Portfolio Volume 1: Major Research Project

Screening for mental health difficulties in Looked After Children referred to a specialist CAMHS team using the Strengths and Difficulties Questionnaire:

a mixed methods study.

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Abstract

Looked after children (LAC) are at high risk of developing mental health difficulties. In England, 45 percent meet the criteria for psychiatric diagnosis (Ford, Vostanis, Meltzer & Goodman, 2007), while levels of emotional and behavioural difficulties may be significantly higher (Sempik, Ward, & Darker, 2008). The UK Government requires local authorities in England to use the Strengths & Difficulties Questionnaire (SDQ) to assess and monitor looked after children's (LAC) mental health and emotional wellbeing. However, there is growing concern that this measure alone is not sufficient (Social Care Institute of Excellence, 2017).

This mixed-methods study aimed to assess the extent to which the single-informant SDQ accurately identified mental health difficulties in looked after children referred to a specialist CAMHS team. A further aim was to explore clinicians' understanding of the reasons why some looked after children's mental health difficulties are not identified by the SDQ. SDQ total difficulties scores for 144 children referred to a specialist LAC CAMHS team were compared to referral outcomes. Using a Total Difficulties Score of 17 (Youden's Index), parent-report SDQs (*n*=97) predicted CAMHS treatment recommendations with a sensitivity of .67 and a specificity of .57. For teachers (*n*=41), a score of 17 yielded a sensitivity of .79 and specificity of .71. For self-reports, a lower Total Difficulties Score of 13 (Youden's Index) achieved a sensitivity of .79 and specificity of .42. Overall, the number of children whose mental health difficulties were not identified was unacceptably high.

Interviews with clinicians working in the LAC CAMHS team (n=9) were analysed using Thematic Analysis. Four themes were identified: 'Developmental trauma &

attachment', 'A different kind of patient?', 'Seeing the "bad" but neglecting the sad', and 'The importance of clinical judgement'. Overall, the results support SCIE recommendations that the SDQ alone does not provide a sufficiently robust assessment of looked after children's mental health. Low SDQ score should not prevent access to LAC CAMHS services.

Introduction

Chapter overview

This chapter aims to provide a wider context for the study that follows. Key terms are defined. The researcher's epistemological position is introduced, and the researcher's personal relationship to the topic is explained. The population of looked after children in England is described. There follows a broad overview of the existing literature on the relationship between child maltreatment and mental health, and the mental health of looked after children. The Strengths and Difficulties Questionnaire (SDQ) is introduced, and its role in the assessment of the mental health of looked after children in England is examined.

Key terms

Looked After Children (LAC)

In the UK, the term "looked after children" (LAC) refers to children who are looked after by the state under the terms laid out under the Children's Act (1989). This includes children who are a) subject to a Care Order (placing them under the care of the local authority on an interim or permanent basis); b) subject to a Placement Order (which grants the local authority permission to seek adopters for the child); or c) accommodated by the local authority for a period of 24 hours or more (this includes children accommodated under a voluntary arrangement with the parents).

Strengths and Difficulties Questionnaire (SDQ)

The Strengths and Difficulties Questionnaire (Goodman, 1999) is a brief emotional and behavioural screening questionnaire for children and young people aged 3-17. It comes in three forms: short-form (25 items), extended (25 items + impact supplement) and follow-up (for outcome measurement). Versions are available for completion by parents (or carers),

teachers, and young people (aged 11-17). In England, the SDQ is used to screen for mental health difficulties in looked after children, at entry to care and annually (Department for Education & Department of Health, 2015).

Sensitivity and specificity.

Sensitivity and specificity are metrics commonly used to evaluate the utility of diagnostic tests and screening tools (Pintea & Moldovan, 2009). A test with a continuous value which is 100 percent accurate for detecting a condition will have a value at which all cases are identified (sensitivity = 1) without including any non-cases (specificity = 1). In the case of screening for mental health difficulties in looked after children, sensitivity describes the proportion of children with mental health difficulties who are correctly identified by the screening measure (true positives). Specificity describes the proportion of children without mental health difficulties who correctly score in the non-clinical/normal range on the screening measure (true negatives).

Receiver Operating Characteristics (ROC) Curve.

A ROC Curve is a graph that was originally used to optimize the performance of radar sets. It is commonly used to identify the optimal cut-off point to dichotomize results on diagnostic or screening tests that use a continuous scale (Streiner & Cairney, 2007). By comparing the results of the screening test to the results of a known reference standard, the graph plots true positive rates (x axis = sensitivity) against true negative rates (y axis = 1-specificity) for a range of cut-off points, so that the trade-off between sensitivity and specificity can be examined. The Area Under the ROC curve (AUROC) provides a measure of the discriminative capacity of the diagnostic or screening test (Streiner & Cairney, 2007).

Internalising and externalising difficulties.

Children's emotional and behavioural difficulties are sometimes categorised as *internalising* or *externalising*. Internalising difficulties are developed and maintained within the individual; symptoms are "overcontrolled" or secretive, making them more difficult to observe (Merrell, Anderson & Michael, 1997). Diagnoses categorised as internalising difficulties include depression, anxiety, obsessive-compulsive disorders, trauma and stressor-related disorders, and dissociative disorders (DSM-5, American Psychiatric Association, 2013). By contrast, externalising difficulties have been associated with a lack of control or emotional regulation, and are outwardly expressed through behaviour (Merrell, Anderson & Michael, 1997). Diagnoses categorised as externalising difficulties include disruptive, impulse control, and conduct disorders, and addictions (DSM-5, American Psychiatric Association, 2013).

Epistemological position

One of the most important reasons for my choice of clinical psychology as a (second) career was a desire to create positive change for people who are distressed and marginalised. It is my view that there is a moral obligation on the part of the clinical psychologist to maximise the impact of research pertaining to the needs of vulnerable client groups.

Therefore, I believe that decisions about the epistemological position of research should be informed by pragmatism, by which I mean not only considering what methods might work best for a particular research question, but also considering the desired social impact of the knowledge sought (Morgan, 2007). This study has been designed for clinicians, commissioners and policy makers working to develop mental health services for looked after children. It aims to assist them in making decisions about the use of a commonly used screening measure, the Strengths & Difficulties Questionnaire, with looked after children, by

synthesising and critiquing existing research and contributing new knowledge to the evidence base. It is my view that these aims are best achieved via a critical realist epistemology (Bhaskar, 2011). This approach shares with positivism the ontological premise that the world exists and is real, while recognising that our attempts to discover knowledge about this reality are always clouded by methodological limitations and by our own aims and values (Pilgrim 2009). By adopting a critical realist methodology, I aimed to create useful knowledge that can be generalised, while retaining the capacity to be critical of assumed knowledge, such as the criteria by which a questionnaire is deemed to be "validated", and the idea that mental health difficulties always equate to psychiatric diagnoses in children who have experienced maltreatment.

Personal relationship to the topic

I am a third-year clinical psychology trainee currently placed in a specialist CAMHS team for children who are fostered, adopted or in kinship care. Before training, I worked as an assistant psychologist in a CAMHS team working with children and families on the edge of care and looked after. In this role, I was responsible for collating and analysing outcome monitoring data, including SDQ data, and attended meetings with commissioners about outcome monitoring. Prior to this, I was an honorary research assistant on a study of outcomes for children following care proceedings, which included SDQs as a secondary outcome measure. Over the course of my clinical and research work with looked after children, my position on the SDQ has moved from initial blind faith, coupled with intense irritation with clinicians who failed to collect them, to a more sceptical position. Until commencing this project, I had not examined the literature relating to the use of the SDQ.

Context

Population of looked after children (LAC) in England.

Numbers of looked after children in England have risen steadily over the last eight years and there are now more than at any point since 1985 (Department for Education, 2017a). On 31 March 2017, there were 72,670 LAC in England; this amounts to 60 children in care per 10,000 of the population (Department for Education, 2017a). There were more boys (56%) than girls (44%). Most (62%) were aged 10 or over, while 20 percent were five to nine years old, 13 percent were one to four years, and five percent were aged under one year. Most were white British or any other white background (75%). (According to data from the most recent census, this is proportion is lower than in the general population, where 86 percent of people in England and Wales define themselves as "white" (Office for National Statistics 2011). Nine percent were of mixed ethnicity, seven percent were black or black British, four percent were Asian or Asian British, and three percent were from other ethnic groups (Department for Education, 2017a).

Over half (57%) of LAC were identified as having Special Educational Needs, most commonly due to social, emotional and mental health difficulties (Department for Education, 2017a). This is almost four times the rate in the general population, where 14.4% have Special Educational Needs (Department for Education, 2017c). In the general population, moderate learning difficulties and speech, language and communication needs occur more commonly than social, emotional and mental health difficulties.

Reasons for being Looked After.

The UK government does not routinely collect data on all of the reasons for children being looked after; however, it does report the primary reason for social services' initial decision to provide social work support to that child (Department for Education, 2017d). Consistently, the most common reason is abuse or neglect (60%) (Department for Education, 2017a). Other reasons included: family dysfunction "whose needs arise mainly out of their living with families where the parenting capacity is chronically inadequate" (16%); families being under acute stress, where as a result of a temporary crisis "parenting capacity is diminished and some of the children's needs are not being adequately met" (9%); absent parents, including unaccompanied minors and children whose parents relinquish them (7%); needs arising from the child's disability (3%); or parental illness or disability (3%) (Department for Education 2017a).

Under the Children's Act (1989), a Care Order can be granted if the child is suffering, or likely to suffer, significant harm as a result of the parenting they are receiving, or the child being beyond the parents' control. When a child is subject to a Care Order, legal responsibility for the care of the child is transferred from their birth parents to the local authority. According to the most recent data, the majority of looked after children (65%) were subject to Care Orders, and a further eight percent were subject to a Placement Order (in addition to a Care Order), which gives the local authority permission to seek adoptive parents for that child (Department for Education, 2017a). The remaining 27 percent were subject to voluntary agreements under section 20 of the Children's Act, which requires local authorities to accommodate children if they are without parents, lost or abandoned, or if the person caring for them is unable to provide them with suitable care (Department for Education, 2017a). Most (74%) were placed in foster care; others were placed for adoption (8%), with birth parents (7%), in the community (6%), in secure units, children's homes and semi-

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¹ Definition from Department for Education (2017d), p.47

² Definition from Department for Education (2017d), p.47

independent living accommodation (12%), residential schools (1%), and other residential placements (3%). While most children (68%) had only one placement in the preceding year, a significant minority had two (21%) or three or more (10%) placements in that time (Department for Education, 2017a).

Childhood maltreatment and physical and mental health.

"What happens in childhood—like a child's footprints in wet cement—commonly lasts throughout life. Time does not heal; time conceals."

Felitti (2009), pp.131

It is now well established that abuse, neglect and other traumatic experiences in childhood are linked to an increased risk of poor physical and mental health outcomes across the lifespan (Felitti et al., 1998). In a comprehensive systematic review of the literature, Gilbert et al. (2009) concluded that childhood maltreatment has "long lasting effects on mental health, drug and alcohol misuse (especially in girls), risky sexual behaviour, obesity, and criminal behaviour, which persist into adulthood" (p.68). The authors identified strong evidence that maltreatment in childhood increases the risk of behavioural difficulties in childhood and later mental health difficulties including depression, PTSD, attempted suicide, and misuse of drugs and alcohol. For example, adjusted odds ratios for depression in adolescence and adulthood following childhood maltreatment ranged from 1.3 to 2.4 (Gilbert et al. 2009). In a more recent meta-analysis, Norman et al. (2012) found that the increased risk of developing a depressive disorder ranged from odds ratios of 1.54 to 3.06, depending on the type of abuse; for anxiety, the increased risk ranged from OR 1.51 (physical abuse) to 3.21 (emotional abuse). Physical abuse and neglect were also associated with a two-fold increase in behavioural and conduct disorders in childhood. Both meta-analyses reported evidence for a dose effect, with exposure to more severe and multiple episodes of

maltreatment cumulatively increasing the risk of later psychosocial difficulties. Subsequent prospective studies have found similar results (e.g. Vachon *et al.* 2015).

Complex trauma.

The term complex trauma has been used to describe exposure to chronic interpersonal trauma, such as abuse and neglect, in early childhood, and the immediate and long-term impact of this trauma in the developing child. Based on a comprehensive review of the literature, Cook *et al.* (2005) identified seven primary domains of impairment commonly observed in children exposed to complex trauma. These are attachment, biology, affect regulation, dissociation, behavioural control, cognition, and self-concept, and are described in detail in *Table 1*.

Table 1: Domains of Impairment in Children Exposed to Complex Trauma

I. Attachment	IV. Dissociation	VI. Cognition
Problems with boundaries	Distinct alterations in states of	Difficulties in attention regulation and executive
Distrust and suspiciousness	consciousness	functioning
Social isolation	Amnesia	Lack of sustained curiosity
Interpersonal difficulties	Depersonalization and derealization	Problems with processing novel information
Difficulty attuning to other people's	Two or more distinct states of	Problems focusing on and completing tasks
emotional states	consciousness	Problems with object constancy
Difficulty with perspective taking	Impaired memory for state-based events	Difficulty planning and anticipating
		Problems understanding responsibility
		Learning difficulties
		Problems with language development
		Problems with orientation in time and space
II. Biology	V. Behavioral control	VII. Self-concept
Sensorimotor developmental problems	Poor modulation of impulses	Lack of a continuous, predictable sense of self
Analgesia	Self-destructive behavior Aggression	Poor sense of separateness
Problems with coordination, balance,	toward others Pathological self-soothing	Disturbances of body image
body tone	behaviors	Low self-esteem Shame and guilt
Somatization	Sleep disturbances	
Increased medical problems across a	Eating disorders	
wide span (eg, pelvic pain, asthma, skin	Substance abuse	
problems, autoimmune disorders,	Excessive compliance	
pseudoseizures)	Oppositional behavior	
	Difficulty understanding and complying	
	with rules	
	Reenactment of trauma in behavior or	
	play (eg, sexual, aggressive)	

III. Affect regulation

Difficulty with emotional self-regulation

Difficulty labeling and expressing

feelings

Problems knowing and describing

internal states

Difficulty communicating wishes and

needs

Latent vulnerability.

Arguably, many "symptoms of psychopathology" commonly identified in children exposed to early maltreatment can be viewed as sensible adaptations designed to optimise their chances of survival in a hostile environment. Unfortunately, these enduring adaptations are less suited to other, safer environments (such as classrooms, playgrounds or alternative families), and mean that even when they are no longer in danger, they are more vulnerable to everyday stresses (McCrory & Viding, 2015). This theory of latent vulnerability is supported by evidence of an association between child maltreatment and changes to key neurocognitive systems including the processing of threat and rewards, emotional regulation and executive function identified in a recent systematic review of neuroimaging studies (McCrory *et al.*, 2017). However, the authors stress that research in this area has been limited by a) a focus on presenting psychiatric disorders, rather than their mechanisms that lead to their development and b) challenges in defining and measuring "a complex and multifaceted environmental risk factor such as maltreatment" (pp.339).

