. For example, Tamara expressed a new active role in calming her son, through her strong tone with the words "I can":

*"Before I had problems with my son with that, it'd just be like oh, he'd go in a tantrum, go to his room, but now I can say to him, get down to his level and tell him, and then he'll come back down, instead of going to his room and sulking about it, so I can sort out the situation before he goes back off in a strop." (Tamara, Time 1)*

Moreover, Sophie, Denise, and Andrew indicated that the unequal power balance between them and their sons had shifted back towards them, for example:

*“Things have changed with [child] completely since I done the course, he was a nightmare, wouldn’t go anywhere with him, he was, he just dominated everything that we did”*

(Sophie, Time 2)

Consistent with these changes, seven participants expressed greater enjoyment of parenting and reduced stress since attending the group. This appeared to have been achieved through reducing parental self-pressure to intervene, and a conscious effort to make interactions more fun:

*“It’s like, a whole lot of pressure’s just dropped [not reacting to aggression], and you’ve got time to think then and get yourself organised, you know what I mean, a bit more better, like”.*

(Jim, Time 2)

*“If I can make it fun for the kids, erm then it’s just more enjoyable as well”.*

(Andrew, Time 1)

*d) Valuing the group context*

*i) Containment*

All of the participants were positive about their experience of being in the group. They described a containing environment, in which they felt welcome (five participants), comfortable to share their experiences (seven participants), and cared for (four participants). Feeling welcome appeared to be especially significant for Gemma and Clare, who were the participants with the least support outside of the group, *“I sort of get judged a lot, and to be able to go to these groups and get welcomed in, it’s really nice.”* (Gemma, Time 1)

Two participants (Sophie and Clare) indicated feeling comfortable to the extent that they had shared upsetting emotions with the group, and received a helpful response:

*“Sometimes it got a bit emotional with people, we all got a bit emotional and stuff, but it was good to let it out and then see what other people’s feedback is on it then, so it was very good, very good group.”* (Sophie, Time 1)

Gemma's descriptions of the facilitators taking time just for her, and being responsive to her personal needs may be interpreted as feeling cared for:

*"I didn't quite understand it at first, so I asked [the facilitator] to go over it and she spent half the session going over it again, and I thought that was really helpful."*

(Gemma, Time 1)

*"We had [hesitation] a little game session, because we had one session where we was talking about our past and that, and I've got a hard past myself so it was hard, so the next session they made it more fun for us."* (Gemma, Time 1)

Moreover, three participants appreciated the offer of on-going support from the facilitators, which may have communicated their emotional availability, *"[it is helpful] knowing that they'll always be there if I need to ask them about anything, regardless of whether the group's on or not."* (Clare, Time 1)

Finally, the provision of refreshments was appreciated by four participants, and was clearly linked to being helped to feel at ease by Andrew and Kate:

*"It was a really relaxed atmosphere, which was really nice, as you know, cups of tea and biscuits and stuff, and I think that makes a really big difference to helping people relax and chat and share experiences, it was really informal."* (Kate, Time 2)

## ii) Social context

All the participants felt they had benefited from hearing the experiences and views of other group members. Seven participants, including Linda, described learning new things or gleaning new ideas to try:

*"It was like, fascinating to listen to what he [group member] was saying, like, you know what I mean. You learn things off the others and all, that way."* (Jim, Time 1)

*“Listening to other parents with older children, erm, and how they’d dealt with it and you know, the strategies that were talked about in the group. I think I’ve probably done things differently when they’ve arisen.”* (Kate, Time 2)

Nine participants found it reassuring to hear that other parents also experienced difficulties, which appeared to reduce their perception of isolation (eight participants), their feelings of inadequacy (three participants), and their perception of their child’s difficulties (two participants), for example:

*“I suppose just sharing erm, firstly, having... one of the good things about the group of course is that you realise erm, ‘Oh god, I’m not the only one who’s in this situation.’”*

(Andrew, Time 1)

*“So again talking to the group and realised the other parents do feel cross [laugh] with their kids and have to walk out, makes you think that you’re not the world’s worst parent.”*

(Kate, Time 1)

*“the group’s taught me obviously that some of the people did have children with difficulties and stuff, and I’m like well I know he’s not, he is just being a normal two-year-old.”*

(Sophie, Time 1)

The two participants (Sophie and Jim) who felt that the experience had reduced their perception of their child’s difficulties, both indicated that this had been achieved through favourably comparing their child to the children of other parents in the group. The negative side of comparisons was that it appeared to make Linda and Clare feel worse as they perceived their problems to be more severe than the other children in the group:

*“Some of the things that, you know, obviously we talked about did get quite upsetting, you know, because you think you’re doing your best, and then when you hear somebody else say, ‘Well you know, I’ve done it this way and it works for me’, and you just get disheartened because you think you’re trying your best so hard, that you think, ‘Well why’s nothing working for me?’”* (Clare, Time 1)

Kate, who reported that she had previously worried a great deal about making the “right” decisions as a parent, indicated that hearing a range of views from other parents had helped her to develop a more flexible view of parenting:

*“I remember people with, you know, the same age children talking in the group, you know, what works for one doesn’t work for another. What works for the majority, you know, might not work for my child and that is absolutely fine.”* (Kate, Time 2)

Three participants (Sophie, Clare and Jim) valued more active peer support; they experienced shared problem solving for their own situations, and may have felt validated when they were able to offer suggestions.

*“It was brilliant group, they really was all good, friendly, all talked and listened, learnt from each other’s different things, because everyone’s got different problems that they want help with, and like I said, because I’ve got a few kids, I could help with some of their problems, they help with, we just shared different experiences so that it helps.”*

(Sophie, Time 1)

Finally, Clare and Sophie appeared to value receiving comfort from their group members when they felt upset:

*“There was one time I think I cried because something obviously touched me, and they were all, like they’re all really supportive, like they all come round and put their arms round me, it was like a little family”* (Clare, Time 1).

*e) A word about “reciprocity”*

Finally, four participants expressed a view about the group’s use of the word “reciprocity” to explain rhythms in interaction, sleep and arousal. Although the teaching was clearly valued by five participants, three participants commented that they found the word difficult to pronounce:

*“If there was something like that rec... rec... yeah, that one, they’d explain it and they kept explaining until it stuck, but I still can’t say it! [laugh].”* (Sophie, Time 2)

Interestingly, this included Helen who was educated to degree level; she appeared to feel that the word was unnecessarily technical:

*“Reciprocity is not a word that I hear in, you know, everyday language, so it was quite a big complicated word that I don’t know if it’s, you know, to do with, you know, the psychology of things, but I think it was just too, I don’t think it was needed, yeah.”*

(Helen, Time 1)

This view was consistent with her later reflection that she found the concept too technical:

*“I remember the word [reciprocity], I don’t know what it means, but it was just like what, this is a bit, I don’t know, it’s too much about psychology for me and I just didn’t get it, initiating the conversation and then the height of the conversation, and it was too over like analytical for me.”* (Helen, Time 2)

Sophie and Kate were the most enthusiastic about the teaching on reciprocity, which may reflect their educational backgrounds in childcare and psychology, respectively, *“I will always remember, what really sticks in my mind is the Dance of Reciprocity, that’s probably the whole psychology background.”* (Kate, Time 2)

The word “reciprocity” was not mentioned at all by four participants, although the influence of the teaching was evident for Linda and Tamara through their use of language (e.g. “peak of excitement”) specific to the teaching, *“how to like get them from the peak of excitement back down, I’ve been through that a lot”*. (Tamara, Time 1)

## **2. Theme 2: Development as a parent**

### *a) Increased psychological mindedness*

All participants reported that the group had influenced their thinking in ways that may reflect increased psychological mindedness. These inter-related processes were: i) increased reflection on situations (nine participants); ii) being more mindful of their own behaviour

(eight participants); iii) increased consideration of their child's perspective (eight participants); iv) increased reflection on their values (five participants); and v) consideration of psychological theory (eight participants). Six participants presented examples for four or five of these processes, whereas Linda and Jim indicated only one or two ways in which their thinking may be more reflective. The anecdotal evidence for each of these interpretations is presented below.

i) Increased reflection on situations

Increased reflection of situations was interpreted from multiple descriptions of assessing situations and thinking more before reacting, *"I just think more now before I shout. Sometimes I still shout, but I do think more about what the situation is, and why it's happening"* (Sophie, Time 1). Sophie's description also reveals a greater effort to identify the cause of difficulties or behaviour, which was expressed by six other participants as they tried to problem-solve or revise their initial interpretation:

*"Certainly when he starts whinging I think I'm more inclined to be like, 'Right, why? What's wrong?' Not just, 'Oh, he's whinging', you know, what, what's he do, what's he trying to do that he can't do, how can I help him?"* (Kate, Time 1)

Seven participants indicated that they thought more about the consequences of their actions:

*"I had a terrible habit of bringing her into my bedroom [at night], because I was exhausted and I think it was like an easy option at the time, and I wasn't thinking of the long run. So, uhm, I thought about that and I actually stopped bringing her into, into our bedroom."* (Helen, Time 2)

ii) Mindfulness of parental behaviour

Eight participants indicated increased awareness of parental behaviour. This included greater self-monitoring, greater awareness of their role as models to their children, and greater awareness of the effect of their behaviour on difficulties:

*“The only thing is sometimes when he’s in shops, I’ll have to [shout], he’ll run off and I’ll have to shout and it’s like [laughs], “I’m doing it again!” (Denise, Time 2)*

*“If I’m in the middle of playing with him something and if the doorbell goes or my phone goes, I just jump up to get it. That’s sending, you know, a message to him about social interaction that really isn’t normal for adults, so I try to finish an interaction with him, finish a conversation with him before I do what I need to do. (Kate, Time 2)*

*“It sort of like made me sort of like step back and think well perhaps I could like appointing differently, go, approach the situation differently to what I am now. ”*  
(Clare, Time 1)

### iii) Consideration of the child’s perspective

Related to their greater efforts to understand the cause of difficulties, eight parents indicated that they were now more considerate of their child’s feelings or perspective. This was interpreted through descriptions of increased empathy:

*“He’d get that upset that he’d fall asleep upset, so then I’m thinking, and then obviously with the group it’s telling you then, well, ‘if you go to bed upset you can’t close down, you can’t sleep, so he’s having the same problem.” (Sophie, Time 1)*

thinking from their child’s perspective:

*“He doesn’t realise that we need to leave now, we can’t wait 15 minutes, so that’s something I’m aware of.” (Andrew, Time 2)*

considering their child’s developmental limits:

*“You’ve really got to think about how you’re talking to them, erm keep it simple, for this age anyway, keep it simple and they just grasp it a lot more. So it’s just, it just makes you more aware of them.” (Helen, Time 2)*



reflecting on their own experiences as a child:

*“Trying to, as I said before, putting myself in his, in his, erm, shoes and thinking like how I was when I was his age, like, like playing, playing games and things like.”*

(Denise, Time 2)

applying knowledge of their own child:

*“Some of them [her other children], if I tell them off they’ll just shut up like that, but he [son] doesn’t. He wants to be over you then, so it’s just better just to carry on doing what I’m doing and let him get over it [tantrum] [laughs].* (Sophie, Time 2)

and being more observant of their children’s non-verbal communication:

*“When you’ve got a baby you have to read the signs because they don’t speak English in terms of what they’re feeling or what they want, erm but it’s the same [laughs], even now, especially around bedtime.”* (Andrew, Time 1)

The importance of making an effort to understand his children’s perspective was a key message from the group, underpinning many of the changes he made:

*“I suppose the main thing was looking at things from the child’s point of view. Being able to understand their way of thinking erm and from there you can kind of work on to most other things really.”* (Andrew, Time 2)

#### iv) Reflection on values

Five parents indicated having reflected on their values in parenting since attending the group. For example, Sophie, inspired by ideas from the group, expressed a recent resolve to have more fun with her children, *“now I think, and I do say to the girls, we need to laugh, we need to, you know, we do need to laugh and do stuff”* (Sophie, Time 2), whereas Helen expressed being more mindful of the parenting style she wished to achieve, *“just being more mindful about... I’m not telling her, I’m not telling her what to do, I’m asking her to do it and I want*

*her to do it for me, instead of being like controlled by me, that's, that's it really."* (Helen, Time 2)

v) Consideration of psychological theory

Finally, eight parents indicated that they consciously applied at least one of the psychological theories taught in the group to their specific difficulties. Reciprocity was most frequently alluded to, and described in a variety of contexts. For example, Kate described how it influenced her interaction with her son:

*"Before, I might have tried to get his attention again. I think through that [reciprocity] I understood that actually no, that's him signalling the end and he needs time to process that, and me trying to engage him is something again because I still want to play [laugh], it's not what he wants or what's best for him."* (Kate, Time 1)

While Sophie applied it to understanding her son's disturbed sleep:

*"Just everything you do, don't realise that you've always got to have closure, otherwise you don't shut down or you can't sleep or, and I try and think about that with the little 'un; if he's had something that's happened during the day, just try and make sure he can get to sleep without thinking about that, trying to sort that out."* (Sophie, Time 1)

Containment was less frequently alluded to, but described in practice by two participants (Helen and Gemma). Helen described helping her daughter make sense of her anger, *"if she gets angry I'll explain why I think she's angry, and let her explain to me why she thinks she's angry, and we'll, we'll try and resolve it"* (Helen, Time 2). Gemma described recalling advice to remain calm (containing) during her daughter's tantrums, *"now I just sit down and think, because [group leaders] say a child sees the mum calm then they'll just, they'll calm down themselves."* (Gemma, Time 1)

b) *Strategic behaviour change*

Related to the changes in their thinking, all the participants indicated that the group had influenced their behaviour with their children. Seven participants described introducing

behavioural strategies, such as distraction for tantrums. *“I tend to try and distract him from what he is doing and try and bring something else into it”* (Denise, Time 2), withholding attention from tantrums, *“now I just, when he’s having a tantrum I leave him to it, and he knows that I ain’t gonna entertain him while he’s like that”* (Clare, Time 1), and praise, *“I’m sitting there praising her and she’s looking at me as if to say, ‘Oh was that good then?’ [laugh] I went, ‘yeah, that’s really good, it’s brilliant!’”* (Gemma, Time 2)

Eight parents described setting firmer boundaries, *“I used to give in to him [coming downstairs after bedtime], for a play about with him, like, you know what I mean. And er, but I don’t let him have it now.”* (Jim, Time 1)

Other changes were consistent with the group’s teaching on reciprocity and containment. For example, five participants reported that they now asked their child to explain why they were distressed or naughty; for four of them, this was a dramatic change from previously shouting at them:

*“He kept hitting himself, whereas usually I would just be like, ‘Stop doing that, you shouldn’t do that’, and shout, whereas I took his hands away and just sat him down, and went ‘talk to Mummy, what’s the matter?’ and he told me then what was the matter.”* (Sophie, Time 1)

Five participants described being more willing to follow their child’s lead, and five participants indicated making more effort to share their child’s interests:

*“She’ll sit there now and like, sometimes she’ll wander off, but I just, instead of like, saying to her, ‘Just sit down, eat your dinner’, I just let her get on with it.”* (Gemma, Time 2)

*“I’d rather put, I’d put like housework as a priority, in front of like taking time to sit and play with her, so now I take the time, more time to actually give her like one-on-one sort of focus.”* (Helen, Time 1)

For Andrew, making more effort to share his son’s interests required a radical shift from his own values:

*“So instead of me shunning it [computer games] and going ‘That’s a really bad thing, you know’, I kind of embraced it if you like [laughs], and erm that worked well.”*

(Andrew, Time 1)

Related to this, three participants reported that they were trying to increase their children’s compliance by making tasks more appealing:

*“That whole fun thing has er worked in a lot of situations, erm which I’ve always seen as, as a chore, like going to the supermarket, or even going to the shops to me is a bit of a chore; if I can make it fun for the kids, erm then it’s just more enjoyable as well.”* (Andrew, Time 1)

Nine participants reported making an effort to stay calm with tantrums and aggression, *“I think I do try and stay a lot calmer with him,* (Linda, Time 2), and seven reported making more effort to listen and talk with their children. *“I listen to them more as well, as well as them listening to me, listen to them, because half the time I didn’t listen to them.”* (Clare, Time 1)

### **3. Theme 3: Improved self-belief**

#### *a) Increased confidence in parenting self-efficacy*

Eight of the ten participants indicated that their confidence to be effective parents had increased since completing the group. This was clearly expressed by five participants in response to a question about how the group had made them feel about themselves and their parenting skills, *“it’s made me feel more confident”* (Gemma, Time 1). Three of these participants (Andrew, Kate and Gemma) explained that they had previously struggled with low self-confidence, for example, Andrew felt that he was less skilled as a parent than his wife because he was not a mother and had only recently taken the role as the primary carer:

*“She’s been a mother, or she’s been the main carer for far more years than I have, so I’m still learning. I’m a lot more [laughs], I know we’re always learning, but I’m kind of catching up I suppose.”* (Andrew, Time 1)

Kate appeared to have been the most debilitated by her lack of confidence, constantly analysing her decisions, and was the most emphatic about how the group had helped:

*“I think confidence was a big thing that I got from the group, confidence in my own, um, my own judgement and my own ability, really.”* (Kate, Time 2)

Increased confidence was also interpreted through responses indicating reduced self-blame for problems, and favourably comparing themselves to other parents:

*“Makes you feel like it’s not you, that it’s not your parenting skills, it’s just obviously the individual children are all different.”* (Sophie, Time 1)

*“Listening to other people saying, you think, ‘Ooh, actually, no’, I think I know what I’d do in that situation. I might not know what I’m doing in other situations, and so I’d say, but not feeling entirely clueless about other things.”* (Kate, Time 1)

In addition, five parents reported giving advice to friends using insights from the group, which may reflect a sense of increased credibility as parents. Jim (Time 1), for example, explained how the group had contributed to the advice he had given to a male friend, whose wife was unwell, about how to settle his children for bed:

*“He [the friend] said, ‘I never thought of that’, know what I mean, ‘cos he ain’t been in that situation before, he ain’t been to the parenting [group] and that, like, you know what I mean. He said to me, he say, ‘Where’s all this come from?’ I said, ‘It’s that parenting!’”* [both laugh].” (Jim, Time 1)

Seven participants linked their increased confidence to specific aspects of the group. These included having their child’s behaviour normalised, which appeared to lead to a reduced perception of their difficulty, *“I was thinking there was problems with him, something wrong with him, so now I’ve realised that it’s just normal and he hasn’t got issues and stuff”* (Sophie, Time 1), gaining new knowledge, *“It made me feel really good actually that did, it [the group] was good fun, and it was nice that, you know, that I completed it and felt that I, you know, was armed with a little bit more knowledge.”* (Helen, Time 2), being offered a

more flexible view of parenting, *“it’s boosted my confidence to know, to just keep going, and there’s no wrong way of parenting”* (Gemma, Time 1), and experiencing success having made the recommended changes:

*“It’s like, I need to stop shouting, which I have done and it’s worked. I am really like, I’m like, well, I’m not amazed because I know, it’s like I was just doing it without even thinking, and now I’ve changed and I’ve stopped doing it.”* (Denise, Time 2)

*b) Improved coping*

Related to increased confidence, five participants indicated that they felt less overwhelmed when facing situations that had previously caused them distress and coped better with difficulties. These included difficulties with toilet training:

*“I was sort of scared to let that [accidents] happen, so I just kept putting her in nappies but in the end I just stopped buying them and I said, ‘if you wee yourself then we’ll deal with it, I’m not going to shout at you.’”* (Gemma, Time 2)

tantrums:

*“I do know how to enjoy my time being round instead of being stressed out with little tantrums.”* (Tamara, Time 1)

and eating:

*“Now, you know if he doesn’t want to eat his lunch, you know, what I’m offering him, fine, you know if for whatever reason he’s not hungry, I’ll try offering something in a little while, I won’t think, ‘Oh my God, he’s got to eat.’”* (Kate, Time 2)

Three of these participants also indicated feeling less daunted by future problems:

*“It’s just nice to hear varied and varied ages [sic], and that they all go through different stages and things, and obviously not having a boy before, things he’s doing, I don’t know, it’s just nice to think he’ll get over that bit.”* (Sophie, Time 1)

Four participants felt more able to persevere with challenges since attending the group, which Gemma linked explicitly to increased parental strength:

*“I think back about [the facilitator] says every time she [daughter] gets out of bed, ‘Just keep doing it, don’t give up, just keep doing it, be consistent with her’. And it has like given me willpower to keep going.”* (Gemma, Time 1)

Finally, four participants expressed increased resilience to feeling judged about their parenting, which enabled them to persevere with their preferred course of action. For example, Andrew (Time 2) described choosing to tolerate feeling judged negatively (by his wife) to pursue his values:

*“After dinner, [I want to] put all the stuff away, wipe the table clean and all that and stuff, you know, the kids are doing their own thing, probably watching telly while all that’s happening. Occasionally I think ‘Sod all that, I’ll do that tonight’. The house is a mess when [my wife] comes in, but, you know, the kids have had a much better time because I’ve spent time with them rather than clearing up after them, which can wait. And, you know, there’s things on Facebook that sort of say, you know “a house full of happy children is a messy one.”* (Andrew, Time 2)

Slightly differently, Clare reported feeling less distressed when her son made hurtful comments to her:

*“I tend to not take it personally now, because I just think you’re just letting off steam, you know, he’ll, sometimes he’ll go up in his room, and he’ll stay in his room and then he’ll come down and he’ll calm down, and he will apologise.”* (Clare, Time 2)

#### **4. Theme 4: Follow-up: the “Matthew Effect”**

The follow-up interviews clearly divided into those who had initially experienced improvements in their experience of parenting and continued to do so, and hence were positive about the group (the experientially “rich”, seven participants), and those whose experience had become worse and felt that the group had been of little benefit (the experientially “poor”, Linda and Clare). The experience of cumulative advantage and disadvantage is known in sociology as the ‘Matthew Effect’ (Merton, 1968).

Similarities between the experientially “poor” in the sample (Linda and Claire) were: i) they were among the five parents describing especially negative experiences of parenting prior to the group; ii) they were the only parents not to have perceived an improvement in their child’s difficulties at Time 1; and iii) they had the highest post-group scores on the SDQ for their child. In addition, they both had a child with a developmental disorder and felt that the intervention was not sufficiently specialised for their difficulties.

Most participants, however, indicated that their experience of parenting had improved between Time 1 and Time 2. In contrast to Linda and Clare, these parents were experientially “richer” to start with, either beginning the course with a largely positive experience of parenting (Helen and Kate), having a child who was too young to present significant challenges (Helen, Kate and Denise), and/or had perceived an improvement in at least one of their difficulties with all their children at Time 1 (six participants). Five of these parents perceived further improvement in at least one of their difficulties at Time 2, for example:

*Interviewer: How have they [tantrums] been since we last met?*

*Sophie: I’d say from then, 100%.*

*Interviewer: Better?*

*Sophie: 100% better. (Sophie, Time 2)*

The two parents (Kate and Jim) who had maintained the improvement in a specific difficulty indicated an improved experience of parenting through feeling less stressed, for example, when Jim described the effects of not reacting to his son’s aggression:



*“It’s like a whole lot of pressure’s just dropped, and you’ve got time to think then and get yourself organised.” (Jim, Time 2)*

Other parents indicated greater enjoyment of parenting through having a happier household:

*“He’d [child] probably say we were happy, happier.” (Sophie, Time 2)*

or having more fun with their child. Andrew, for example, expressed genuine pleasure at having introduced his son to one of his own interests developing it together, *“[it is a] bonding type thing, yeah, yeah, so that’s pretty cool.” (Andrew, Time 2)*

The most striking improvement between Time 1 and Time 2 was expressed by Denise. She initially described parenting as *“stressful”*, and *“tiring”*, but was not experiencing significant behaviour challenges with her two-year old son and had wondered if the group was relevant to her:

*“I did kind of think, ‘oh, I don’t know if this is for me because it’s a bit more... the children that are being talked about seem to be having a lot more of the, er, naughty behaviours.’ (Denise, Time 1)*

and her overall evaluation of the group was that the advice given did not always work,

*“I do try and follow what they said, like, just, you know, talk to him, and the way that you talk to him [rather than shouting]. But, as I said, it doesn’t always [laugh], because if he’s screaming, he’s, you’ve got to try to match his voice otherwise he doesn’t hear you [laughs], so [hesitates] it’s easier said than done.” (Denise, Time 1)*

Furthermore, Denise reported telephoning her mother when she could not calm her son down:

*“Sometimes I end up calling my Mum [laughs], like ‘Mum, what shall I do?’ And she normally just talks to him and that normally calms him down, because I mean they’re quite close.” (Denise, Time 1)*

However, her account in the second interview indicated that she had regained authority, and become closer to her son:

*“When I get down to his level, he’ll try and like turn away and stuff like that because he knows Mummy’s not joking she’s being serious.”* (Denise, Time 2)

*“He has been a lot more, ‘Mummy can I have a cuddle, Mummy can I have a kiss?’ and it is, it is quite nice actually.”* (Denise, Time 2)

Likely reasons for this transformation were that Denise had persevered with the strategies, and the group had become increasingly relevant as she began to experience developmentally appropriate challenges:

*“I was telling about the techniques and things about, getting down to his level, or, and um obviously talking calmly. But that wasn’t working before. As I said, I think you just have to be persistent with it. And now that I’m continuing to do it it’s working a lot better, so I think at the start it was like, ‘Oh, my God, it’s not working’, but now because I keep doing it, it’s working, so you can’t just do it overnight, it doesn’t work to stop that, so I’ve actually just, I’ve realised that now.”* (Denise, Time 2)

*“I think he’s actually getting into the swing of terrible twos now.”* (Denise, Time 1)

She also appeared to be using more of the ideas, such as considering her son’s perspective; here, she demonstrated some of the most creative thinking:

*“I use a timer for my cooking, like when I’m cooking. And, erm, he likes to come and turn it off when it goes off, so I thought, ‘let me try and see if it will work with him getting dressed’, and it has; he likes to switch it off when he’s finished, and when the alarm goes off.”* (Denise, Time 2)

Like Denise, Sophie and Gemma felt that perseverance had been crucial in improving their children’s behaviour, and Kate had also found the group more relevant as her child had

developed, *“I am using things now that I heard people talk about with older children”*. (Kate, Time 2)

It appeared that Sophie, Helen and Andrew had become more reflective as they offered new reflections on their experiences. Andrew, for example, explained that he had recently realised that his expectations of “normal” behaviour were based on his own experience as a single child, which were unreasonable for his family of three children:

*“I was an only child, so I suppose in some ways I was expecting my children to behave like that [like adults] and I think that was unrealistic. My wife was one of four children and she said it was always just carnage in her house.”* (Andrew, Time 2)

Adjustment of expectations also appeared to contribute to Kate’s reduced perception of her son’s sleeping difficulties at Time 2, *“[sleep is] completely up and down. Yeah, never as bad as it was at that point, erm, but erm, I think I’m just, I’m much more confident and comfortable with the fact that it is going to be up and down. He’s a baby.”* (Kate, Time 2)

Finally, two participants, Kate and Andrew, appeared to have developed even greater confidence in their parental judgement since the first interview. For example, Kate explained that she was now more able to assert her own decisions with less concern for what others might think:

*“We talked about that in the group and, erm, I think that’s helped me to just sort of block all of that out and think, ‘No, I know what I want to do’; I’m comfortable and confident with what I want to do, and doing the job I want to do and not worrying too much about what, what other people think and what other people would do differently.”* (Kate, Time 2)

For her, increased confidence underpinned the overall improvement in her experience of parenting, *“I think with confidence comes, I can be more relaxed about things”* (Kate, Time 2)

## Discussion

This study investigated the experiences of parents attending the Solihull Approach parenting group, Understanding Your Child's Behaviour (UYCB), using Interpretive Phenomenological Analysis (IPA). The parents were interviewed at two time points, approximately ten months apart, which offers a longer-term perspective than has been possible in most previous research. Considering the results of both interviews, four major themes were developed.

### *Theme 1: Satisfied Customers*

"Satisfied customers" reflects the finding that most participants were extremely positive about their experience of being in the group, and attributed improvements in their experience of parenting to attending the group. This is consistent with the parental feedback reported by Johnson & Wilson (2012), in which most participants indicated that they found the group relaxing and effective at helping them make changes in their children's behaviour. Similarly, quantitative findings reported by Smith (2013) and Bateson et al. (2008), showed improvements in both child behaviour and parental well-being.

Several parents reported a closer relationship with their child, which they related to changes in their parenting following information on reciprocity and containment. The two participants who did not perceive a significant benefit from attending the group both felt that the group was insufficient for their children's developmental conditions.

"Satisfied customers" included participants' appreciation of the relaxed and welcoming atmosphere within the group, feeling safe to share personal experiences. This indicates that the facilitators were successful in providing containment for the parents, which is one of the theoretical tenets of the group and is hypothesised to restore parents' capacity to think (Douglas, 2006). All the parents valued the opportunity to meet other parents and share experiences, which appeared to contribute significantly to their new knowledge, confidence, and feeling of being supported. The taught material in the group was generally well received, although feedback on the teaching of reciprocity was mixed: several participants found the word difficult to pronounce, and at least one well-educated participant felt the concept was too academic. Perhaps unsurprisingly, the two participants who were most enthusiastic about reciprocity had backgrounds in childcare and psychology. This suggests that the word

“reciprocity” does not have widespread appeal, although the teaching was generally perceived as helpful.

### *Theme 2: Development as a parent*

“Development as a parent” summarises the many changes that participants reported in their thoughts and behaviour that were linked to more effective parenting. Changes in thoughts appeared to indicate increased reflection on their own behaviour, their child’s perspective, and psychological processes and were motivated by an enhanced desire to understand the presenting difficulty. Although there are multiple conceptualisations of “psychological mindedness” (Appelbaum, 1973; Grant, 2001; Hall, 1992), several of its proposed constructs overlap with these changes, for example: willingness to understand self and others (Conte, Ratto, & Karasu, 1996; Farber, 1985), reflectivity about psychological process (Hall, 1992), and capacity for change (Conte et al., 1996). There is also considerable overlap with the construct of reflective functioning (Fonagy, Steele, Steele, Moran, & Higgitt, 1991), which is more specifically understood as the “*mental function which organises the experience of one’s own and others’ behaviour in terms of mental state constructs*” (Fonagy & Target, 1997). Reflective functioning is associated with secure attachment, possibly through its contribution to more sensitive parenting and containment (Fonagy & Target, 1997; Grienberger, Kelly, & Slade, 2005; Slade, Grienberger, Bernbach, Levy, & Locker, 2005). Consistent with this, the changes in thinking reported by participants in this study depicted a parenting style that had become more responsive to their children’s mental states, for example, through eliciting information about their child’s internal experience when they were behaving disruptively.

Some of the changes in behaviour reported by parents were clearly linked to the changes in their thinking, for example, taking more time to listen to their children, and were consistent with the group’s teaching on reciprocity and containment. Moreover, several references to strategies and consistency indicated improved behaviour management, which is encouraged by the group. However, there may have been some misunderstanding with the recommended strategy of staying calm with aggression or tantrums, which was sometimes described as ignoring the behaviour and is not recommended (Douglas, 2006).

### *Theme 3: Improved self-belief*

“Improved self-belief” reflects participants’ multiple references to increased confidence in their ability to parent effectively, known in the literature as parenting self-efficacy (Bandura, 1982; Kendall & Bloomfield, 2005), and improved coping. There is considerable evidence that parenting self-efficacy is associated with parenting quality (Jones & Prinz, 2005; Sanders & Woolley, 2005) and enjoyment of parenting (Coleman & Karraker, 2000). This is consistent with our finding that parents perceived both an amelioration of their difficulties and greater enjoyment of parenting. This theme also describes a sense of achievement since at least three participants admitted to feeling that they lacked confidence prior to the group. Participants felt their confidence had increased through gaining new knowledge and experiencing success with new approaches, which clearly relate to two of Coleman and Karraker’s (1997) three requirements for parents to feel self-efficacious: i) “*knowledge of appropriate childcare responses*”; and ii) “*the belief that their children will respond contingently*”. Normalisation of difficulties is also recognised as a mechanism through which parenting groups are therapeutic (Webster-Stratton & Herbert, 1993). Given the link between self-efficacy, persistence and resilience (Bandura, 1993; Berry & West, 1993), it is perhaps unsurprising that the participants reported greater perseverance and apparent resilience to challenges, such as dismissing perceived negative judgments.

### *Theme 4: the “Matthew Effect”*

The final theme reflects the finding that participants described either further improvement or further deterioration in their experience of parenting between Time 1 and Time 2, depending on whether they had either advantaged or disadvantaged baseline characteristics, respectively. For example, the two parents reporting deterioration in their experience at Time 2 were the only parents to have a child who scored in the abnormal difficulty range on the SDQ (post-group). In addition, they were distinct from the other parents having perceived little improvement at Time 1 and having a child with a development disability. Their lack of perceived improvement may not be surprising as particularly serious child behaviour problems are beyond the scope of the group, and more intensive parenting programmes are recommended (Johnson & Wilson, 2012). Moreover, the deterioration in their parenting experience is consistent with the finding of Mash & Johnston (1983) that the self-esteem of parents of children with ADHD is age-related, being lower in parents with older children.