It is important to note that some children who experience maltreatment demonstrate positive adaptive functioning (Cicchetti, 2013). The dynamic developmental process that leads to positive adaptation despite exposure to significant trauma has been described as "resilience". Walsh, Dawson and Mattingley (2010) estimate the prevalence of resilient

functioning in individuals exposure to maltreatment in childhood at between 10 and 25 percent. The pathways to resilient functioning remain poorly understood (Cicchetti, 2013).

Childhood trauma and psychiatric diagnosis.

A psychiatric diagnosis is "a medical term used to describe patterns of experiences or behaviours that may be causing distress and/or be seen as difficult to understand" (BPS 2016, p.2). There are two separate classification systems for psychiatric diagnoses, the Diagnostic and Statistical Manual of Mental Disorders, 5th edition (DSM-5) (American Psychiatric Association, 2013), produced by the American Psychiatric Association, and the International Classification of Diseases, Clinical Modification (ICD-10-CM), produced by the World Health Organisation (World Health Organisation, 1992). Despite the well-established links between childhood maltreatment and mental health difficulties, recent research indicates that existing classification systems do not adequately describe the emotional, behavioural and neurobiological effects of complex trauma on children's developmental and functioning, particularly when maltreatment occurs in early childhood. At the time of writing, the only currently available psychiatric diagnosis relating to trauma symptoms is that of posttraumatic stress disorder (PTSD), which was created in response to the symptoms of trauma found in combat veterans (Herman, 1992). This diagnosis requires exposure to a lifethreatening event, and symptoms including intrusive recurring thoughts or images related to the trauma, avoidance of reminders of the trauma, hyperarousal and diminished emotional responsiveness (ICD-10). However, leading trauma researchers have argued the PTSD diagnosis is insufficient to describe the developmental effects of prolonged exposure to maltreatment and other interpersonal traumas (such as family violence and war) in childhood (Herman, 1992; van der Kolk, 2005a; Cook et al., 2005).

In 2009, van der Kolk, Pynoos and colleagues submitted a proposal for the inclusion of developmental trauma disorder in DSM-V, arguing that "it has become evident that the current diagnostic classification system is inadequate for the tens of thousands of traumatized children receiving psychiatric care for trauma-related difficulties." (p3. See *Appendix 1* for proposed diagnostic criteria.) They supported the proposal with evidence from several large, prospective US studies, which together had data from more that 20,000 trauma-affected children. The proposal was not accepted. In the absence of an appropriate trauma-related diagnosis, evidence suggests that traumatised children may receive multiple "co-morbid" diagnoses that do not identify trauma aetiology, or alternatively may not receive any diagnoses at all, despite clinically significant symptoms, leaving them at risk of both under-or over-treatment (D'Andrea *et al.*, 2012; Greeson *et al.*, 2011; Richardson *et al.*, 2008; van der Kolk, 2005). A new diagnosis of Complex PTSD, which includes the existing PTSD symptom clusters as well as affective dysregulation, negative self-concept and disturbances in relationships, is included in the upcoming revision to the World Health Organization's International Classification of Diseases (ICD-11) (Karatzias et al., 2017).

Experiences of maltreatment in the looked after population.

Given the well-established links between childhood trauma and mental health (reviewed above), any consideration of the mental health of looked after children should also consider the prevalence of trauma in the population. As stated previously, UK government statistics on reasons for social services involvement with families indicate the majority of children who are looked after are likely to have experienced abuse and neglect. However, the nature and frequency of maltreatment and other adverse events are not routinely recorded, and it is therefore difficult to accurately estimate the level of trauma within this population.

In a literature review, Oswald *et al.* (2010) found that only 12 of 32 international articles addressing the mental health and development of children in foster care reported information about children's experience of maltreatment, and within these studies the reported prevalence varied considerably. The most commonly reported forms of maltreatment were neglect (18–78%), physical abuse (6–48%) and sexual abuse (4–35%). In the only UK-based study listed in that review, Minnis *et al.* (2006) surveyed 121 foster families with 182 foster children in Scotland. They found that nearly all (93 %) of the children had suffered some form of abuse or neglect in the past. Three quarters had experienced emotional abuse (77%) and neglect (75%), while 39% had been physically abused and 28 % sexually abused.

In the USA, looked after children's experiences of maltreatment and other traumatic events have been investigated more systematically and on a larger scale. Griffin *et al.* (2011) used data from the health assessments of 14,103 children aged 0-17 entering the care of the Illinois Department of Children and Family Services (DCFS) to explore exposure to traumatic events. They found more than 95% of children entering child custody were suspected of having experienced a potentially traumatic event; 75% were known to have experienced at least one significant event, and 53% were known to have experienced two or more. The most common events were neglect (46%), family violence (29%), traumatic grief/separation (25%), physical abuse (21%) and emotional abuse (13%). Nearly 9% had been sexually abused. In a later paper, Kisiel *et al.* (2014) explored exposure to interpersonal trauma within the caregiving system including violent trauma (physical or sexual abuse, or family violence) and non-violent attachment-based trauma (emotional abuse and severe neglect). Using these criteria, half of the sample were affected: 29.2% had experienced violent interpersonal trauma only, 7.5% non-violent attachment-based trauma only, and

13.4% had experienced both. Salazar *et al.* (2013) assessed lifetime trauma exposure in older adolescents in foster care using the composite international diagnostic interview. They found that the majority (80%) of respondents retrospectively reported that they had experienced at least one trauma in their lifetime, and 65% had experienced two or more traumas. The most commonly reported traumas were witnessing someone being injured or killed (40.4%); being physically attacked or assaulted (30.3%); being molested (27.2%); and being threatened with a weapon, kidnapped, or held captive (26.5%).

The mental health of looked after children.

Although research interest in the mental health of looked after children has increased in recent years, the evidence base remains limited. Richardson and Lelliott (2003) identified a number of barriers to research with looked after children, including frequent placement moves, changes in social workers, inconsistent school attendance, reliance on social services' data collection systems, and mistrust from the young people themselves. Midgley *et al.* (2017) summarised further barriers identified by researchers including: the breadth and diversity of the LAC population; the complexity of their presenting difficulties; a lack of appropriate measures for this population; challenges in convincing social workers to prioritise research; and operational difficulties in negotiating access and gaining consent for participation for this vulnerable client group.

Evidence from the most comprehensive epidemiological study of looked after children in the Britain is now more than 15 years old. The study design mirrors that of a survey of private households in order to facilitate comparison. It defines mental health in terms of diagnoses of childhood psychiatric disorders, and does not include information about trauma histories. Ford *et al.* (2007) combined data from 1543 children aged 5-17, taken from

three Office of National Statistics surveys of children in England, Scotland and Wales (Meltzer et al, 2000, 2003, 2004a,b). Lay interviewers administered the Development and Wellbeing Assessment (DAWBA; Goodman et al., 2000) to the children's parents or carers, and to the children themselves if they were aged 11 or over, while the children's teachers were also invited to complete a shorter written version. A team of clinicians reviewed the data and allocated diagnoses, according to ICD-10 criteria. Overall, 46.4% of looked after children were found to meet the criteria for at least one psychiatric diagnosis. The most common difficulties for LAC were conduct disorders (37.7%), followed by emotional disorders (12.4%) and hyperkinetic disorders (8.4%). The prevalence of mental health diagnoses was significantly higher than in comparison samples of children from disadvantaged households (14.6%) and non-disadvantaged households (8.5%), adjusted for age and gender, OR=4.92 (95% CI= 4.13-5.85). Higher rates of neurodevelopmental disorders and learning difficulties were also identified. It should be noted that the authors acknowledge that despite the large sample, respondents may not be wholly representative of the population due to between a third and a half of the original random samples being deemed ineligible.

Ford *et al.* (2007) did not address the mental health of preschool children, who account for nearly one in five looked after children in the UK (Department for Education, 2017). Hillen and Gafson (2015) assessed the mental health of 43 (of a population of 77, of whom 58 eligible) preschool children in one English local authority. Like Ford et al. (2007), they defined mental health in terms of psychiatric disorder. Their comprehensive assessments comprised the Preschool Age Psychiatric Assessment (PAPA) interview with the child's carer (Egger, Ascher, & Angold, 1999), the Ages & Stages Questionnaire (Squires, Bricker & Potter, 1997), the Mullen Scales of Early Learning (Mullen, 1995) and clinical

observation; ICD-10 diagnoses were assigned on the basis of this data. The majority (60.5%) of participants were found to have at least one mental health disorder, and a quarter (25.6%) had a developmental disorder. The most common difficulties were behavioural disorders, which affected 18 (41.9%) children; 14 (32.6%) were found to have an attachment disorder, 10 (23%) had an emotional disorder, and 6 (14%) had an adaptive disorder. When mental health and developmental disorders were considered together, 30 (69.8%) children fulfilled criteria for at least one diagnosis, and 18 (41.9%) had two or more comorbid conditions.

The studies listed above investigated the prevalence of psychiatric disorders in the looked after population. However, as with other traumatised populations, it has been argued that the diagnostic system inadequately captures the psychopathology found in the looked after population, many of whom have been exposed to trauma in early childhood (DeJong, 2010; Tarren-Sweeney, 2013). Looked after children may be classified as sub-threshold on a number of different diagnoses, so that their impairment is far greater than would be indicated by the diagnostic profile (DeJong, 2010).

Sempik, Ward and Darker (2008) eschewed diagnostic classification, choosing to investigate emotional and behavioural difficulties rather than psychiatric disorders. Psychologists reviewed the care files of 453 children aged 0-16 who were entering the care of six local authorities in England, and who remained in care for at least one year. They found that 72% of children had evidence of emotional and behavioural problems (not necessarily clinical diagnoses) recorded by social workers in their case files, with 50.2% showing indications of conduct problems and 22.9% emotional problems. The authors argued that the absence of a psychiatric diagnosis does not necessarily mean the absence of a problem.

Interestingly, Meltzer (2003) reported that 43% of the children who were clinically assessed

as not having any mental disorder were viewed by their carers as having emotional, behavioural or hyperactivity problems. As an example of how different definitions of mental health problems impacts on prevalence rates, comparable levels of bedwetting in looked after children over five were found by Sempik (2008, 17.9%) and Meltzer (2003, 16%), however the former classified this as a potential mental health problem, whereas the latter classified this as a physical problem.

In New Zealand, Tarren-Sweeney and Hazell (2006) drew on clinical assessment reports for 110 children looked after and maltreated children, combined with a survey of specialist clinicians, a literature review and input from foster carers, to develop the Assessment Checklist measures, which comprise the Assessment Checklist for Children (ACC) and the Assessment Checklist for Adolescents (ACA). These were designed as an alternative to existing scales, which, the authors argued, did not adequately measure the range of problems observed in this population. In a sample of 347 looked after children, ACC scores suggested that around half had clinically meaningful attachment-related interpersonal behaviour difficulties (Tarren-Sweeney & Hazel 2006). Up to a third present with problematic sexual behaviour (Tarren-Sweeney, 2008). Other difficulties identified in this sample include borderline or clinical eating problems (24%), clinically significant self-injury (7%) and abnormal responses to pain (5%). Proportions of children scoring in the clinical range were higher for boys (46.6%) than girls (42.7%), and there were gender differences in patterns of difficulties, with boys exhibiting more non-reciprocal attachment behaviours and abnormal pain responses, while girls scored more highly for pseudo-mature, precocious presentations and age-inappropriate sexual behaviour. Based on scores from the ACC and the Child Behaviour Checklist (CBCL), Tarren-Sweeney (2013) concluded that 35% of looked after children had relatively non-complex clinical difficulties (i.e. discrete mental

disorders or plausible co-morbidity), while another 20 % displayed complex attachment- and trauma-related symptomatology that is not adequately conceptualized within DSM-IV-TR or ICD-10, or the proposed DSM-V and ICD-11 diagnostic classifications.

Monitoring the mental health of looked after children in England.

In England, statutory guidance states that local authorities are required to ensure that the physical health of looked after children is monitored via a health assessment, conducted by a doctor or suitably qualified health professional at entry to care and then annually, or twice a year for children aged under five (Department for Education & Department for Health, 2015). Of the 49,750 children looked after continuously for 12 months at 31 March 2017, 89 percent were up to date with their annual health checks (ONS 2017b). Despite strong evidence of increased risk of mental health difficulties in this population and a legal duty for the NHS to work towards delivering 'parity of esteem' between physical and mental health (Health and Social Care Act 2012), the mental health of looked after children is not routinely assessed by clinicians at entry to care or annually. Instead, since 2008, local councils have been required to collect a version of a brief screening measure called the Strengths and Difficulties Questionnaire (SDQ; Goodman, 1997). This should be completed by the child's main carer, annually, for all children aged 4-16 who have been looked after for at least one year (Department for Education & Department for Health, 2015).

The Strengths and Difficulties Questionnaire is a short behavioural screening questionnaire for children and young people aged 4-17. It comprises 25 items, divided between five scales: emotional symptoms, conduct problems, hyperactivity/inattention, peer relationships and prosocial behaviour. Informants are asked to rate the items as "not true", "somewhat true" or "certainly true" for the child over the last six months. Items from the first

four scales (but not prosocial behaviour) are added together to give a Total Difficulties Score. Some versions also contain an "impact supplement" which asks for the respondent's view on whether the child has a problem and if so, how it impacts on their life and that of the family. Different versions are available for parents (SDQ-P), teachers (SDQ-T) and a self-report version for young people aged 11-17 (SDQ-S). Somewhat confusingly, there are also different ways to score the SDQ; using an algorithm (which can be accessed online for a small fee) or by hand (using guidelines that can be downloaded from sdqinfo.org). Both involve slightly different cut-off scores to indicate probable or possible risk of disorder (as per the algorithm) or slightly raised, high or very high risk of disorder (as per hand scoring guidelines). If the algorithm is used, responses from multiple informants can be combined.

The parent report version (SDQ-P), completed by the child's main carer, is the version commonly used in the screening of LAC mental health. For this version, according to the most recent hand-scoring guidelines, a Total Difficulties Score of 13 or less is considered 'close to average', 14-16 is classified as 'slightly raised', scores of 17-19 are 'high' and scores of 20+ are 'very high' (Youth in Mind, 2016). Confusingly, different terms for these categories have been and are still used. Government statistics refer to the 'close to average' range as 'normal', 'slightly raised' as 'borderline', and combine 'high' and 'very high' in a category called 'cause for concern'.

In the year to March 2017, SDQ data had been collected for 76% of looked after children aged 5-16 who had been looked after for a period of one year or more (Department for Education, 2017b). The ONS reports that: "Almost half (49%) of children looked after continuously for at least 12 months had 'normal' emotional and behavioural health, 12% had 'borderline' scores and 38% had scores which were a *cause for concern*" (p14). A larger

proportion of boys (41%) than girls (34%) had SDQ scores in the 'cause for concern' range, while similar numbers of boys (13%) and girls (12%) had scores in the 'borderline' range.

(The report does not speculate on reasons for the gender difference.)

Statutory guidelines recommend that if a child's Total Difficulties Score is in the borderline or cause for concern range, the carer's SDQ scores should then be 'triangulated' with those of his or her teacher and, for 11-16 year olds, the young person themselves (Department for Education & Department for Health, 2015). The guidance states that: "Child and Adolescent Mental Health Services (CAMHS) play a crucial role in assessing and meeting any needs identified as part of the SDQ screening process" (Department for Education & Department for Health, 2015, p.19). It recommends that the SDQ should be used to inform decisions about referrals for further specialist assessment, and should be included "as evidence" in referrals to CAMHS (p.31). The same guidance also recommends that Local Authorities and CCGs should use local SDQ data to "quantify the needs of the local looked after children population" as they develop their Joint Health and Wellbeing Strategies (p.10). The Total Difficulties Score obtained from the SDQ must be reported to the Department for Education annually because it is "the outcome measure used for tracking the emotional and behavioural difficulties of looked-after children at a national level" (Department of Health & Department for Education 2016, 2015, p.30, emphasis added).

In 2016, the House of Commons Education Committee recommended that all children entering the care system should have an SDQ *and* a full mental health assessment by a qualified mental health professional (House of Commons Education Committee, 2016). This recommendation was not accepted by the Government; their response stated that existing (physical) health assessments should identify any children needing a more in-depth mental

health assessment, "for example by indicating a high score on the Strengths and Difficulties Questionnaire (SDQ) which should always be completed for looked after children" (Department of Health & Department for Education, 2016, p.4). However, they agreed that the issue should be explored further by the Expert Working Group for Looked After Children (Department of Health & Department for Education, 2016). In November 2017, the Expert Working Group reported that feedback from young people, stakeholders and its own members was that "the Strengths & Difficulties Questionnaire (SDQ) by itself is not an effective way of measuring the mental health and emotional wellbeing of young people" (SCIE 2017, p.7). Members reportedly advised that the SDQ was "unable to detect post-traumatic stress disorder (PTSD), attachment disorganisation and developmental issues such as autism spectrum condition" (SCIE 2017, p.28). The Expert Working Group recommended that the SDQ should only be used in conjunction with other assessment methods. Despite this, no changes to the statutory guidance on the assessment of looked after children's mental health needs have yet been implemented.

It is important to note that identifying mental health difficulties in children does not necessarily lead to effective treatment of those difficulties, and in some cases could even result in adverse outcomes. In the US, high rates of ADHD diagnosis and pharmacological treatment have raised questions about overdiagnosis and overmedication in this population (Merten, Cwik, Margraf & Schneider, 2017). Conversely, in the UK, a recent study concluded that an over-emphasis on attachment difficulties in looked after children led to under-diagnosing of more common difficulties such as ADHD and 'Conduct Disorders', for which evidence-based treatments are available (Woolgar & Baldock, 2015). NICE guidelines state that "there is a lack of robust, adequately controlled, studies completed to a high standard [and] the UK evidence base does not serve the needs of looked after children and

young people as well as it might" (p.86). Silver, Golding & Roberts (2015) warn that this lack of evidence base "can often lead to a wide range of un-evidenced, poor quality and even harmful interventions being promoted by those with inadequate skills and training" (p.123). However, the authors identify a range of promising interventions being developed specifically for children who are looked after and/or experienced developmental trauma (e.g. Blaustein & Kinniburgh, 2007), and note that existing evidence-based treatments, such as eye movement desensitisation reprocessing (EMDR), can be adapted for complex PTSD (Korn, 2009).

Background to the Strengths and Difficulties Questionnaire.

The Strengths and Difficulties Questionnaire (SDQ; Goodman 1994, 1997) was developed as an alternative to the Rutter Behaviour Scales (Rutter et al., 1967), which were used by researchers to identify emotional and behavioural difficulties in children but were reportedly unpopular with parents and teachers due to their focus on undesirable traits.

Goodman (1994) added additional items addressing children's strengths to the original items, and later modified and amalgamated items to create a one-page questionnaire of 25 items measuring five subscales: conduct problems, emotional symptoms, hyperactivity, peer problems, and prosocial behaviour (Goodman 1997). Closely similar versions of the questionnaire were produced for parents, teachers, and – for those aged 11-16 – the young people themselves. Additional questions about the impact of children's difficulties on different aspects of their lives, and the burden to the family, were later added (Goodman, 1999).

Goodman *et al.* (2000) assessed the effectiveness of the SDQ as a screening tool for mental health difficulties in community samples, using data from a large ONS study of

British children from private households. Full SDQ data from 7984 children were compared to psychiatric diagnoses assessed via the Development and Wellbeing Assessment (DAWBA; Goodman, Ford, Richards, Gatward & Meltzer, 2000); although the DAWBA usually includes the SDQ, the authors report that raters were blind to SDQ scores in this instance. When data from multiple informants – parent, teacher and, if aged 11 or older, self-reports – were combined, the SDQ algorithm predicted that 70.1 percent of the children in the sample were 'unlikely' to meet the criteria for a psychiatric diagnosis. The presence of a psychiatric 'disorder' was 'possible' for 19.4 percent and 'probable' for the remaining 10.5 percent. A greater proportion of boys (13.4%) than girls (7.7%) were deemed at 'probable' risk of diagnosis. When SDQ scores were compared to DAWBA results, individuals at 'probable' risk of psychiatric diagnosis were identified with a sensitivity of 63.3 percent and a specificity of 94.6 percent. Of those children whose psychiatric difficulties were not identified as "probable", 65% were rated as possible. The authors conclude that the "predictive algorithm based on multi-informant SDQs is able to detect children with psychiatric disorders in the community with reasonable efficiency" (p.537), although their data shows that more than a third of cases would be missed. Furthermore, it is important to note that sensitivity was considerably reduced when single-informant questionnaires were used, so that the majority of mental health difficulties would be missed. Parent-report SDQs alone had a sensitivity of 29.8% for 5-10 year olds and 33.7% for 11-16s, meaning that more than 2 in 3 children's difficulties would be missed. For teacher-report SDQs sensitivity was only slightly better: 34.5% for 5-10s and 38.7% for 11-16s. Specificity was not reported for single-informant questionnaires.

The SDQ is freely available (<u>www.sdqinfo.org</u>), although payment has recently been introduced for the use of the online scoring algorithm (<u>www.sdqscore.org</u>). In a recent

systematic review of the accuracy of screening measures in paediatric primary care, Lavigne *et al.* (2016) included 19 parent-report SDQ studies from around the world. These studies used different versions of the SDQ-P, and – finding the established Total Difficulties Score (TDS) cut-off unacceptable – adopted different, un-replicated (and sometimes unreported) cut-offs, ranging from 10-19. For Goodman's (2001) recommended cut-off score of \geq =17, Lavigne et al. (2016) found that the weighted mean for sensitivity (n = 6) was .53 (SD = .13) and the weighted mean for specificity (n = 6) was .91 (SD = .39). Across all cut-offs and criteria, the mean sensitivity was .65, and the specificity was .76. However, Lavigne *et al.* (2016) reported that the different cut-off scores used by researchers made it difficult to draw conclusions about its utility.

Validation of the SDQ with looked after children.

The use of the SDQ in screening for mental health difficulties in looked after children was assessed using data from the ONS study reported by Ford et al., 2007 (described above). Goodman *et al.* (2004) examined data for 539 looked after children for whom full sets of SDQ questionnaires (i.e. parent/carer and teacher versions for 5-10 year olds, and parent/carer, teacher and self-report versions for 11-17s) were available. The authors found that when responses from multiple informants were combined, the SDQ multi-informant algorithm identified children and young people with a psychiatric diagnosis (as identified by the DAWBA) with a sensitivity of .85 and a specificity of .80. The algorithm classifies children's risk of psychiatric disorder as at "probable", "possible" or "unlikely". The authors reported that 79% of "false negatives" were classified in the "possible" range for psychiatric disorder. The authors concluded that: "Using *multi-informant* SDQs as a regular screening measure for looked-after children could potentially increase the detection of child psychiatric disorders, thereby improving access to effective treatments" [emphasis added].

Importantly, as in the community sample, Goodman *et al.* (2004) found that sensitivity was reduced considerably when single-informant questionnaires were used. Parent-report SDQs (completed by main carers) identified children with psychiatric diagnoses with a sensitivity of .51 for 5-10 year olds and .60 for 11-15s; for teachers, the sensitivity was .60 for 5-10s and .59 for 11-15s; and for self-report questionnaires completed by 11-15s, the sensitivity was just .16. The specificity for single-report questionnaires was not reported, and the authors did not report the proportion of false negatives that fell into the "possible" category, nor did they report the measure's sensitivity if the borderline cut-off (rather than the "cause for concern" cut-off) was used instead.

Goodman and Goodman (2012) cite Goodman *et al.* 's (2004) study as evidence that the single, carer-report SDQ is a "good" and "valid" screening measure for looked after children. (The only other study cited by Goodman & Goodman, 2012, in support of this claim, is a study by Marquis & Flynn, 2009, which describes SDQ scores for a sample of Canadian LAC but does not compare these to any reference standard, and therefore cannot inform an assessment of its validity.) However, Goodman *et al.*'s (2004) study suggests that more than two in five looked after children meeting the criteria for psychiatric diagnosis will be missed if the probable cut-off is used, and it does not report how many false positives will be identified in the process. It does not give any indication of how using the lower *possible/borderline* cut-off will impact on the sensitivity and specificity of the SDQ.

The apparent lack of evidence for the validity of the single-report SDQ as a screening measure for mental health difficulties in looked after children is extremely concerning, given that it is currently the only method of routinely assessing the mental health of looked after

children in England. As outlined above, the majority of these children are likely to have been exposed to interpersonal trauma in early childhood, and there is growing consensus that existing psychiatric diagnoses do not adequately describe the impact of complex trauma, particularly when this occurs in early development. Goodman et al. (2004) have assessed the performance of the SDQ as a screening tool for mental health difficulties in looked after children against a diagnostic interview schedule, so we can only draw conclusions about its ability to identify those children who meet the criteria for psychiatric diagnoses; the ability of the SDQ to identify difficulties that fall outside of diagnostic criteria is unknown. In terms of identifying children who meet the criteria for diagnosis, Goodman et al.'s (2004) data indicates that more than 2 in 5 children's difficulties will be missed if the respondent is a carer or teacher, and more than 4 in 5 if self-report questionnaires are used. Statutory guidelines only require SDQs to be collected from multiple informants if the initial SDQ is scored in the borderline or clinical range (Department of Health & Department for Education, 2016), so the current system is only as reliable as the single-report SDQ. Therefore, in order to consider whether subsequent studies have reported evidence that support the use of singleinformant versions of the SDQ with looked after children, a systematic review was undertaken.

Systematic review

A systematic review of the literature was undertaken to investigate the utility of the SDQ as a screening tool for mental health difficulties in looked after children. A search of four key databases was undertaken: these were PsycINFO, Scopus, CINAHL and PubMed. Table 2 (below) shows the search terms used. Further articles were subsequently hand searched using a combination of Google Scholar, the database of articles on the sdqinfo.org website and the reference lists of full-text articles. To keep the search as comprehensive as possible, and because a relatively low volume of articles was anticipated due to the difficulties in research with this population (outlined above), the search did not specify screening studies. The aim was to try to identify relevant data that might give some indication of the accuracy of the SDQ in identifying mental health difficulties in looked after children even if this may not have been the main subject of the study.

Table 2: Systematic review search terms

Terms related to measure		Terms related to looked after children
"Strengths and Difficulties Questionnaire"	AND	"looked after child*" OR "foster care" OR "foster
OR "Strengths & Difficulties Questionnaire"		child*" OR "public care" OR "local authority care" OR
OR SDQ		"out of home care" OR "out-of-home care".

Search results were combined and duplicates removed. Studies were screened according to the inclusion criteria listed below in Table 3. Initially, titles were screened, then abstracts were reviewed, before full papers were sourced and reviewed for the remaining titles.

Table 3: systematic review inclusion and exclusion criteria

Inclusion criteria	Exclusion criteria
1. Population: looked after children (see definition	Children who are not looked after, including children at
above).	risk of care, and adopted children. Young adults leaving
	care. Carers or services rather than children themselves.

2. Study type: involves primary data collection.

- 3. *Methodology:* quantitative or mixed methods including quantitative data with sample size >10.
- 4. *Measures:* Includes any complete version of the Strengths & Difficulties Questionnaire. Parent, teacher or self-report version, single or multiple informants
- 5. *Measures:* Includes at least one other measure of mental health (e.g. other screening tools, clinical assessments).
- 6. Data: reports data that relates to the accuracy of the SDQ in identifying mental health difficulties in looked after children. E.g. reports sensitivity or specificity, or data that enables this to be calculated.

7. Language: English language.

Secondary analysis e.g. Literature review, describes a model

Qualitative studies. Case studies. Very small pilot quantitative studies.

Does not use partial questionnaire (e.g. a subscale). Does not use SDQ.

Does not include any other measure of mental health.

Data does not shed light on accuracy of SDQ.

No English language version.

Summary of findings from the literature

Thirteen studies were included in the literature review. All of the studies had a quantitative design. Six of the studies were conducted in the UK; the remainder were from Western industrialised countries including Australia, New Zealand, USA, Norway, Belgium and Holland. The studies are summarised in *Appendix 2*. For the purposes of this review, studies were divided into two parts. In the first part, studies that evaluate the SDQ as a screening measure by comparing its performance to an appropriate reference standard (as per CASP guidelines on diagnostic tests) are described. In the second part, the remaining studies are considered; these did not compare the SDQ to a reference standard but may offer some insight into how the SDQ functions with the looked after population.

Studies comparing the SDQ to a reference standard.

Only five studies compared SDQ scores to a reference standard; a sixth (Newlove-Delgado *et al.*, 2012) described a promising pilot for an SDQ screening programme for looked after children in London, but was excluded due to the small number of children for whom both SDQ and DAWBA scores were available (n=9). The five studies included here

reported sensitivity and specificity, or presented data in a manner that enabled this to be calculated. This data is presented in *Table 4* below.