Crucially, this is the opposite for parents with typically developing children. This suggests that the cumulative deficit reported by the disadvantaged parents in this study might have been expected and the result of reinforcement from continued unsuccessful child-rearing experiences (Mash & Johnston, 1983).

Parents reporting an improvement in their experience appeared to have achieved this through consistency and perseverance, developing or using more of the ideas introduced by the group, continued reflection on their parenting, and a further increase in confidence, which were related back to their experience in the group. The group had also become more relevant to the parents attending the group with younger children as they faced new, developmentally appropriate challenges.

#### *Comparison with other parenting groups*

The results of this analysis overlap considerably with qualitative findings from studies of other parenting groups. In a systematic review of four qualitative studies of parenting programmes, Kane et al. (2007) proposed that the programmes improved parental control and self-confidence through the general provision of information and support from other parents in the group. More specifically, they identified that the groups had overturned the parents' sense of loss of control, self-blame, and sense of isolation, and were credited with improving parental confidence, coping, understanding of parenting techniques, and increased empathy with their children. More recent studies of specific groups, for example the qualitative evaluation of the Incredible Years parenting programme (IYPP) carried out by Patterson et al. (2005), have identified almost identical themes of improved parent-child relationships, increased parental confidence through normalisation, and effective use of behaviour management strategies. However, the parents' understanding of techniques clearly reflected material that is specific to the IYPP, for example, enforcing rules on a base of play and praise, in the same way that the parents in the present study had understood behaviour using the UYCB programme-specific ideas of containment and reciprocity.

Even more recently, Furlong & McGilloway (2014) presented a grounded theory analysis of parents' experiences of the IYPP in disadvantaged areas in Ireland. This study followed parents immediately after the group and again 12 and 18 months later and also revealed

themes related to perseverance and resilience, improved beliefs in self-efficacy, as well as a pattern of longer-term divergence in outcome as some parents continued to experience improvement, while others experienced deterioration. Like the participants in the present study, further improvement was attributed to consistent application of the ideas, although deterioration was attributed to external stressors rather than child pathology, as in the present study. One explanation for this difference is that the parents attending the IYPP were aware that the programme was intended for parents of children with problematic behaviour, whereas the participants experiencing deterioration in the present study attributed the group's failure to it being too general for their level of difficulty and perceived their children to have more severe problems than other children in the group. In contrast to the present study, Furlong & McGilloway placed less emphasis on changes in understanding of the child's perspective, and greater emphasis on utilising family and community resources. It is likely that this reflects differences in the theoretical underpinnings of the programmes: UYCB has a greater focus on empathy and relationships, while the IYPP has a greater focus on behavioural and communication strategies to improve children's behaviour. As might be expected, the findings of a qualitative study of an attachment-based parenting group identified themes of empathy, and improved verbal communication (Polansky et al., 2006), which were consistent with the present study.

In summary, therefore, it appears that parents' experience of being in the UYCB group was remarkably similar to parents' experience of other group parenting programmes, with the usual benefits of being in a supportive group of parents. However, the specific teaching on reciprocity and containment appears to be influential and a distinctive feature of the UYCB experience. To some extent, the overlap with other parenting programmes is unsurprising since UYCB integrates both attachment and behavioural ideas, which form the basis of many different parenting programmes. Moreover, analyses to identify efficacious elements of parenting groups (e.g. Kane et al., 2007) are likely to result in a convergence of taught material.

### *Strengths and limitations*

A limitation of this study is that, without a control group, it is not possible to ascertain the effect of a child's normal development on the improvement of difficulties perceived by their



parents between Time 1 and Time 2. However, several participants perceived improvement at Time 1 (and attributed this to the group), making it unlikely to be related to normal development. Another limitation is that this study did not include parents who withdrew from the group, those whose attendance was mandatory, or those who were unwilling to take part in research, which may have biased the sample towards parents who had a positive experience (attempts were made to interview a sample of parents who withdrew from the group, but this was unsuccessful). Assessment of the children's strengths and difficulties was also limited by use of the SDQ, which is suitable only for children aged three years and older, and was therefore unavailable for four of the participants.

Strengths of the study are that it included parents from a diverse range of backgrounds, included two fathers from groups that were comprised mostly of mothers, and recorded experiences of parents both immediately after the group and in the longer-term.

#### *Conclusion and recommendations*

The majority of participants were immensely satisfied with the group and reported associated improvements in their children's behaviour, their experience of parenting, their confidence and coping. They also appeared to have developed as parents by becoming more reflective and empathetic, applying psychological theories taught in the group, and using behaviour management strategies more effectively. The containing atmosphere and peer-support were valued elements of the group context, and especially appreciated by parents with little support outside the group.

These findings are encouraging and suggest that UYCB is a helpful and valued programme for parents of children with normal to moderate behaviour problems. While the experiences of parents attending the group have much in common with the experiences of parents attending other valued parenting groups, the reported effects of participation do appear to reflect the specific ideas taught in the group.

Finally, the findings from this research suggest some recommendations for the future delivery of the UYCB group. Firstly, facilitators may wish to consider whether it might be unhelpful to accept parents of children with severe behaviour difficulties and/or developmental

disabilities, even in the absence of more appropriate group programmes. This study showed that parents may become distressed by comparing themselves and their children unfavourably to families with normally developing children. We therefore support the current development of an ASD-specific UYCB group programme (see <http://communityservices.heartofengland.nhs.uk>). Secondly, developers and facilitators may wish to consider using plain language terms for ‘reciprocity’, since several participants, even one who was well-educated, found it difficult to pronounce or fully understand. Possible alternatives might include: “natural rhythms”, “turn-taking”, or “being in-tune”. Finally, given that “staying calm and containing” sometimes appears to be misinterpreted as “distancing themselves from the situation”, it may be worth placing greater emphasis on the distinction to avoid parents ignoring aggressive behaviour or tantrums where there is a need for containment and emotion regulation.

## **Key messages**

- The Solihull Approach parenting group, Understanding Your Child's Behaviour (UYCB), is a relationship-based parenting programme that aims to help parents manage universal to complex difficulties with their children.
- This is the first in-depth study of parents' experiences of being in the UYCB group; it aimed to understand their perception of the group and how it was relevant to them immediately after the group, and approximately ten months later.
- The majority of parents expressed immense satisfaction with the programme and amelioration of their difficulties. The group processes of containment and peer-support were highly valued and appeared to contribute to their development as reflective and skilled parents with greater confidence and coping abilities. These positive outcomes appeared to have been maintained and even developed approximately ten months later.
- Parents who were dissatisfied had children with the most complex needs and developmental conditions; their experience of parenting had deteriorated approximately ten months later.
- The findings suggest that UYCB is successfully achieving its aims and communicating its theoretical principles (i.e. reflection and nurturing through containment, reciprocity, and sensitive behaviour management), although change also appears to occur through group processes found in other parenting programmes (e.g. peer-support and reassurance).

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# Executive Summary

## *Understanding parenting groups: parents' experiences and objective changes in parent-child interaction*

This document provides an accessible summary of the literature review and research study submitted in partial fulfilment of the requirements for the degree of Doctor of Clinical Psychology (Clin.Psy.D) at the University of Birmingham.

### **Overall context**

Parenting groups are educational courses that aim to help parents fulfil their role more effectively. A number of different programmes are available, for example the “Incredible Years” (a group for parents whose children have severe behaviour problems) and “Parent Effectiveness Training” (a group for parents whose main interest is in improving their parenting skills).

There is good evidence that parenting groups can improve children’s behaviour and the well-being of both parents and children. Researchers are now interested in understanding more about how parenting groups work so that they can: 1) improve the content of current programmes; and 2) determine which programmes may be most helpful for individual families.

This thesis contains two parts that aim to improve our understanding of parenting groups. The first part is a review of already published research evaluating a number of different parenting groups; this review summarises their key findings with respect to changes in parent-child interaction and presents a synthesis of the literature to date. The second part presents new data on the experiences of parents who have taken part in one particular parenting group: “Understanding Your Child’s Behaviour” (UYCB).