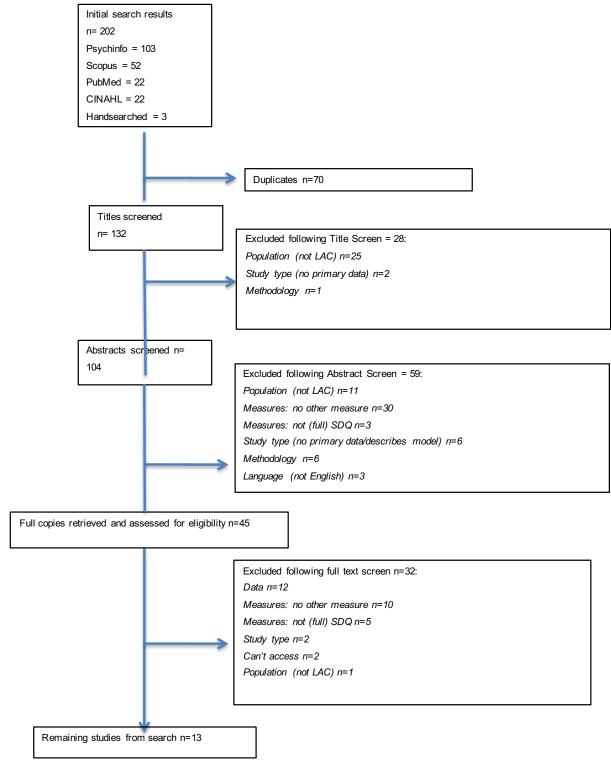


Figure 1: Literature Review Flowchart

Table 4: Single report SDQ, sensitivity and specificity values

Study	Sample	Ages	Informant	Criterion	Cut-off score	Sens.	Spec.
Goodman	British LAC,	5-10	Carer	DAWBA	Probable*	.51	-
2004	n=268		Teacher	DAWBA	Probable*	.60	-
	British LAC,	11-15	Carer	DAWBA	Probable*	.60	-
	n=271		Teacher	DAWBA	Probable*	.59	-
			Self	DAWBA	Probable*	.16	-
Lehmann	Norwegian LAC,	6-12	Carer	DAWBA	TDS 7	.95	.32
2014	n=223				TDS 8	.94	.36
					TDS 9	.91	.44
					TDS 10	.88	.51
					TDS 11	.88	.61
					TDS 12	.86	.71
					TDS 13	.83	.74
					TDS 14	.81	.75
					TDS 15	.77	.76
					Impact 1	.88	.57
					Impact 2	.80	.70
					Impact 3	.65	.82
	Norwegian LAC,	6-12	Teacher	DAWBA	TDS 7	.95	.39
	n=195				TDS 8	.95	.46
					TDS 9	.95	.48
					TDS 10	.92	.50
					TDS 11	.88	.55
					TDS 12	.86	.71
					TDS 13	.86	.77
					TDS 14	.83	.80
					TDS 15	.80	.80
					Impact 1	.78	.67
					Impact 2	.65	.74
					Impact 3	.54	.85
Janssens	Dutch LAC, N=292	3-18	Birth	Parent-reported contact	TDS 16	.58	.53
2009			parent	with MH services			
			Carer	Carer-reported contact	TDS 15	.47	.49
				with MH services			
Jee 2011	USA LAC, n=45	11-17	Carer	ChIPS	Clinical score on any	.71	-
					subscale or TDS		
			Self	ChIPS	Clinical score on any	.54	-
					subscale or TDS		
Milburn	Australian LAC at	4-17	Parents/	Clinical assessment	Borderline	.80	.58
2008	entry n=57		Carers				
	Australian LAC at		Teacher	Clinical assessment	Borderline	.33	.50
	entry n=32						
	Australian LAC at		Self	Clinical assessment	Borderline	.61	.92
	entry n=42						

TDS = total difficulties score. DAWBA = Development And Wellbeing Assessment (Goodman et al., 2000). ChIPS = Children's Interview for Psychiatric Syndromes (Weller et al., 2000).

^{* &}quot;Probable" prediction derived from priori algorithm on the basis that the relevant symptom score was above the 95th centile and the impact score was two or more.

Use of reference standards.

Three of the studies used structured diagnostic interviews as reference standards. Jee et al. (2011) used the Children's Interview for Psychiatric Syndromes (ChIPS) (Weller et al., 2000) conducted by masters-level clinicians, under the supervision of a doctoral-level psychologist. Two (Goodman, 2004; Lehmann, 2014) used the Development And WellBeing Assessment (DAWBA: Goodman *et al.*, 2000), a package of questionnaires and structured interview questions designed to be administered by lay interviewers; data are later reviewed by clinicians and psychiatric diagnoses generated. The SDQ is part of the DAWBA; both Goodman (2004) and Lehmann (2014) report that DAWBA diagnoses were generated blind to the SDQ scores, although (as Goodman & Goodman, 2011, concede) there is a chance that the SDQ could still influence the DAWBA outcome because higher SDQ scores will result in interviewers being prompted to ask further questions about a child's difficulties in certain domains, even if the DAWBA screening questions do not indicate a difficulty.

Milburn (2008) described the most comprehensive (though non-manualised) assessments, conducted by clinicians, involving up to four sessions with the child (including cognitive and educational screening for school-aged children), separate interviews with parents and carers, telephone interviews with teachers, and a paediatric appointment. ICD-10 diagnoses were then agreed by the multidisciplinary team, after all team members had reviewed the information.

Unfortunately, although Janssens *et al.* (2009) collected Achenbach System of Empirically Based Assessment (ASEBA; Achenbach & Edelbrock, 1983, 1986, 1987) questionnaires and SDQs from participants, they only report sensitivity and specificity for the SDQ in comparison to informant-reports of child contact with mental health services. There

is considerable evidence that many looked after children with mental health difficulties do not receive treatment for these difficulties (e.g. Meltzer 2003), and therefore this is not a suitable reference standard.

Sample.

Of the remaining four studies, three of the studies used English language versions of the SDQ, while Lehmann *et al.* (2014) used the Norwegian version. Only Goodman et al. (2004) has a British sample, and it would be reasonable to expect differences in LAC populations in different countries due to variations in child protection policies, care systems and laws. Jee *et al.* (n=50) and Milburn *et al.* (n=57) have relatively small sample sizes in comparison to the other studies; this may be a consequence of using trained clinicians rather than lay researchers to conduct assessments.

Sensitivity and specificity.

Lehmann *et al.* (2014) and Milburn *et al.* (2008) are the only studies to report both sensitivity and specificity, so that the balance between false-negatives and false-positives can be properly considered. Goodman (2004) and Jee (2011) did not report specificity, or likelihood ratios, and did not present data in such a way that these can be calculated. Only Lehmann *et al.* (2014) report confidence intervals. Lehmann *et al.* (2014) is the only study to report ROC analysis, with sensitivity and specificity for a range of different cut-offs, so that the optimal balance between sensitivity and specificity can be considered.

Difficulties in comparing studies.

As Levigne *et al.* (2016) also noted in their systematic review (described above), making comparisons across studies is further complicated by the different respondents and

wide variety of scoring methods and cut-off points chosen by researchers. Total difficulties scores used as cut-offs ranged from 8-17, while Goodman *et al.* (2004) used the SDQ algorithm (see Goodman, Renfrew & Mullick, 2000).

Summary of findings.

Parent/carer report SDQ (SDQ-P).

The limited available data suggests that using the recommended "probable" cut-off point (using the SDQ algorithm, see Goodman, Renfrew & Mullick, 2000) will miss an unacceptable proportion of mental health diagnoses. According to the only available UK data (Goodman, 2004), almost half of children aged 5-10 (sensitivity=.51), and 2 in 5 children aged 11-15 (sensitivity =.61) with mental health difficulties will not be missed by the screening, while the number of children wrongly identified is unknown. A small study (n=45) of 11-17 year olds from the United States (Jee *et al.*, 2011) using either a Total Difficulties Score of 17 or higher or a clinical score on any subscale found that the SDQ performed somewhat better, with approximately 3 in 10 children being missed (sensitivity = .71), but again the number of children wrongly identified is not reported and therefore the performance of the SDQ cannot be understood.

Outside of the UK, studies using a lower Total Difficulties Score have reported fewer false negatives (approximately 1 in 5), with false positives ranging from approximately 1 in 4 to approximately 2 in 5 (Lehmann et al, 2014; Milburn et al. 2008). In a Norwegian sample (*n*=223), Lehman *et al.* (2014) found an optimal Total Difficulties Score cut-off of 13 for the parent/carer report SDQ, despite the fact that children scoring 13 should be in the "normal" range according to SDQ scoring guidance. This yielded a sensitivity of .83 and a specificity of .74 in a population of Norwegian looked after children. Milburn *et al.* (2008) used a TDS

score of 14 (which is usually the cut-off for the borderline range, according to scoring instructions from sdqscore.org) and reported a similar sensitivity of .80 with a lower specificity of .58 in her smaller sample of Australian looked after children (n=57).

Importantly, Lehmann *et al.* (2014) drew attention to the prevalence of disorders in children with total difficulties scores in the low range from 4 to 9, which ranged between 13 and 29 percent. This was not reported by Goodman *et al.* (2004); however Goodman and Goodman (2012) used data from the same study to map measured disorder prevalence against individual children's SDQ scores. The graph appeared to show prevalence rates ranging from 10 to 30 per cent for some SDQ scores (7-13) in the "normal/non-clinical" range.

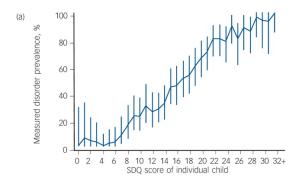


Figure 2: Using mean parent Strengths and Difficulties Questionnaire (SDQ) scores to predict the percentage prevalence (95% CI) of child mental health disorder among looked after children: performance at the individual level. Figure taken from Goodman & Goodman (2012)

Lehmann et al. (2014) concluded that in order to address the number of children whose difficulties would be missed by screening, then the criteria for further assessment should be either 13+ on the Total difficulties scale or 2+ on the Impact scale. They reported that this approach predicted disorders with high sensitivity (89.1%), but moderate specificity (62.1%). This literature review found no examples of this approach being validated with a UK population.

There is evidence that some types of difficulties might be more accurately identified than others. Goodman *et al.* (2004) found that, using the probable cut-off, both carers and teachers were best at identifying hyperkinetic disorders and ADHD, and were less likely to identify anxiety and depressive disorders. Teachers were more likely than parents to identify conduct-oppositional disorders. Milburn *et al.* (2008) found, when compared to comprehensive clinical assessment, the types of difficulties missed by the SDQ-P completed by parents or carers (based on a TDS cut-off 14) included adjustment or PTSD (4/22 missed), developmental disorders (2/4 missed), attachment disorders (2/9 missed) and anxiety disorders (1/1 missed); diagnoses were allocated following comprehensive multi-disciplinary assessment. Conclusions cannot be drawn from their small sample, but the results suggest that further exploration of the SDQ's ability to detect different types of mental health difficulties would be beneficial.

Teacher report SDQ (SDQ-T)

Data on the sensitivity and specificity of the teacher-report SDQ is limited. Goodman *et al.* (2004) reported a sensitivity of .60 for 5-10s and .59 for 11-15s; they did not report the specificity. Teachers were best at identifying hyperkinetic disorders (85.7%) and ADHD (72.7%), and worst at identifying mood disorders (53.6%). In a small sample, Milburn *et al.* (2008) found that the teacher-report SDQ performed poorly, with a sensitivity of .33 and a specificity of .50. However, it should be noted that the children in this sample had recently entered care and may have moved schools at that time, so teachers may not have known children well. Lehmann *et al.* (2014) found very different results, with teachers identifying mental health difficulties in children with a sensitivity of .83 and a specificity of .80. In Table 4 *(above)*, we can see that Lehmann *et al.*'s (2014) results fall at the extreme high end

of the distribution, and may therefore be difficult to replicate. Further research is needed to accurately establish the sensitivity and specificity of teacher report SDQs as a screening measure. Both Goodman *et al.* (2004) and Milburn *et al.* (2008) had lower numbers of responses from teachers than carers, and it may be that it is more difficult to collect data from teachers than from carers, as the latter is more likely to be directly attending CAMHS services with the child.

Self-report SDQ (SDQ-S)

Limited evidence is available on the value of the self-report SDQ as a screening measure. The available data suggests that many more mental health difficulties are missed by self-report compared to care or teacher report version. Using the probable cut-off, Goodman et al. (2004) found that only 16 percent of children with mental health difficulties were identified in this way, which would make the SDQ-S wholly unacceptable as a lone screening measure. No specificity was reported.

In a small sample (n=42), Milburn et al (2004) found that using a Total Difficulties Score of 14 as a cut-off identified approximately 6 in 10 children who met the criteria for mental health diagnosis; of note, almost all (92%) of the children who did report clinical-level difficulties were assessed as meeting the criteria for diagnosis. Another small study by Jee *et al.* found a similar sensitivity (.54) when clinical scores on either total difficulties or any subscale were used; they did not report the specificity. No studies have systematically investigated different cut-offs to find the best balance between sensitivity and specificity for the self-report SDQ.

Other useful studies

Correlations with other measures of psychopathology in LAC.

The literature review identified four studies that examined the extent to which SDQ scores correlated with scores on other screening questionnaires. A limitation of these studies is that without an additional reference standard it is difficult to draw conclusions about the respective accuracy of the different screening measures. Due to the scarcity of studies involving appropriate reference standards, a summary of these additional studies is provided here.

The Brief Assessment Checklists for Children (BAC-C) and Adolescents (BAC-A) were designed to screen for problematic behaviours, emotional states and relational difficulties in looked after populations (Tarren-Sweeney, 2013a,b). Goemans *et al.* (2018) found strong correlations between the SDQ and the BAC-C (.83) and BAC-A (.80), but this did not translate to agreement across the measures. The BAC-C and BAC-A identified clinically meaningful mental health difficulties in 78 percent of the children screened, whereas SDQ scores indicated that 39.8 percent were in the clinical range and 17.8 percent in the borderline range.

Two studies examined correlations between SDQ scores and measures of attachment disorder. Ratnayake *et al.* (2014) reported a significant association between SDQ score and score on reactive attachment problems (as measured by the Relationship Problems Questionnaire, RPQ; Minnis, Rabe-Hesketh & Wolkind, 2002) in a sample of looked after children accessing a specialist CAMHS team. Correlations were as follows: Total RPQ (r=.70, p<.001), RPQ inhibited (r=.55, p<0.001) and RPQ disinhibited scores (r=.32, p<0.001). In a study of 126 foster children aged 6-10, Lehmann (2016) found that the Reactive

Attachment Disorder (RAD) and Disinhibited Social Engagement Disorder (DSED) scales of the DAWBA "capture variations in interpersonal psychopathology not accounted for" by the SDQ-P.

Derluyn and Broekaert (2007) conducted the only study to explore the use of the SDQ with unaccompanied minors. On the parent-report SDQ completed by carers and social workers in Belgium, most (72.3%) young people scored in the normal range, with 10.2% in the borderline range and 18.5% in the clinical range. On the self-report version, 69.2% were in the normal range, 21.1% borderline, and 9.8% clinical. Similar scores were found on the HSCL-37 scale for anxiety. These suggest that either there is a considerably lower prevalence of mental health difficulties in this population compared to other looked after children, or that the SDQ is less sensitive to their difficulties. In the same sample, scores on the Child Behaviour Checklist (CBCL; Achenbach & Rescorla, 2001) and Reactions of Adolescents to Traumatic Stress questionnaire (RATS; Bean, Eurelings-Bontekoe, Derluyn, & Spinhoven, 2004a) showed somewhat higher levels of psychopathology, with scores in the clinical range of 25.2% and 19.4% respectively, and borderline scores of 18.7 and 19.4% respectively, although this would still suggest a lower prevalence of difficulties than the UK LAC population (e.g. Ford et al., 2007). Scores on the Hopkins Symptoms Checklist-37 for Adolescents (HSCL-37; Bean, Eurelings-Bontekoe, Derluyn & Spinhoven, 2004b) were similar to these. These results suggest that further exploration of the validity of using different screening measures with unaccompanied minors should be undertaken.

SDQ scores for children using specialist CAMHS services.

Acceptance for treatment by a specialist Child & Adolescent Mental Health Services should indicate that a child has a clinically significant mental health difficulty at that time,

and therefore the prevalence of clinical SDQ scores in referrals to CAMHS should provide a further indication of screening utility. An evaluation of a CAMHS service for looked after children in England (n=45) found that 78 percent of those who were referred to and accepted by the service had an SDQ score in the clinical range on the carer and self-report versions (Callaghan *et al.*, 2004). In another study, Ratnayake *et al.* found that only 54 percent of looked after children referred to and accepted by a specialist CAMHS service had SDQ scores in the clinical range; the authors note that this is relatively low for a specialist service caseload. Interestingly, 78 percent of adopted children and 55 percent of young offenders attending the same service had scores in the clinical range; the authors speculate that this may be due to different "expectations, perceptions, threshold of concerns and anxieties of adopted parents in contrast with those of carers of looked after children and of parents of children who offend" (p.166). Both of these studies suggest that, unless LAC CAMHS teams are regularly offering treatment to children who do not have mental health difficulties, a significant minority of looked after children have mental health difficulties that are not identified by the SDQ.

The *Future in Mind* report from the Children and Young People's Mental Health and Wellbeing Taskforce (2015) recommended that: "The provision of mental health support should not be based solely on clinical diagnosis, but on the presenting needs of the child or young person and the level of professional or family concern." (p.52). This approach is particularly relevant to specialist LAC CAMHS, where existing diagnostic labels may not adequately reflect the impact of developmental trauma (DeJong, 2010). Because the literature has focused on the SDQ's ability to identify looked after children who meet criteria for psychiatric diagnosis, we do not know whether the SDQ would identify the difficulties of those children who do not meet thresholds for existing diagnoses.

Rationale for the current study

As outlined above, looked after children in England are likely to have been exposed to abuse, neglect and other traumatic experiences, and are at high risk of developing mental health difficulties. The literature review has identified that insufficient evidence is available on the sensitivity and specificity of single-respondent SDQs in relation to mental health difficulties in looked after children. This means that clinicians and commissioners cannot make informed decisions on whether to use the various single-respondent SDQs to inform referrals to services, and if they are used, which cut-off should be adopted. This is of particular concern in England, where single-informant SDQs are used to monitor the mental health of looked after children at national and local levels, and where government guidance specifically recommends that the SDQ is the only screening tool necessary for mental health difficulties and prompting referrals to CAMHS. A process that requires triangulation of SDQ scores only where the initial single-report questionnaire identifies difficulties is only as sensitive as the initial single-report questionnaire. Given the current debate about the relative merits of SDQ screening compared to full mental health assessment for children entering care, it is particularly relevant to consider how well single-informant SDQ scores can predict the outcome of clinical assessment. Guidance is also required on how different cut-off criteria are likely to impact on the sensitivity and specificity of screening for mental health difficulties in a population of English looked after children, when compared with comprehensive mental health assessment by a specialist CAMHS team.

Furthermore, the available evidence suggests that some looked after children who have mental health difficulties are not identified by the SDQ, but not enough is known about the characteristics of those children and their difficulties. Further understanding of this could

enable recommendations to be made to improve detection of these cases. It is likely that clinicians working in specialist CAMHS services that routinely collect SDQs at referral will have useful observations relating to this question.

In summary, this study aims to further understanding of the extent to which the SDQ can be relied upon to correctly identify mental health difficulties in this vulnerable population. It also aims to identify some of its specific limitations (for example, with types of mental health difficulty, or children with particular characteristics), and the reasons for this. This study has been designed in order to aid decision-making about the future role of the SDQ in screening and monitoring mental health difficulties in looked after children.

Research questions

The study aimed to answer the following research questions:

- How well does the SDQ perform in identifying looked after children whose mental health difficulties require treatment by a specialist mental health team?
- How do clinicians understand the reasons why some looked after children's mental health difficulties are not identified by the SDQ?

Method

The current study was developed as part of two-arm, parallel group, single-centre feasibility randomised controlled trial (RCT) of Mentalization-Based Treatment for children in foster care (MBT-F) (Midgley et al., 2017). The aims of the wider study were to establish the feasibility of a full-scale RCT of MBT-F, and to identify and address any obstacles to doing so. All referrals to a CAMHS targeted child and adolescent mental health service (the 'Targeted Team') for children who were looked after, adopted or at risk of becoming looked after, within an NHS trust in the East of England, were screened for inclusion in the RCT. The Trust's own criteria for treatment from the Targeted Team stated that a score of 15 or more on the Strengths and Difficulties Questionnaire was a requirement, and in order to map the research study onto existing clinical practice regarding access to services, this was adopted as a requirement for inclusion in the RCT (Midgley et al., 2017). Details of all children screened for inclusion in the RCT were recorded in a Recruitment Log, so that this data could be used to assess the feasibility of the recruitment process and to make recommendations for the number of sites and timescales required for a future full-scale RCT (Midgley et al., 2017). As recruitment progressed, the research team observed that the Targeted Team was offering treatment to children with SDQ scores <15, and, as this was a feasibility study, the eligibility criteria for the RCT was amended to ≥13 (Herts & Minds Substantial Amendment 3), in order to explore how this modification would impact on recruitment. The amendment reduced but did not eliminate the problem. Because the SDQ had a key role in the RCT as both a screening and primary outcome measure, the reliability of the SDQ in identifying mental health difficulties in looked after children became an important question for the feasibility study.

Design

The present study has a mixed methods, quantitative and qualitative, sequential explanatory design (Creswell *et al.* 2003). As previously stated, a critical realist epistemology was utilised for this study, on pragmatic grounds, in order to further the study's aims. This epistemological framework can accommodate mixed quantitative and qualitative methods (Harper, 2012). A mixed methods design was selected because it enabled both an examination of the performance of the SDQ in screening for mental health difficulties in looked after children, *and* an exploration of possible reasons for the results found. Thus, the justification for the selection of a mixed methods design was *complementarity*; the design sought to add "elaboration, enhancement, illustration, clarification of the results from one method with the results from another" (Greene *et al.*, 1989, p. 259). This complementarity was utilised to meet the needs of policy makers and commissioners who make decisions based on statistical information, whilst also adding to the usefulness of the research for clinical practice (for example, if a clinician is aware that certain types of difficulty may not be identified by the SDQ, they may choose to use it alongside another measure targeting that particular difficulty). The study comprised two phases.

Phase 1: quantitative.

The first, quantitative phase utilised screening data from the Herts and Minds study to assess the SDQ as means of identifying the mental health needs of looked after children referred to a single CAMHS Targeted Team. Looked after children's SDQ scores were compared to the presence or absence of treatment recommendations made by the clinical team, in order to establish the accuracy with which the SDQ identified children in need of support from the specialist mental health service. Treatment recommendations were made following assessments, conducted according to the usual practice of the team. As the study

was conducted in a real world setting, these did not conform to a set protocol, and approaches to assessment were adapted according to the particular circumstances of each case.

Assessments usually started with a review of referral information and a consultation with the child's professional network; following this, if indicated, direct assessment of the child and carer was undertaken, involving clinical interviews, observation and questionnaires, as necessary.

Phase 2: qualitative.

In the second, qualitative phase, semi-structured interviews were conducted with clinicians from the team to investigate why some children were offered treatment despite having SDQ total difficulties scores in the "close to average³" or "slightly raised⁴" range. Individual interviews were chosen over focus groups for practical reasons including scheduling (clinicians worked from multiple different bases at different times and were rarely together) and anonymity of the children being discussed. An interesting alternative approach could have been to record discussions about referrals in the multi-disciplinary meetings, where decisions about referrals were made, but this was not possible because the majority of these had already taken place when this project was initiated.

Thematic Analysis (TA) was selected as the qualitative method of analysis, and there were several reasons for this. TA has been described as a bridge between the languages of quantitative and qualitative research (Boyatzis, 1998), and is therefore a good fit for mixed methods research. It is also well suited to a critical realist epistemology (Harper, 2012). TA was preferred over Content Analysis (CA) because of its ability to capture greater depth and

⁴ Scores for the slightly raised range varied according to respondent, in line with hand scoring guidance (Youth in Mind, 2016): SDQ-P = 14-16, SDQ-T = 12-15, SDQ-S = 15-17.

 $^{^3}$ Scores for the close to average range varied according to respondent, in line with hand scoring guidance (Youth in Mind, 2016): SDQ-P = 0-13, SDQ-T = 0-11, SDQ-S = 0-14.

implicit meaning than simply describing how frequently categories are mentioned (Joffe, 2012). TA has been described as "among the most systematic and transparent" forms of qualitative analysis (Joffe, 2012), and it was hoped that this would help to ensure that sufficient information was provided to enable readers to judge the transferability (Lincoln & Guba, 1985) of the findings to other settings. TA provides a good fit with the aims and intended audiences of the study because its strengths include a capacity to produce results that are accessible to the educated public and well-suited to informing policy development (Braun & Clarke, 2006). There were practical considerations too: TA is flexible and relatively quick to do in comparison to other methods (Braun & Clarke, 2006) and this was an important consideration for a mixed methods doctoral thesis, where word count and time available for qualitative analysis is reduced. For these reasons, TA was chosen over a critical realist version of Grounded Theory; the disadvantage of this choice is that only the views of clinicians – and not young people, their foster carers, teachers and social workers – are represented here.

Setting

The research was conducted within a single child and adolescent mental health service (CAMHS) Targeted Team, located within an NHS trust in the East of England, for children aged 0-18 who were on the edge of care, looked after or adopted. The service was designed to offer support to children and families who did not meet the threshold for mainstream Tier 3 CAMHS but had complex difficulties related to experiences of abuse and neglect. The Targeted Team offered consultations to social care and the network around the child, comprehensive assessments and brief interventions of 6-12 sessions, based on a variety of models, including: Dyadic Developmental Psychotherapy (DDP) informed intervention, Theraplay informed intervention, Video Interaction Guidance (VIG), Trauma-focused CBT,

systemic family psychotherapy, and art therapy. Psychoeducation groups for parents and carers were also provided. In addition, half of the team had completed training in Mentalisation Based Treatment for Fostering (MBT-F) as part of the feasibility RCT, and during the study period, this was delivered to 15 children who were randomised to the MBT-F arm of the trial.

The team comprised six posts, including a team manager and five CAMHS practitioner posts; no psychiatrist was attached to the team, and therefore children requiring psychiatry were transferred to the mainstream Tier 3 CAMHS service. Referrals to the team were usually made by social workers, via a Single Point of Access, and the team would only accept referrals if the child had an allocated social worker. In the local authority where the research was conducted, on 31 March 2017, there were 34 looked after children per 10,000 children in the population, fewer than the national prevalence of 62 per 10,000 (National Statistics, 2017).

Participants

Phase 1: quantitative sample.

Eligibility criteria

All children referred to the CAMHS Targeted Team between 2 January 2016 and 14th July 2017 were screened for inclusion in the feasibility RCT. Eligibility criteria for the first, quantitative phase of the present study were as follows:

- 1. Looked after (in foster, kinship or residential care) for a minimum of 4 weeks;
- 2. aged 4-17;
- 3. referred to the targeted LAC team;
- 4. one or more completed SDQs included in the referral;

5. had a referral outcome (decision on whether to offer or recommend treatment) recorded within the data collection period.

Sample.

Figure 3 (below) shows the recruitment process. A total of 314 referrals were made to the Targeted Team during the study, of whom 189 were looked after. After exclusion, data from 144 looked after children were included in the sample for the first phase of the study.

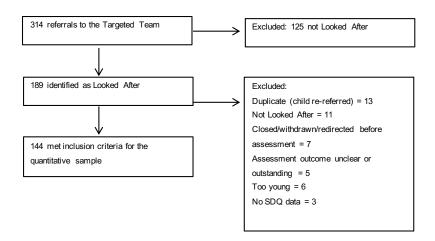


Figure 3: Recruitment flow chart (quantitative sample)

Demographics.

Table 5: Demographics of the quantitative sample (n=144)

Category	Туре	Number	Percent
Gender	Male	64	44%
	Female	64	44%
	Missing data	16	11%
Age	4-7	22	15%
	8-10	35	24%
	11-15	53	36%
	16-17	20	14%
	Missing data	14	10%
Legal status	Full Care Order	66	46%
	Interim Care Order	22	15%
	Voluntary Care Order	21	15%
	Missing data	35	24%

Available sample demographics are presented in the table above. Demographics data are limited because these are screening data, which were kept to a minimum for ethical reasons (see above).

Phase 2: qualitative sample.

Eligibility criteria.

Participants were eligible for inclusion in qualitative phase of the study if they had worked as a clinician in the Targeted Team at any point during the course of the feasibility RCT.

Participants.

Nine clinicians who had worked in the CAMHS Targeted Team over the course of the Herts and Minds study participated in the second, qualitative phase of the study. Six were employed by the team at the point of interview, and three had left the team. Of the three who had left the team, one was working in another CAMHS service for looked after children, and two were working in mainstream CAMHS services. The interview group comprised the clinical team lead, two clinical psychologists, a systemic therapist, three clinical social workers, one psychiatric nurse, and one art therapist. A further two clinicians who had left the team during the Herts and Minds study could not be contacted for interview, despite repeated efforts, and therefore did not participate in the interviews.

Ethical issues

Process of ethical approval.

Ethical approval for the wider Randomised Controlled Trial was granted by the East of England - Cambridgeshire and Hertfordshire Research Ethics Committee, and two substantial amendments to this application were submitted and approved for the present study (see *Appendix 3*). A letter of access was obtained from Hertfordshire Partnership Foundation Trust's Research and Development team in order to collect data on Trust premises (see *Appendix 4*). The study sponsor was the Anna Freud National Centre for Children and Families, and the study was registered with the University of Hertfordshire's Ethics Board via a *declaration of involvement with a non-UH study* form, protocol number LMS/PGR/NHS/02906.

Confidentiality and consent.

Quantitative phase.

For the wider RCT, anonymised data about all referrals to the Targeted Team, and the outcome of that referral, were collected and recorded in a screening log. This data was collected with the consent of the Local Authority⁵ but without the consent of children themselves and their parents and carers. The purpose of collecting this data was to screen for eligibility for inclusion in the wider RCT, to monitor recruitment and to provide evidence of the feasibility of conducting the RCT on a larger scale. (Consent for participation in the RCT was only sought from those eligible for inclusion, after screening had been undertaken.)

⁵ The local authority held shared parental responsibility for looked after children on full care orders and interim care orders, but did not hold parental responsibility for children who are accommodated on voluntary care orders.

Qualitative phase.

Clinicians who were eligible for participating in the qualitative phase of the study received written information about the study and the potential benefits and risks of involvement (See Project Information Sheet in *Appendix 6*). Prior to participation, they were asked to read and sign the consent form (*Appendix 7*) and were given an opportunity to ask any questions about their involvement in the study. Participants were informed that consent was voluntary and could be withdrawn at any time. Participants were informed – in writing and verbally – that interviews would be transcribed by a transcription agency with whom a confidentiality contract was in place (see *Appendix 9*). Clinician names and place of work were not used on the recordings. Recordings were destroyed after transcripts had been checked for accuracy.

Participants were asked to discuss their work with children and young people who were treated during the RCT and who had total difficulties scores in the "close to average⁶" or "slightly raised⁷" categories of the SDQ. The interviews took place after work with the children had been completed, in order to avoid any influence on their treatment. Consent for these discussions was not obtained from these children and their families. The research team judged that contacting families at this stage would be disproportionately onerous and disruptive for the children and carers concerned, at a point where they should be moving on from their mental health difficulties. Therefore, clinicians were asked to preserve the anonymity of the children throughout the interviews, and to discuss them as a group rather than individually. They were reminded that the focus of the research was on the clinicians'

 $^{^6}$ Scores for the close to average range varied according to respondent, in line with hand scoring guidance (Youth in Mind, 2016): SDQ-P = 0-13, SDQ-T = 0-11, SDQ-S = 0-14.