## **1. Literature review: How do parenting groups impact observed parent-child interaction? A systematic review of the parenting groups recommended to UK commissioners**

**Background:** Scientists believe that parenting groups improve children's overall well-being by improving the quality of the interaction between parents and children. This belief is based on theories of child development that emphasise the importance of good early parent-child relationships (e.g. Patterson, 1989), and studies of parenting groups that have found improvements in parent-child interaction occur before improvements in child behaviour (e.g. Gardner et al., 2006). Examples of good quality interaction include a sensitive response to distress, emotional warmth, and appropriate use of praise. Conversely, examples of poor quality interaction include criticism and physical aggression.

The UK government recognises that parenting groups are an important way to improve well-being, and has committed to increasing the number of groups provided. To support health and community services in choosing which programmes to offer, the Department for Education recently produced a list of 21 parenting group programmes that have been shown to be effective. However, little is known about the extent to which the different programmes have been evaluated using objective measures of parent-child interaction and the nature of any changes.

**Aim:** This review aimed to examine the extent to which different parenting groups are associated with changes in parent-child interaction and the nature of any changes. To maximise the relevance of this review to practitioners and researchers in the UK, the review was restricted to the manualised parenting programmes recommended by the Department of Education.

**Method:** The review involved a systematic search for studies of recommended parenting groups that included objective (observational, rather than questionnaire) measures of parent-child interaction. Four electronic databases were searched for articles that included the names of the parenting groups together with other words that are relevant to parent-child interaction.

The references lists of articles meeting the review criteria were searched by hand for any other eligible articles not found in the databases.

**Results:** Seventeen studies were identified, evaluating eight of the 21 recommended programmes; nine of these studies evaluated the Incredible Years programme. Almost all of the studies found improvements in observed parent-child interaction following the parenting groups. The improvements included increases in positive interaction (e.g. praise), decreases in negative interaction (e.g. criticism), as well as improvements in parent behaviour (e.g. giving attention) and emotional/behavioural aspects of the interaction (e.g. parental warmth towards child). It was difficult to identify more specific patterns because most of the studies combined several types of parent-child interaction into summary variables when analysing their data (e.g. “positive parenting”).

**Conclusions:** At present, only around 40% (8/21) of the group-based parenting programmes recommended to UK commissioners appear to have been evaluated using observed measures of parent-child interaction. This sparse coverage limits the evidence for their effectiveness as well as psychologists’ understanding of how they might improve outcomes for parents and children. However, the findings for the remaining parenting groups indicate that they are associated with a range of improvements in parent-child interaction. Further research is required to understand the nature of the changes in more detail and to broaden the evidence-base so that more groups have an evidence-base similar to that of the Incredible Years.

## **2. Research paper: Parents’ experiences of being in the Solihull Approach parenting group, “Understanding Your Child’s Behaviour”: an Interpretive Phenomenological Analysis**

**Background:** The Solihull Approach parenting group programme, “Understanding Your Child’s Behaviour” (UYCB) aims to help parents experiencing normal to moderately complex issues. The group is based on a distinct theoretical model, promoting a reflective and empathetic parenting style, from which appropriate and effective boundaries follow. There is evidence from quantitative studies that participation in UYCB is associated with improvements in child behaviour and parental well-being. However, little is known about

parents' in-depth experiences of participating in UYCB or their views on the programme. Such information might reveal mechanisms of change and inform programme development.

**Aim:** This study aimed to examine in-depth the experiences and reflective views of parents who have attended a UYCB group. The main objectives were to understand how parents made sense of participating in the group, whether they have been able to implement new knowledge and skills, and how the group may have been relevant to them approximately ten months after completing it.

**Method:** Ten parents (who attended the groups for children aged 8 months to 10 years) were recruited from eight UYCB groups across the West Midlands. The parents were interviewed immediately after completing the group and again ten months later. The interview data was analysed using a method called Interpretative Phenomenological Analysis (IPA). This is a rigorous method concerned with obtaining an in-depth account of participants' subjective experience. (As a result, IPA is not intended to represent the views of a large group of people.)

**Results:** Four main themes were identified. The first theme, "Satisfied customers", reflected the finding that the majority of participants were extremely positive about their experience of participating in the group. They perceived improvements in specific problems, success in applying new ideas, and/or greater enjoyment of parenting. All the parents valued the supportive and safe group environment. As a minor exception to their overall satisfaction, some parents felt that the group used language that was unnecessarily technical. Two participants (whose children also had the most complex needs) felt that the group was insufficient to help with their level of difficulty.

The second theme, "Development as a parent", reflected the many changes participants reported in their thoughts and behaviour that were linked to more effective parenting. Crucially, several parents indicated that they were more reflective, committed to understanding situations from their child's perspective, and applying the psychological theories introduced in the group.

The third theme, “Improved self-belief”, reflected multiple references to increased self-confidence and improved coping.

Finally, the fourth theme, the “Matthew effect”, reflects the finding that the parents who initially benefited from the group, or did not have significant difficulties to start with (the experientially “rich”) reported further benefits at the follow-up interview 10 months later; in contrast, those parents with complex difficulties and who perceived few initial benefits (two participants, the experientially “poor”) experienced deterioration at the follow-up interview. Thus the (experientially) rich get richer and the poor get poorer.

**Conclusion:** Our findings suggest that UYCB is successfully achieving its aims and communicating its theoretical principles (reflective and nurturing parenting with sensitive behaviour management). However, the group also appears to help parents via processes that are common to most types of parenting groups (e.g. peer-support and reassurance). Improvements in participants’ experience of parenting appear to be maintained, and even enhanced, ten months later. The least satisfied parents had children with the most complex needs, suggesting that the intervention may be most appropriate for those with normal to moderate difficulties with parenting. The findings suggest that the programme might be improved by simplifying some of the language and offering separate groups for parents needing support with more complex issues.

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## **Research summary: Parents' experiences of being in the Solihull Approach parenting group, "Understanding Your Child's Behaviour"**

Research team: Dr Lydia Vella, Dr Ruth Butterworth, Dr Rebecca Johnson, and Dr Gary Law

Parenting groups are becoming a popular way to support parents. Psychologists are interested in finding out what it is like for parents to be in a parenting group. This information will help us understand how parenting groups may be useful and how they might be improved.

This research project focused on the experiences of parents who attended a parenting group called "Understanding Your Child's Behaviour".

The project involved ten parents (eight mothers, two fathers) who were interviewed about their experience and views on the group soon after it finished, and again ten months later. The interviews were recorded and typed up. The interviews were analysed using a method called Interpretive Phenomenological Analysis, which involves looking at each interview in detail and eventually identifying themes from across all the interviews.

Four main themes were identified:

1. "Satisfied customers" – All the parents valued the relaxed and welcoming atmosphere, and found it helpful to share experiences with other parents. The majority of parents were pleased that specific difficulties had improved, new ideas were working, and/or parenting had just become more enjoyable. However, some parents felt that the group used too much jargon (for example, "reciprocity"), and a small number of parents (whose children also had the most complex needs) felt that the group was too general to help with their difficulties.

2. "Development as a parent" – The majority of parents indicated that they were more thoughtful about their parenting, trying to see situations through their child's eyes, applying information about child psychology introduced in the group, and/or establishing boundaries more effectively.

3. "Improved self-belief" – The majority of parents indicated improved self-confidence and coping.

4. "The 'Matthew Effect'" – Parents who thought that the group had been helpful soon after it finished indicated that it continued to help them ten months later; in contrast, the small number of parents who thought the group had not been helpful soon after it finished, and whose children had the most complex needs, indicated that parenting had become even harder.

These findings suggest that the group is valuable and helpful to many parents. The group seems to help by providing a safe environment for discussion, reassurance and support from the other parents, and by providing information about child psychology. Future groups could be improved by using less jargon, running separate groups for parents of children with very complex needs, and offering extra support to parents who are struggling to notice any changes in their difficulties or relationship with their child towards the end of the course.