⁷ Scores for the slightly raised range varied according to respondent, in line with hand scoring guidance (Youth in Mind, 2016): SDQ-P = 14-16, SDQ-T = 12-15, SDQ-S = 15-17.

decision-making processes rather than the children themselves. The interviewer was blind to which of the children each clinician had worked with and was discussing. This issue was discussed in detail in correspondence with the Research Ethics Committee.

Reflections on consent & use of data.

It is the author's view that researchers have an ethical obligation to maximise the use and effectiveness of all data collected for research studies, and this is particularly true for under-researched client groups where evidence based practice is urgently needed. In addition to considering risks to participants in taking part in the research, it is also necessary to consider the risks to the population of not carrying out that research. In this instance, failing to investigate whether children had been wrongly excluded from treatment in the feasibility trial could lead to more children being denied access to a treatment that might benefit them in future trials. More broadly, as the literature review demonstrates, the single-informant SDQ is being widely used and promoted as a screening tool for mental health difficulties in looked after children without adequate evidence for its effectiveness. Thus, not conducting this research risked missing an opportunity to evidence that children at high risk of mental health difficulties may be missing out on treatment due to over-reliance on scores from single-report SDQs.

Service user involvement

Patient and public involvement (PPI) was central to the design and development of the Herts & Minds study. For example, a foster carer's support group was consulted, and two foster carers were recruited as service user representatives on the Study Steering Committee and involved in the development of the study at each stage. In addition, the University of Hertfordshire's Public Involvement in Research Group (PIRG) provided feedback on patient

information and consent materials for the wider study. For the present study, the views of LAC social workers and supervising social workers responsible for making referrals to the Targeted CAMHS team, obtained via focus groups, contributed to the development of interview questions and prompts for clinicians. Two clinicians from a similar CAMHS team at a different NHS Trust provided feedback on consent materials and procedures for interviews with clinicians. In order to ensure that multiple perspectives were included in the development of themes, a group of young people with experience of being looked after were consulted at an early stage in the qualitative analysis. It has been suggested that incorporating additional perspectives and expertise into the development of themes in doctoral research projects, where the majority of the analysis is completed by one person, could add to the quality of analysis (Fereday & Muir-Cochrane, 2006).

Measures

Strengths and Difficulties Questionnaire (with impact supplement).

The extended version of the Strengths and Difficulties Questionnaire (Goodman, 1999) comprises 25 items, divided between five scales - emotional symptoms, conduct problems, hyperactivity/inattention, peer relationships and prosocial behaviour - and an "impact supplement", which asks for the respondent's view on whether the child has a problem and if so, how that impacts on their life and that of the family.

Interview schedule.

A semi-structured interview schedule was developed in collaboration with the research team (See *Appendix 8*). The interview was designed around the research question. The interview began by asking participants to describe the work of the Targeted Team, and their role within the team, and moved on to general questions about referrals and assessments

within the team, and the role of the SDQ in this. Participants were then asked about children whom they had worked with during the trial period who scored in the "close to average⁸" and "slightly raised⁹" range on the SDQ. The aim of these questions was to try to identify reasons why some children's difficulties were not fully captured by the SDQ that were grounded in specific examples (rather than general views about the SDQ); it was hypothesised that SDQ scores in the lowest categories may not be an accurate description of children's difficulties if they were receiving treatment from a CAMHS team. Finally, clinicians were asked about their confidence in the SDQ, and whether they had noticed that it worked better or worse for children with different characteristic (e.g. ethnicity, culture). Prompts for questions were derived from the literature reviewed above (e.g. van der Kolk, 2005; Tarren-Sweeney 2008) and from focus groups with social workers, conducted as part of the wider study.

Procedure

Herts and Minds feasibility Randomised Controlled Trial.

Every referral letter and SDQ submitted to the Targeted Team between 2 January 2016 and 14 July 2017 was screened by a member of the Herts and Minds research team in order to determine eligibility for inclusion in the Herts and Minds study. It is important to note that the SDQs in this study were completed by respondents (carers, teachers and young

⁸ Scores for the close to average range varied according to respondent, in line with hand scoring guidance (Youth in Mind, 2016): SDO-P = 0-13, SDO-T = 0-11, SDO-S = 0-14.

⁹ Scores for the slightly raised range varied according to respondent, in line with hand scoring guidance (Youth in Mind, 2016): SDQ-P = 14-16, SDQ-T = 12-15, SDQ-S = 15-17.

people) and were collected by social workers and submitted with referrals; they were not administered by clinicians or researchers, and so no protocol was followed¹⁰.

In some cases, the original SDQ form was submitted with the referral; in other cases, the SDQ had been entered into a local authority computer system and an output from this submitted containing the answers to each question. SDQs were scored by a member of the research team using a spreadsheet. Details of each referral, including age, gender, legal status and SDQ score were recorded in the Recruitment Log. The research team then liaised with the Targeted Team and recorded the outcome of that referral in the Recruitment Log, in order to determine eligibility for the study.

Present study: quantitative stage.

Data from the Recruitment Log were reviewed, and any missing or unclear data sourced or clarified where possible. Treatment recommendations were then coded as either a) CAMHS treatment recommended (in the Targeted Team or other CAMHS services); b) other mental health treatment recommended (this included counselling, play or art therapy at school, specialist voluntary sector services for survivors of sexual abuse and traumatised refugees, and a local authority-led service based on Kinniburgh and Blaustein's (2005) Attachment, Self-Regulation and Competency (ARC) Model, as well as referrals to educational psychology services); or c) no treatment recommended. Recommendations for treatment were coded as such even where treatment was delayed due to placement breakdowns, court proceedings or other barriers to treatment. SDQ scores were classified according to the new four-fold classification system (close to average, slightly raised, high or

¹⁰ This is similar to the way that the Department for Education collects annual SDQ data for looked after children: social workers are responsible for ensuring that they are completed by foster carers (Department for Education & Department of Health, 2015a).

very high) using the "Instructions in English for scoring by hand SDQs for 4-17 year olds, as completed by parents, teachers or youths" (Youth in Mind, 2016).

Present study: qualitative stage.

Interviews took place in a private room at the Targeted Team base or, where clinicians had left the service, at their new workplaces. At the beginning of the interview, clinicians were provided with a list of all children treated by the team during the trial period who scored in the "close to average" and "slightly raised" categories on the SDQ, alongside their SDQ scores (including TDS, subscale and impact scores) and informant type (carer, teacher or self-report). Demographics of this sub-group are presented in the table below.

Table 6: Demographics of the qualitative sample of children (n=32)

		Normal (n=20)		Borderline (n=12)		
Category	Туре	Number	%	Number	%	
Gender	Male	10	50%	6	50%	
	Female	9	45%	6	50%	
	Missing data	1	5%	0		
Age	4-7	1	5%	1	8%	
	8-10	3	15%	3	25%	
	11-15	9	45%	6	50%	
	16-17	6	30%	2	17%	
	Missing data	1	5%	0		
Legal	Full Care Order	4	20%	8	67%	_
status						
	Interim Care	6	30%	2	17%	
	Order					
	Voluntary Care	7	35%	2	17%	
	Order					
	Missing data	3	15%	0		

Two pilot interviews were carried out with members of the Targeted Team; these resulted in minor changes to the way that prompts were used for the question: *In your experience, are there particular groups of children for whom the SDQ seems to work particularly well or not so well?* (Initially these were printed on cards and clinicians were

asked to pick out any they thought relevant — this format was confusing for participants, so prompts were subsequently delivered verbally.) In addition, later interviewees were also provided with an SDQ for reference, because it became apparent that participants were not as familiar with the contents of the SDQ as had been anticipated. Data from the pilot interviews were included in the dataset as no significant alterations were made to the interview method. In order to maintain the confidentiality of the children concerned, clinicians were asked not to discuss children individually, and not to use any children's names.

Data analysis

Quantitative stage.

Receiver Operating Characteristics (ROC) analyses can be used in clinical psychology to determine the ability of a test to discriminate between groups and to identify optimal cut-off points (Pintea & Moldovan, 2009). ROC analyses were conducted on the Total Difficulties Score (TDS), using two different referral outcomes (a. CAMHS treatment recommended and b. CAMHS or any other mental health treatment recommended), as a proxy for the presence of mental health difficulties. ROC analyses were performed using easyROC version 0.3 (Goksuluk *et al.*, 2016). Separate Area Under the Receiver Operating Characteristics (AUROC) values were estimated for the scores reported by caregivers (n = 97), teachers (n = 41) and self-report (n=41) questionnaires. Sensitivity and specificity were calculated for different cut-off points in order to enable consideration of the optimal cut-off value. SPSS version 24 for Macintosh was used for demographics and additional statistical analyses.

Qualitative stage.

Thematic Analysis (Braun & Clark, 2006) of the nine interview transcripts was conducted, using the steps outlined by Joffe (2012).

Examination of the dataset and development of initial coding frame.

Due to the author's hearing impairment, all interviews were transcribed by a professional agency, under a non-disclosure agreement. (Ethical approval for this was obtained, and interviewees were informed.) Transcripts were then checked by the author against the recordings. As recommended by Braun and Clarke (2006), familiarisation with the dataset was achieved via repeated reading of the transcripts. Transcripts were then imported into NVIVO version 11.4.3. An initial coding frame was developed using a combination of deductive codes derived from the literature, and inductive codes drawn from the content of the data. An example from the coding frame is presented below; for the full coding frame, see *Appendix 10*.

Code name	Definition	Example		
META: who is the	According to the clinician's description, who or what do they seem to regard as the			
patient?	"patient" i.e. the target of the	the target of the intervention?		
Patient-child-carer-	The clinician describes the	"What I've kind of found is once an intervention or whatever the		
relationship	primary patient as the child-	work is that you're doing is complete, you might not see a		
	carer relationship	change in behaviours or a change in presentation, but what you		
		do see a change in is how the carers understand and make		
		sense of what they're seeing, their levels of toleration, which are		
		also impacted on by understanding, and that in itself has a huge		
		difference in how that relationship and the attachment then		
		forms and builds."		
Patient-child	The clinician describes the	"But we did have a small number of cases where there were		
	primary patient as the child	where the child's goal was to feel better or to get out and do		
		more, so there would be a short piece of work that was done		
		with the child around that."		

Testing the initial coding frame for reliability.

Once the initial coding frame had been developed, it was piloted by the author and an independent coder (a fellow clinical psychology trainee who was utilising the TA method in their own research). Approximately 10% of the dataset (one interview) was coded independently, in line with Joffe's (2012) recommended procedure. Inconsistencies were reviewed and used to improve the coding frame. The primary inconsistencies identified were found to relate to codes that were too similar; these were then amalgamated within the coding frame, resulting in fewer, more distinct codes.

Coding the full dataset.

All nine interviews were then coded using the finalised coding frame (in NVIVO).

An example of a coded data extract is presented below. For a longer example of an extract of coded data, see Appendix X.

Data extract	Coded for
Yeah, it's more around becoming increasingly isolated,	SDQ-misses-internalising
possible flashbacks and possible post-traumatic elements,	SDQ-misses-PTSD
post-traumatic trauma symptoms with this case, and I recall	
being very concerned about there not being a good fit with	Problem-child-carer-relationship / SDQ-misses-child-carer-
the foster carer and worried that this child might be	relationship
experiencing significant distress without the protective adult	
around, which I believe we'd been raising with children	
services as well at that point. So clearly, there's an element	Decision-clinical-judgement
of concern around the child functioning and where is that,	
you know, if this continues then it could cause quite a lot of	
damage emotionally to the child.	

Figure 4: coded data extract from transcript of Clinician 3 interview; the decision to offer treatment to a child with scores in the "slightly raised" range is being discussed.

Analysing the data.

When the full dataset had been coded, commonalities and links between codes were identified and codes were grouped into provisional themes. Care was taken to ensure that themes represented the majority of the dataset. This was achieved by ensuring and recording prevalence alongside meaning and interpretation.

At an early stage in this process, a group of young people with experience of care was consulted, and this provided an opportunity to run initial ideas by them. This provided an opportunity to incorporate additional perspectives and expertise into the development of the themes. It was hoped that this would help to provide an additional counter-balance to the influence of my own experiences and biases on the patterns that influenced what I noticed, or did not notice, in the data. The consultation focused primarily on suggested themes and subthemes particularly relevant to the young people, including stigma and labelling of young people, under-reporting on questionnaires, and mistrust of professionals. The consultation was particularly helpful in drawing out the links and dependencies between these developing themes and sub-themes (for example, the link between labelling, stigmatising language in the SDQ and under-reporting). Undertaking the consultation reminded me of the rich stories and opinions that young people have to contribute to this issue, and highlighted what had been lost in choosing an approach which did not include their voices directly (as, for example, a grounded theory study might have done).

Names for themes and subthemes were then defined and refined in order to capture their essence in an accessible way. A thematic map was produced and revised. Coherence of the themes was further assessed through the writing of the results section.

Results

Quantitative stage

Treatment recommendations.

Of the 144 children referred to the service with at least 1 SDQ, 95 (66%) were offered a service from the Targeted Team or referred to another CAMHS service. For a further 21 (14.6%) children, other types of mental health or neurodevelopmental services were recommended. In total, 80.6% (n=116) of children referred to the service were assessed to be in need of some form of intervention to support their mental health or neurodevelopment. No treatment was deemed necessary for 28 (19.4%) children.

Strengths & Difficulties Questionnaires.

179 SDQs for 144 children were collected at referral during the trial. (27 children had 2 SDQs and 4 had 3 SDQs.) Of these, 97 were carer-report versions, 41 were teacher-report versions and 41 self-report versions. Because the self-report version is only for young people aged 11-17, while the parent and teacher versions cover a wider age range of 4-17, the mean age of children in the self-report sample (M= 13.84, SD = 2.06) was older than those in the parent/carer (M = 11.14, SD = 3.76) and teacher (M = 9.82, SD = 3.39) samples. A Kruskal Wallis test indicated that this difference was significant, γ 2(2, N=162)=25.84, p = <.001).

SDQ Total Difficulties Scores at referral.

The distribution of Total Difficulties Scores (TDS) for all SDQs received with referrals to the Targeted Team during the trial is shown in *Figure 1*. The Targeted Team is commissioned to work with children who score 15 or more on the SDQ. However, the data shows that 65 (36%) of the SDQs had total difficulties scores <15 at the point of referral. These SDQs related to referrals for 41 children: 19 of those children had only 1 SDQ <15, 10

had 2 SDQs with both TDS <15, 10 children had an additional SDQ TDS \geq 15 and 2 children had 2 additional SDQ TDS \geq 15.

Mean Total Difficulties Scores at referral, by respondent type, were as follows: carerreport SDQ, M = 18.02, SD = 7.38; teacher-report SDQ, M = 17.20, SD = 7.24, self-report SDQ, M = 15.10, SD = 6.67.

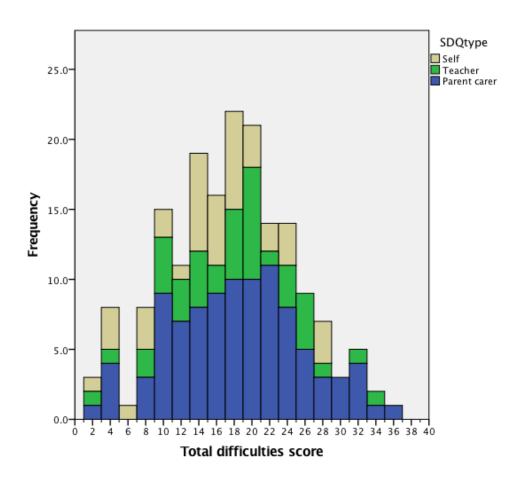


Figure 5: Distribution of Total Difficulties Scores for children referred to the Targeted Team, by respondent type.

Total difficulties score classification at referral

SDQs were categorized according to the new four-fold classification system (Youth in Mind, 2016). In this system, cut-off scores vary according to informant type¹¹. These results are shown in Table 1 below. Responses from parents and teachers were similar in the proportions of children scoring in the *close to average*, *slightly raised*, *high* and *very high* ranges, with the majority of children in the *very high* range. In contrast, the majority of young people scored themselves in the *close to average* range. This was only partly explained by the higher cut-off points for the SDQ-S. The difference between the groups was not significant, but was approaching significance, X^2 (11, X = 179) = 12.52, y = .051.

Table 7: Total Difficulties Score classification, by respondent type, for all SDQs submitted with referrals to the Targeted team.

	Frequency by SDQ banding										
Informant type	Close to average	Slightly raised	High	Very high							
Parent/carer (n=97)	26 (26.8%)	15 (15.5%)	14 (14.4%)	42 (43.3%)							
Teacher (n=41)	10 (24.4%)	6 (14.6%)	6 (14.6%)	19 (46.3%)							
Self report (n=41)	18 (43.9%)	10 (24.4%)	7 (17.1%)	6 (14.6%)							

AUROC and Dimensional Properties of the Total Difficulties Score in predicting treatment recommendation.

Parent/carer report sample.

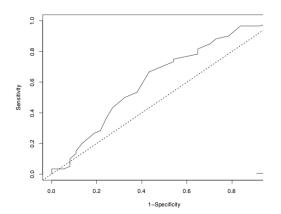
In the Parent/Carer Sample (SDQ-P, *n*=97), ROC curves were plotted for Total Difficulties Scores, with CAMHS treatment and any mental health treatment as status variables (Figure 5). As Table 8 shows, the Area Under the Curve (AUC), Total Difficulties Scores from parents/carer SDQs predicted recommendations of CAMHS treatment at a rate

¹¹ SDQ-P classifications: close to average = 0-13, slightly raised = 14-16, high = 17-19, very high = 20+. SDQ-T classifications: close to average = 0-11, slightly raised = 12-15, high = 16-18, very high = 19. SDQ-S classifications: close to average = 0-14, slightly raised = 15-17, high = 18-19, very high = 20+. (Youth in Mind, 2016.)

greater than chance (z=1.98, p < .05). The AUC was .62. According to criteria outlined by Streiner and Cairney (2007), AUC scores between .50 and .70 indicate *low* accuracy.

When children referred to other types of mental health or neurodevelopmental service were considered alongside those recommended CAMHS treatment, there was no statistically significant difference between the SDQ-P and chance (z=1.58, p>.05).

Figure 6: ROC curves for the SDQ-P Total Difficulties Score in predicting treatment recommendation at a CAMHS service (left) or any other mental health or neurodevelopmental service (right).



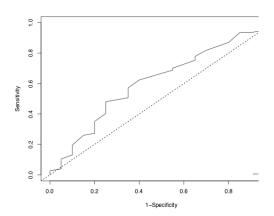


Table 8: The AUC for the SDQ-P TDS from parent/carers.

	Treatment recon	nmendation
	CAMHS	Any MH
Area under the ROC curve (AUC)	0.620	0.613
Standard error	0.061	0.071
95% Confidence interval	0.501 – 0.739	0.473 - 0.753
z statistic	1.978	1.578
Significance level P (Area=0.5)	0.048	0.114

Estimation method is DeLong (1988).

Optimal cut-off points.

Sensitivity and specificity for SDQ-P TDS in predicting CAMHS treatment were calculated for possible optimal cut-off points. This analysis is presented in *Table* 9 below.

Table 9: Receiver Operating Characteristics Analyses for the SDQ-P Total Difficulties Scale from the parent/carer sample.

	CAMH	S treatment	t				Any MH treatment							
TDS	Sens	95% CI	Spec	95% CI	PPV	NPV	+LR	Sens	95% CI	Spec	95% CI	PPV	NPV	+LR
9	.97	.89, 1	.16	.06, .32	.65	.75	1.15	.94	.86, .98	.15	.03, .38	.81	.38	1.10
10	.90	.80, .96	.22	.10, .38	.65	.57	1.15	.87	.77, .94	.20	.06, .44	.81	.29	1.09
11	.88	.77, .95	.27	.14, .44	.66	.59	1.21	.84	.74, .92	.25	.09, .49	.81	.29	1.13
12	.85	.73, .93	.30	.16, .47	.66	.55	1.21	.82	.71, .90	.30	.12, .54	.82	.30	1.17
13	.82	.70, .91	.35	.20, .53	.67	.54	1.26	.78	.67, .87	.35	.15, .59	.82	.29	1.20
14														
15	.75	.62, .85	.46	.30, .63	.70	.53	1.39	.70	.59, .80	.45	.23, .69	.83	.28	1.28
16														
17	.67	.53, .78	.57	.40, .73	.71	.51	1.54	.62	.51, .73	.60	.36, .81	.86	.29	1.56
18	.60	.47, .72	.59	.42, .75	.71	.48	1.48	.57	.45, .68	.65	.41, .85	.86	.28	1.63
19	.53	.40, .66	.62	.45, .78	.70	.45	1.41							
20	.50	.37, .63	.68	.50, .82	.71	.46	1.54	.48	.37, .60	.70	.51, .91	.88	.27	1.92

N.B. according to the hand-scoring guidance available on the official sdq.info website, scores \leq 13 are in the "close to average" range, 14-16 are "slightly raised", 17-19 are "high" and \geq 20 are "very high".

Giving equal weight to sensitivity and specificity (as per Youden's method), the optimal cut-off value for predicting CAMHS treatment would be 17. This would yield a sensitivity of .67 (95% CI: 53, .78) and a specificity of .57 (95% CI: .40, .73), meaning that approximately 1 in 3 children requiring mental health support would not be identified. Using the same criteria, the optimal cut-off point for treatment by any mental health or neurodevelopmental service would be 20. This would yield a sensitivity of .48 (95% CI: .37, .60) and specificity of .88 (95% CI: .51, .91), meaning that more than half of children requiring mental health support would be missed. These levels of sensitivity are unlikely to be acceptable to mental health services seeking to support the emotional needs of vulnerable children.

The LAC CAMHS team in which this study is based has selected a lower cut-off of 15, which is supposed to be the minimum score required for access to the service. This score falls in within the "slightly raised" range for the various different versions of the SDQ¹².

¹² "Slightly raised" is a TDS score of 14-16 on the SDQ-P, 12-15 on the SDQ-T, and 15-17 on the SDQ-S (Youth in Mind, 2016). Statutory guidance states that scores in the borderline range or higher on the SDQ-P should be triangulated with SDQs from other informants, and if this confirms the carer's score,

These data show that this yields a sensitivity of .75 (95% CI: .62, .85) and specificity of .46 (95% CI: .30, .63) for CAMHS treatment, while for any mental health service the sensitivity is .70 (95% CI: .59, .80), specificity .45 (95% CI: .23, .69). If clinicians strictly followed their service guidelines, 1 in 4 children requiring CAMHS support, or 3 in 10 requiring any mental health support, would miss out on treatment. Over half of the children identified would not require treatment.

In this population, the presence of a referral to CAMHS indicates that someone in the child's network has concerns about their emotional wellbeing¹³. The potential consequences of failing to provide timely support (e.g. worsening mental health, placement breakdown) are likely to be considered greater than the cost of assessing children and confirming that they do not require further intervention. It should be noted that the initial stage of assessment in this service involves professional networks, with children themselves only involved if treatment is thought likely to be required, so in this context false positives are less likely to cause distress to the children.

Teacher report sample

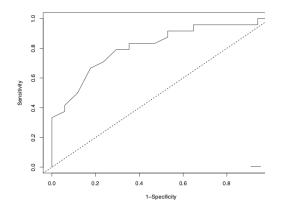
A subset of teacher report SDQs (n=41) were analysed separately. Figure 4 contains ROC curves for this sub-sample, and Table 7 contains AUC analysis. TDS from teachers' SDQs predicted recommendations of CAMHS treatment (z = 4.57, p <001) and any mental health treatment (z = 2.81, p <.01) at a rate greater than chance. The AUC was .81 for

[&]quot;consideration should be given to using a diagnostic tool to enable an appropriate intervention to be identified" (DfE & DOH 2015 p.30)

¹³ Note that children whose emotional wellbeing has not attracted the concern of adults around them (rightly or wrongly) are not included here, nor those with severe mental health difficulties who are in treatment with other services e.g. Tier 3 or Tier 4 CAMHS.

CAMHS and .74 for any mental health treatment, indicating accuracy in the *moderate* range (Streiner & Cairney, 2007).

Figure 7: ROC curves for SDQ-T Total Difficulties Score in predicting treatment recommendation at a CAMHS service (left) or any other mental health or neurodevelopmental service (right).



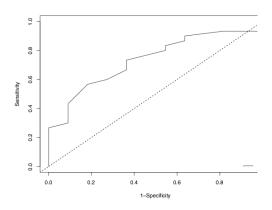


Table 10: The AUC for the SDQ-P TDS from teachers (n=41).

	Treatment recomn	nendation
	CAMHS	Any MH
Area under the ROC curve (AUC)	0.810	0.735
Standard error	0.068	0.084
95% Confidence interval	0.677 - 0.943	0.571 - 0.899
z statistic	4.565	2.805
Significance level P (Area=0.5)	<.001	0.005

Estimation method is DeLong (1988).

Optimal cut-off points

In order to identify the optimal cut-off point, sensitivity and specificity for SDQ-T TDS in predicting CAMHS treatment were calculated for possible cut-off points. This analysis is presented in Table 11.

In considering this data, it is important to bear in mind that this is a smaller sample (n=41) and the statistics reported have large confidence intervals. Giving equal weight to sensitivity and specificity (Youden's Index), the optimal cut-off value for predicting CAMHS treatment would be 17. This would yield a sensitivity of .79 (95 % CI: .58, .93) and

specificity of .79 (95% CI .44, .90); in other words, approximately 1 in 5 children would be missed and 1 in 5 wrongly identified. The optimal cut-off point for any mental health or neurodevelopmental service would be 19. This would yield a sensitivity of .57 (95% CI: .37, .75) and a specificity of .82 (95% CI: .48, .98) (just over 2 in 5 children would be missed and just under 1 in 5 wrongly identified). Using the service cut-off point of 15 would yield a sensitivity of .83 (95% CI: .63, .95) and specificity .65 (95% CI: .38, .86) for CAMHS treatment and a sensitivity of .73 (95% CI: .54, .88) and specificity of .64 (95% CI: .31, .89) for any mental health or neurodevelopmental service. In order to gain a sensitivity ≥90 (so that fewer than 1 in 10 would be missed), a cut-off of 12 (*sens.* = .92, 95% CI: .73, .99; *spec.* = .47, 95% CI: .23, .72) would be required for CAMHS treatment and a cut-off of 10 (*sens.* = .90, 95% CI: .74, .98; *spec.* = .36, 95% CI: .11, .69) would be required for any mental health or neurodevelopmental service.

Table 11: Receiver Operating Characteristics Analyses for the SDQ-T Total Difficulties Scale from the teacher sample.

	CAMH	S treatment	t				Any MH treatment							
TDS	Sens	95% CI	Spec	95% CI	PPV	NPV	+LR	Sens	95% CI	Spec	95% CI	PPV	NPV	+LR
9								.93	.78, .99	.18	.02, .52	.76	.50	1.14
10	.96	.79, 1.0	.35	.14, .62	.68	.86	1.48	.90	.74, .98	.36	.11, .69	.79	.57	1.41
11														
12	.92	.73, .99	.47	.23, .72	.71	.80	1.73	.83	.65, .94	.46	.17, .77	.81	.50	1.53
13	.88	.68, .97	.47	.23, .72	.70	.73	1.65							
14								.77	.58, .90	.55	.23, .83	.82	.46	1.69
15	.83	.63, .95	.65	.38, .86	.77	.73	2.36	.73	.54, .88	.64	.31, .89	.85	.47	2.02
16														
17	.79	.58, .93	.71	.44, .90	.79	.71	2.69							
18	.71	.49, .87	.77	.50, .93	.81	.65	3.01	.60	.41, .77	.73	.39, .94	.86	.40	2.2
19	.67	.45, .84	.82	.57, .96	.84	.64	3.78	.57	.37, .75	.82	.48, .98	.90	.41	3.12
20	.50	.29, .71	.88	.64, .99	.86	.57	4.25	.43	.26, .63	.91	.59, 1.0	.93	.37	4.77

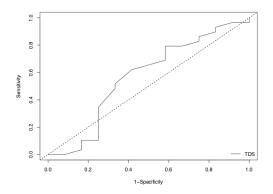
N.B. according to the hand-scoring guidance available on the official Youth In Mind website, scores ≤11 are in the "close to average" range, 12-15 are "slightly raised", 16-18 are "high" and ≥19 are "very high".

Self report sample

A subset of self-report SDQs (SDQ-S, *n*=41) were analysed separately. Figure 7 contains the ROC curves for treatment by CAMHS or any other mental health or

neurodevelopmental service, and Table 12 contains AUROC analysis. The Area Under the Curve (AUC) was not significantly different from the random performance of a test, in identifying recommendations of treatment by CAMHS (z=.60, p>.05) or any mental health service (z=.42, p>.05).

Figure 8: ROC curves for SDQ-S Total Difficulties Score in predicting treatment recommendation at a CAMHS service (left) or any other mental health or neurodevelopmental service (right)



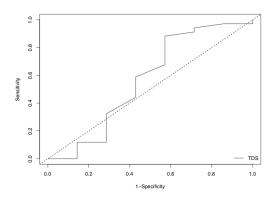


Table 12: The AUC for the SDQ-S TDS from young people (n=41).

	Treatment recon	nmendation
	CAMHS	Any MH
Area under the ROC curve (AUC)	0.568	0.565
Standard error	0.112	0.157
95% Confidence interval	0.348 - 0.787	0.258 - 0.872
z statistic	0.603	0.416
Significance level P (Area=0.5)	0.547	0.678

Estimation method is DeLong (1988).

Optimal cut-off points.

In order to identify the optimal cut-off point, sensitivity and specificity for SDQ-S TDS in predicting CAMHS treatment were calculated for possible cut-off points. This analysis is presented in Table 13.