We are extremely grateful to all the parents who took part in this research.  
If you would like more information about the project, please contact Dr Gary Law, School of Psychology, University of Birmingham, Edgbaston, B15 2TT or email [g.u.law@bham.ac.uk](mailto:g.u.law@bham.ac.uk)

## Appendix A: Excluded Parenting Programmes

<b>Programme</b>	<b>Reason for exclusion</b>
1 Families and Schools Together (FAST)	Parent and child attend sessions together; sessions involve work with both parent and child (live coaching on family interaction; family exercises to improve communication and identify feelings); a representative from the child's school also attends group
2 Multi-dimensional Treatment Foster Care – Adolescent (MTFC-A)	Child receives parallel intervention (weekly individual sessions from a therapist; help from a community skills trainer)
3 Multi-dimensional Treatment Foster Care – Prevention (MTFC-P)	Child receives parallel intervention (weekly therapeutic playgroup)
4 The Strengthening Families Programme 10 – 14 (SFP 10-14)	Parent and child attend together; sessions involve work with both parent and child (youth group for improving social competency and promoting well-being; family exercises to improve and relationships)
5 The Scallywags Programme	Child receives parallel intervention (individualised support programme with three support workers, including school liaison)

## Appendix B: Data Extraction Tool

Authors	
Year	
Aims	
Programme	
Design Intention to treat: Y/N	
N (for all groups)	
% agreed to participate % Attrition % Attendance	
Participants Age, gender, disease characteristics	
Observational measures (parent codes, child codes)	
Other measures  Parent:  Child:	
Follow-up periods	
Key findings Observational          Other findings (significant changes)	
Limitations	



## Appendix C: EPHPP Quality Assessment Tool

### QUALITY ASSESSMENT TOOL FOR QUANTITATIVE STUDIES



#### COMPONENT RATINGS

##### A) SELECTION BIAS

(Q1) Are the individuals selected to participate in the study likely to be representative of the target population?

- 1 Very likely
- 2 Somewhat likely
- 3 Not likely
- 4 Can't tell

(Q2) What percentage of selected individuals agreed to participate?

- 1 80 - 100% agreement
- 2 60 – 79% agreement
- 3 less than 60% agreement
- 4 Not applicable
- 5 Can't tell

RATE THIS SECTION	STRONG	MODERATE	WEAK
See dictionary	1	2	3

##### B) STUDY DESIGN

Indicate the study design

- 1 Randomized controlled trial
- 2 Controlled clinical trial
- 3 Cohort analytic (two group pre + post)
- 4 Case-control
- 5 Cohort (one group pre + post (before and after))
- 6 Interrupted time series
- 7 Other specify \_\_\_\_\_
- 8 Can't tell

Was the study described as randomized? If NO, go to Component C.

No Yes

If Yes, was the method of randomization described? (See dictionary)

No Yes

If Yes, was the method appropriate? (See dictionary)

No Yes

RATE THIS SECTION	STRONG	MODERATE	WEAK
See dictionary	1	2	3

### C) CONFOUNDERS

(Q1) Were there important differences between groups prior to the intervention?

- 1 Yes
- 2 No
- 3 Can't tell

The following are examples of confounders:

- 1 Race
- 2 Sex
- 3 Marital status/family
- 4 Age
- 5 SES (income or class)
- 6 Education
- 7 Health status
- 8 Pre-intervention score on outcome measure

(Q2) If yes, indicate the percentage of relevant confounders that were controlled (either in the design (e.g. stratification, matching) or analysis)?

- 1 80 – 100% (most)
- 2 60 – 79% (some)
- 3 Less than 60% (few or none)
- 4 Can't Tell

RATE THIS SECTION	STRONG	MODERATE	WEAK
See dictionary	1	2	3

### D) BLINDING

(Q1) Was (were) the outcome assessor(s) aware of the intervention or exposure status of participants?

- 1 Yes
- 2 No
- 3 Can't tell

(Q2) Were the study participants aware of the research question?

- 1 Yes
- 2 No
- 3 Can't tell

RATE THIS SECTION	STRONG	MODERATE	WEAK
See dictionary	1	2	3

### E) DATA COLLECTION METHODS

(Q1) Were data collection tools shown to be valid?

- 1 Yes
- 2 No
- 3 Can't tell

(Q2) Were data collection tools shown to be reliable?

- 1 Yes
- 2 No
- 3 Can't tell

RATE THIS SECTION	STRONG	MODERATE	WEAK
See dictionary	1	2	3

## F) WITHDRAWALS AND DROP-OUTS

(Q1) Were withdrawals and drop-outs reported in terms of numbers and/or reasons per group?

- 1 Yes
- 2 No
- 3 Can't tell
- 4 Not Applicable (i.e. one time surveys or interviews)

(Q2) Indicate the percentage of participants completing the study. (If the percentage differs by groups, record the lowest).

- 1 80 -100%
- 2 60 - 79%
- 3 less than 60%
- 4 Can't tell
- 5 Not Applicable (i.e. Retrospective case-control)

RATE THIS SECTION	STRONG	MODERATE	WEAK	
See dictionary	1	2	3	Not Applicable

## G) INTERVENTION INTEGRITY

(Q1) What percentage of participants received the allocated intervention or exposure of interest?

- 1 80 -100%
- 2 60 - 79%
- 3 less than 60%
- 4 Can't tell

(Q2) Was the consistency of the intervention measured?

- 1 Yes
- 2 No
- 3 Can't tell

(Q3) Is it likely that subjects received an unintended intervention (contamination or co-intervention) that may influence the results?

- 4 Yes
- 5 No
- 6 Can't tell

## H) ANALYSES

(Q1) Indicate the unit of allocation (circle one)

community   organization/institution   practice/office   individual

(Q2) Indicate the unit of analysis (circle one)

community   organization/institution   practice/office   individual

(Q3) Are the statistical methods appropriate for the study design?

- 1 Yes
- 2 No
- 3 Can't tell

(Q4) Is the analysis performed by intervention allocation status (i.e. intention to treat) rather than the actual intervention received?

- 1 Yes
- 2 No
- 3 Can't tell

## GLOBAL RATING

### COMPONENT RATINGS

Please transcribe the information from the gray boxes on pages 1-4 onto this page. See dictionary on how to rate this section.

A	SELECTION BIAS	STRONG	MODERATE	WEAK
		1	2	3
B	STUDY DESIGN	STRONG	MODERATE	WEAK
		1	2	3
C	CONFOUNDERS	STRONG	MODERATE	WEAK
		1	2	3
D	BLINDING	STRONG	MODERATE	WEAK
		1	2	3
E	DATA COLLECTION METHOD	STRONG	MODERATE	WEAK
		1	2	3
F	WITHDRAWALS AND DROPOUTS	STRONG	MODERATE	WEAK
		1	2	3
				Not Applicable

### GLOBAL RATING FOR THIS PAPER (circle one):

- |   |          |                            |
|---|----------|----------------------------|
| 1 | STRONG   | (no WEAK ratings)          |
| 2 | MODERATE | (one WEAK rating)          |
| 3 | WEAK     | (two or more WEAK ratings) |

With both reviewers discussing the ratings:

Is there a discrepancy between the two reviewers with respect to the component (A-F) ratings?

No      Yes

If yes, indicate the reason for the discrepancy

- |   |   |
|---|---|
| 1 | Oversight                                 |
| 2 | Differences in interpretation of criteria |
| 3 | Differences in interpretation of study    |

### Final decision of both reviewers (circle one):

- |   |          |
|---|----------|
| 1 | STRONG   |
| 2 | MODERATE |
| 3 | WEAK     |

## Appendix D: NICE (2006) Levels of Evidence

Type and quality of evidence	
1 <sup>++</sup>	High quality meta-analyses, systematic reviews of RCTs, or RCTs (including cluster RCTs) with a very low risk of bias
1 <sup>+</sup>	Well conducted meta-analyses, systematic reviews of RCTs, or RCTs (including cluster RCTs) with a low risk of bias
1 <sup>-</sup>	Meta-analyses, systematic reviews of RCTs, or RCTs (including cluster RCTs) with a high risk of bias
2 <sup>++</sup>	High quality systematic reviews of these types of studies, or individual, non-RCTs, case-control studies, cohort studies, CBA studies, ITS, and correlation studies with a very low risk of confounding, bias or chance and a high probability that the relationship is causal
2 <sup>+</sup>	Well conducted non-RCTs, case-control studies, cohort studies, CBA studies, ITS and correlation studies with a low risk of confounding, bias or chance and a moderate probability that the relationship is causal
2 <sup>-</sup>	Non-RCTs, case-control studies, cohort studies, CBA studies, ITS and correlation studies with a high risk – or chance – of confounding bias, and a significant risk that the relationship is not causal
3	Non-analytic studies (for example, case reports, case series)
4	Expert opinion, formal consensus
NB: for policy interventions, then CBA can be awarded level 1 evidence.	

**NICE (2006).** *Methods for Development of Public Health Guidance.* London, National Institute for Health and Clinical Excellence

Appendix E: Author Instructions for the  
*British Journal of Clinical Psychology*

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## PARTICIPANT INFORMATION SHEET



### **Parents' experiences of being in a Solihull Approach parenting group**

*Research team:* Dr Lydia Vella, Dr Gary Law, Dr Rebecca Johnson, Ms Sallyann Sutton, and Ms Georgina Atkins

My name is Lydia and I am Trainee Psychologist at the University of Birmingham. As part of my training, I am carrying out some research to find out more about what it is like to be in the Understanding Your Child's Behaviour (Solihull Approach Parenting) group.

We would like to invite you to take part in our research. Before you decide, we would like you to understand why the research is being done and what it would involve for you. One of our team will go through this information sheet with you and answer any questions you have. You can also ask your group leader for more information.

Thank you for your time.



### **What is the purpose of this research?**

This study is about parents' experiences of being in the Understanding Your Child's Behaviour group. At present, we know very little about what it is like for parents to be in the group. This information will help us to understand how the group may be useful to parents, and how the group might be improved.

### **Why have I been invited to take part?**

You have been invited to take part in the study because you are attending the Understanding Your Child's Behaviour group.

### **Do I have to take part in the study?**

No, it is up to you to decide whether or not to take part.

### **What will happen to me if I agree to take part?**

We will ask you to:

- 1) Be **interviewed** by a researcher 1 to 4 weeks after you complete the group. The interview is likely to take between 30 minutes and an hour, but can be as long or as short as you like. The researcher will ask you questions about how you found the group and any effect it has had on you and your child.
- 2) Be **interviewed again** by a researcher approximately 6 months after you have finished the group. This interview is also likely to take between 30 minutes and one hour. This time, the researcher will ask you questions about what you think of the group now, and any effect it has had on you and your child.

We will interview you at a time that is convenient for you. You can choose to be interviewed in your home, a clinic, or in the community.

If you drop out of the group, we would still like to interview you. However, we will only ask you to give one interview.

We will ask your group leaders for a copy of the questionnaire you completed about your child's behaviour before you started the group and after you finished the group. If you did not complete this questionnaire, we will ask you to complete it for the research. This is just so we can have a measure of any parenting issues experienced by the group as a whole, which will help us to understand the findings. The questionnaire takes less than 10 minutes to complete.

### **Expenses and payments**

We will pay you back any travel costs if you choose to be interviewed outside your home.

To thank you for your time, you will receive a £10 high-street shopping voucher for each interview.

### **What are the possible disadvantages or risks of taking part?**

It is unlikely that taking part in this research will cause you any problems. If you find talking about your experiences of parenting and being in the group upsetting, you can talk to the researcher about this. You can also talk to your group leader if you feel you need further support.

### **What are the possible benefits of taking part?**

The research is unlikely to directly benefit you as the findings are intended to inform the group in the future. We hope, however, that you will enjoy talking about your experiences and contributing to this research.

### **What will happen after I have been interviewed?**

We will contact you when your interview has been typed up. We will ask whether you would like to see your interview and highlight any sections that you do not wish to be included in the final report. You will have two weeks to do this. All information included in the final report will be completely anonymised by replacing your name with code name.

### **Will my taking part in the study be kept confidential?**

Yes. Only the research team and group leaders will know that you have taken part in this study. The group leaders will inform the research team when you have finished the group or have dropped out so we can arrange to interview you.

If you tell us something that makes us worried about your or your child's safety, we will have to pass this information on to the local safeguarding team.

Your interviews will be typed up and anonymised by replacing your name with a code name. We will delete your name and anonymised audio recording from our records once I have finished my training (within 3 years). We will store all data securely. We will delete your typed up interview and all the other information you provided after 10 years.

### **What will happen to the results of the research study?**

The anonymised results will be written up for publication and presented to other health care workers and researchers.

The published report may include some quotations from your interview. We will take care not to publish any information that would identify you or others. We will send you a summary of the results.

### **What will happen if I don't want to carry on with the study?**

You can drop out of the study at any time up to two weeks after your interview has been typed up. You do not have to give a reason for why you want to drop out. You can still carry on with the group as this is quite separate from the research study.

### **What happens if I have any further concerns?**

It is unlikely that taking part in this research will cause you any problems. However, if you feel you have been upset by giving the interview and need some support, you can talk to the researcher and/or your group leader.

If you wish to make a complaint, you may contact Dr Gary Law (University of Birmingham) on 0121 414 7124.

If you would like to find out more about this research, or are interested in taking part please contact:

Dr Lydia Vella (Trainee Clinical Psychologist)

Tel:

Email:

Or speak to your group leader. Thank you!

## Appendix G: Consent Form

*Research site:* .....

*Study Title:* Parents' experiences of being in a Solihull Approach parenting group

*Research team:* Dr Lydia Vella, Dr Gary Law & Dr Rebecca Johnson

Please initial all boxes

1. I confirm that I have understood the Information Sheet dated ..... (version ...) for the above study. I have had the opportunity to consider the information, ask questions and have had these answered satisfactorily. ☐
2. I understand that my participation is voluntary and that I am free to withdraw at any time up to two weeks after receiving a copy of my interview transcript, without giving any reason, without my own or my loved one's medical/social care or legal rights being affected. ☐
3. I understand that the research interview will be audio-recorded. ☐
4. I understand that the data collected during this study will be looked at by the researcher and relevant other researchers at the University of Birmingham to ensure that the analysis is a fair and reasonable representation of the data. Parts of the data may also be made available to the NHS team responsible for me or my family member's care but only if any previously undisclosed issues of risk to me or my family member's safety should be disclosed. ☐
5. I understand that direct quotes from my interview may be published in any write-up of the data, but that my name will not be attributed to any such quotes and that I will not be identifiable by my comments. ☐
6. I understand that I will have a two-week period for reflection after the transcription of my interview to identify any sections that I do not wish to be published. ☐
7. I understand that the group leaders will be informed of whether I am taking part in this study. They will inform the research team when I have finished the group and provide details of the Strengths & Difficulties questionnaire that I completed in the group ☐
8. I agree to take part in the above study. ☐

.....  
Name of participant

.....  
Date

.....  
Signature

.....  
Name of researcher

.....  
Date

.....  
Signature

## Appendix H: Interview Schedules

### Interview 1 (immediately after the group)

1. Can you tell me who's who in your family? (Prompt: children, parents, ages of family members and participant)
2. Until you started the group, how would you have described what it is like to be a parent?
3. How did you come to join the group?
4. [If relevant] Was there anything that helped you to make that first step into the group?
5. What did you think the group would be like?
6. What was it like being in the group?
7. What kind of things did you do in the group?
8. How has the group made you feel about yourself and your parenting skills?

*Prompt: Can you think of any times when you did things differently with your child to how you would have done before the group?*

*Prompt: Have you found yourself thinking about things covered in the group?*

*Prompt: Have you talked to anyone else about what you covered in the group?*

9. Were there aspects of the group that were helpful?
10. Were there aspects of the group that didn't make sense or you didn't like? [anything about the group...]
11. [If relevant] What have you noticed, if anything, about your relationship with your child since being in the group? [*prompt: is this new? Do you have a sense of what has made this difference?*].
12. [If difficulties] Have your difficulties with your child changed since attending the group?
13. Were there some sessions that you did not attend? What was the reason?
14. Do you have suggestions for how the group could be improved?
15. What would you say to a parent who was thinking of dropping out after the first couple of sessions?

Interview 2 (9 – 11 months after being in the group)

1. You know that I'm interested in your experience of parenting. Since you finished the group, how have things been? [prompt: child's behaviour, relationship with child]
2. [If relevant] Last time we met, you mentioned some issues around X. How have things been in relation to X since we last met?
3. Could you tell me a little bit about whether you are still thinking about the group and using these ideas?

*Prompt: Can you think of any times when you did things differently with your child to how you would have done before the group?*

*Prompt: Have you found yourself thinking about things covered in the group?*

*Prompt: Have you talked to anyone else about what you covered in the group?*

4. I'm interested in hearing about what, if anything, has been most helpful on a day-to-day basis from the group?
5. Since you attended the group, what changes, if any, might your child have noticed in you if I were to ask them?
6. Are there aspects of the group that you have not been able to try, or have not worked? Why do you think this is?
7. How has completing the group made you feel about yourself and your parenting skills?
8. Do you have suggestions for how the group could be improved?

**Appendix I: Author Instructions for**  
*Child: Health, Care and Development*

*Removed for copyright purposes*