Table 13: Receiver Operating Characteristics Analyses for the SDQ-S Total Difficulties Scale from the teacher report sample.

CAMHS treatment								Any MH treatment						
TDS	Sens	95% CI	Spec	95% CI	PPV	NPV	+LR	Sens	95% CI	Spec	95% CI	PPV	NPV	+LR
8	.86	.68, .96	.25	.06, .57	.74	.43	1.15	.88	.73, .97	.43	.10, .82	.88	.43	1.54
9														
10														
11														
12														
13	.79	.60, .92	.42	.15, .72	.77	.46	1.36							
14														
15	.62	.42, .79	.58	.28, .85	.78	.39	1.49	.59	.41, .75	.57	.18, .90	.87	.22	1.37
16														
17	.52	.33, .71	.67	.35, .90	.79	.36	1.55							
18	.35	.18, .54	.75	.43, .95	.77	.32	1.38	.32	.17, .51	.72	.29, .96	.85	.18	1.32
19														
20														

N.B. according to the hand-scoring guidance available on the official Youth In Mind website, scores ≤14 are in the "close to average" range, 15-17 are "slightly raised", 18-19 are "high" and ≥20 are "very high".

Again, in considering this data, it is important to bear in mind that this is a smaller sample (*n*=41) and the statistics reported have large confidence intervals. Giving equal weight to sensitivity and specificity (Youden's Index), the optimal cut-off value for predicting CAMHS treatment would be 13. This would yield a sensitivity of .79 (95 % CI: .60, .92) and specificity of .42 (95% CI .15, .72). The optimal cut-off point for any mental health or neurodevelopmental service would be 8. This would yield a sensitivity of .88 (95% CI: .73, .97) and a specificity of .43 (95% CI: .10, .82). Using the service cut-off point of 15 would yield a sensitivity of .62 (95% CI: .42, .79) and specificity .59 (95% CI: .41, .75) for CAMHS treatment and a sensitivity of .59 (95% CI: .41, .75) and specificity of .87 (95% CI: .18, .90) for any mental health or neurodevelopmental service. This would mean that approximately 2 in 5 children requiring mental health treatment would be missed. It would not be possible to obtain sensitivity ≥90 (so that fewer than 1 in 10 would be missed) from these data.

Qualitative stage

A Thematic Analysis identified four themes in relation to the use of the SDQ as a screening tool for referrals to the Targeted Team, as illustrated in the map below.

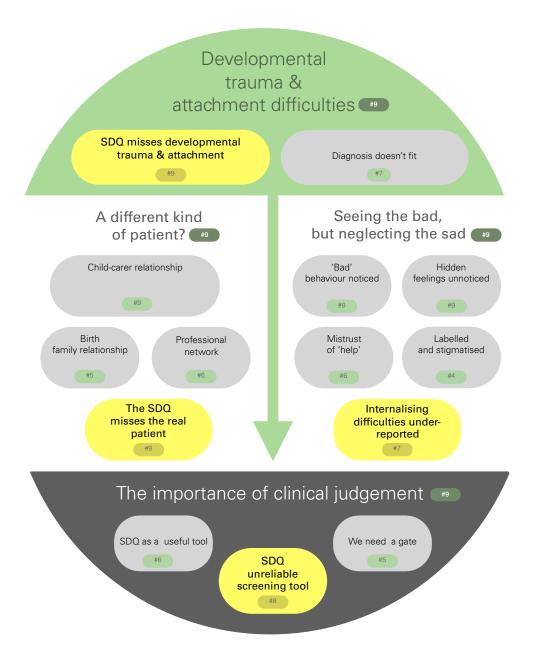
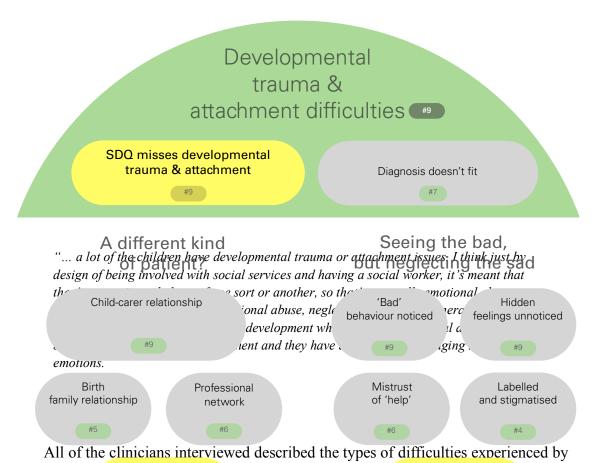


Figure 9: Thematic map. #=n. of clinicians associated with theme. Key subthemes directly relating to the SDQ are highlighted in yellow.

The first theme, *Developmental trauma and attachment difficulties*, led to the second, *A different kind of patient?*, because the SDQ was seen as locating the difficulties in

the child whereas clinicians understood the children's difficulties to be located in the child's relationships, as a result of developmental trauma and attachment difficulties. A third theme, *Seeing the "bad" and neglecting the sad*, described how carers and professionals tended to notice the children's behaviour but often missed their emotional difficulties, which were often masked as a result of Theme 1. This was reflected in the SDQ. The first three themes necessitated the fourth, *The importance of clinical judgement*.

Theme 1: Developmental trauma & attachment difficulties.



children referr misses the real patient g from experiences of difficulties under-reported auma.

The terms "developmental Traum and "attachment difficulties moder to their clients. Features of van der Kolk's proposed diagnosis of Developmental Traum ere widely featured in clipitations of the

unreliable screening tool

SDQ as a useful tool

We need a gate

children they worked with, including a) exposure to developmentally averse interpersonal trauma, b) patterns of repeated dysregulation (particularly affective, behavioural and relational), c) persistently altered expectations (most prominently distrust of caregivers and professionals from health and social care) and d) impairment in everyday functioning.

Clinicians' descriptions of their assessments of children's mental health, and the basis of their decision-making about whether children required treatment for their mental health, covered these domains, with a particular focus on exposure (via developmental histories) and current functioning (particularly in their caregiving contexts and educational settings).

"...the description of their past experiences and the trauma that they had experienced, or the experiences that they'd had in relation to, you know, perhaps early experiences or recent experiences, was such that you would expect there to be some emotional impact on that child that warranted at least meeting with them to think about, are you okay?"

Clinician 6

However, a minority of children seen by the team were not described in these terms. In these cases, the clinicians saw their role as providing reassurance to the adults in the child's life that the child was coping with their experiences.

"...my bottom line is I actually do think that some children, despite having awful experiences, that there's something within them intrinsically that they do do okay, you know? Yeah and... that they're actually managing okay despite those difficulties and it's usually the carer... usually the carer more than school, but sometimes school, that actually feel that there needs to be... that they have to had been affected."

Clinician 6

While almost all clinicians embraced the terms "developmental trauma" and "attachment", one expressed scepticism towards these concepts.

"I guess that it had been decided that the children had suffered a significant trauma. It's always good to get that word in somewhere I think even though I don't know sort of useful it is... trauma."

Where specified, attachment difficulties were broadly defined in terms of the ABC-D classification system (Ainsworth 1978, Main 1990), with disorganised and avoidant categories most commonly described. Means of assessing attachment and relational difficulties, directly and indirectly, were also described. Some clinicians suggested that these difficulties might not be immediately observed, but might emerge over time:

"I'm talking not first session but on a number of sessions, impression about certain behaviours which sparks certain function either to elicit care giving or certain interactions with the foster carer which might give impression that this child is very anxious - anxiously attached or disorganised, kind of not making much sense of how - of a stable element of care-seeking from the carer. Being kind of worried for instance if the carer might... or not worried if the carer goes out the room or not worried much about the carer's presence at all, or things like that, I think which... I find probably any questionnaire would find it hard to capture."

Clinician 3

A subtheme, *Diagnosis doesn't fit*, was identified; this described a poor fit between the types of mental health difficulties presenting to the service and the diagnostic classification system. Several clinicians explicitly stated that a psychiatric diagnosis was not a requirement for using the service or commented that the diagnostic classification did not adequately describe the types of difficulties experienced by service users. In this way, these children's difficulties were viewed as distinct from those seen in mainstream services.

"...in other parts of CAMHS [...] they've got a more definable clinical problems, so depression looks more like kind of 'classic depression' – I'm doing inverted commas on tape. It looks more like when people are withdrawn, flat, feeling hopeless and that might be having an impact on them at school but generally speaking in terms of relationships they're functioning okay whereas the young people that were seen in the targeted team were having problems that were kind of rooted in their relationships – more attachment based problems... and they were having difficulties with sort of angry outburst, sadness that was having more of a widespread effect across the board in areas of their lives."

Clinician 8

Clinicians rarely referred to the difficulties experienced by the children they worked with in terms of psychiatric diagnoses, and never used diagnostic terms without additional

descriptions of children's histories and difficulties. Anxiety, low mood and PTSD were mentioned, but always alongside information about early histories and current functioning. Attachment difficulties were differentiated from attachment disorders, the latter being a diagnostic category.

The most frequently cited criticism of the SDQ was a perceived inability to pick up developmental trauma and attachment difficulties. This important subtheme was described by almost all (n=8) of the participants. It was typically raised during discussions of their general views on the SDQ and its suitability for use with the looked after population.

"In the children that I work with or the team works with, I don't have that much faith in them [SDQs] because I don't think they really capture what the children's difficulties are. They don't really bring out the attachment issues and there's not much scope for developmental trauma issues to be brought up either."

Clinician 1

Some participants drew links between the limitations of the SDQ and the limitations of the diagnostic classification system. There was a sense that the SDQ was viewed as more appropriate for children who fitted more neatly into diagnostic categories.

"I think if you're anxious, you're angry, or you're sad, the SDQs will pick it up, okay, but when you got like internalised trauma, or odd ideas or the inability to sort of work effectively, socially, and all that, it doesn't pick it up very well, not in a way that terribly useful for anybody."

Clinician 2

Limitations of the SDQ in identifying attachment difficulties and features of developmental trauma were also suggested in clinicians' descriptions of the types of difficulties experienced by those children who were accepted for treatment by the team during the study despite scoring in the normal or slightly raised range. Where clinicians felt

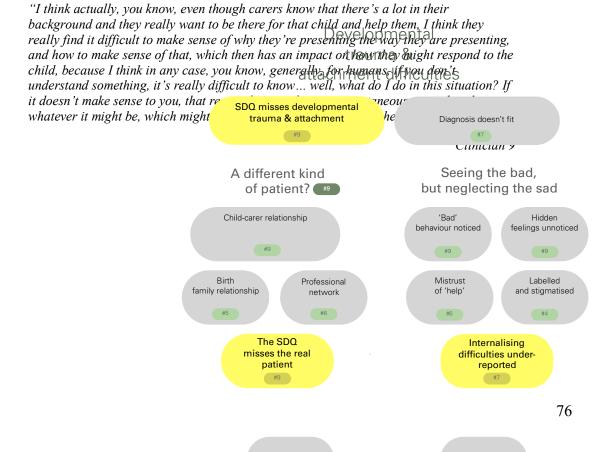
that the SDQ had under-estimated the severity of children's difficulties, complex presentations arising from interpersonal trauma were typically described.

"...really clear attachment difficulties and not being able to get a kind of different relationship with each carer but emotional outbursts, going into a kind of frozen state, enuresis, and distress and like... all trauma and attachment-related stuff. Complex, very complex so... it is interesting how they sometimes don't score very high when you think of the complexity of the case."

Clinician 7 (describing child scoring in the slightly raised range)

In summary, this theme described how clinicians understood the difficulties experienced by children referred to the team in terms of *Developmental trauma & attachment difficulties*. These difficulties were not viewed as fitting easily into diagnostic categories. Clinicians broadly agreed that developmental trauma and attachment difficulties were not well described by the SDQ.

Theme 2: A different kind of patient?



SDQ as a useful tool

SDQ unreliable We need a gate

Given the emphasis on the adverse impact of early interpersonal trauma and attachment difficulties, it is perhaps unsurprising that clinicians were more likely to describe the child's problems as located in the context of the child's primary relationships, rather than as a pathology located within the children themselves. Clinicians, therefore, found themselves with a *Different kind of patient*; their "patient" was not the child but the child's closest relationships. Most commonly, clinicians described their primary patient as the relationship between the child and their foster carer.

"I think broadly speaking, there were emotional difficulties in a context of trauma, developmental trauma and attachment, which is most of the cases, complicated by difficulties within the environment of the LAC [Looked After Children] caring system, i.e. carers being not attentive enough or not sensitive enough to help them regulate the difficulties or help them to cope with the difficulties, and in some cases increasing elements of mental health risk..."

Clinician 3

In this respect, the team's shared formulation of mental health difficulties appeared similar to infant mental health models, where the identified "patient" is the relationship between infant and caregiver (Sameroff, 2004), rather than the diagnostic models evident in mainstream CAMHS settings. This theme was explicitly or implicitly described by all of the clinicians.

"...anything that you see, any behaviour, it takes two... you know, there's an interaction between two people and it's... the other person's behaviour that then interacts with or...I don't know, has an impact on the child's behaviour."

Clinician 8

The view of the patient as the child's relationships was sometimes described as at odds with the views of other professionals in the children's lives, who located the problem in the child, and thus expecting a more individual approach.

"I think people have an idea that what's required - even now they have an idea and that's sort of... Anyway, they have an idea that... Basically what needs to happen is that the child needs to be seen by somebody who can fix them. That's the model really."

Clinician 4

Clinicians described the child-carer relationship, and particularly risk of placement breakdown, as a key area of assessment and an important factor in the decision to offer treatment. They occasionally referred to direct therapeutic interventions targeted at children as individuals, such as CBT for anxiety, but primarily described psychological interventions designed to improve the child-carer relationship. Therapeutic work with carers to help them to increase their understanding and acceptance of children's difficult behaviours was most commonly described, and work with child-carer dyads was also featured.

"I think it's a contribution to the people being able to think and reflect, and feel their way into things, and then sort of trying to work out what the child is feeling and how that affects them and how that affects the children. That sort of process is going all the time and it's very, very hard work."

Clinician 4

Changes in the quality of the relationship between carer and child were viewed as a valuable outcome, even where children's presentations had not changed during the course of the work

"What we find often happened with our sort of service is that a child might not really change that much but their understanding changes and the foster carer's understanding of the child's difficulties changes and shifts and, so there's maybe a bit more acceptance and a bit more of a connection between them."

Clinician 5

There seemed to be a shared belief that this focus was a more efficient use of the team's resources and was more likely to lead to changes in children's developmental trajectories over time:

"I often tell families, it's a bit like watching a plant from a seed, you put your seed in the earth and you start watering it, and you keep looking at it every day and nothing happens, you think that's it, nothing's happened. You carry on watering it, eventually, something start poking through, and a lot of interventions we might do, we don't get to see the benefit of."

While the child-carer relationship was the primary area of focus, work with birth family relationships was also mentioned by some clinicians. This was particularly evident where reunification was planned.

"... the whole case was in a process of a significant change, meaning that the order was being revoked, so the child was unbecoming looked after and becoming going back to the parents. So that's a significant event. There are questions around how the child might feel split loyalties, there are questions around this child feeling the loss of the foster carer, as well as longing for rekindling the relationship with the mum who hasn't been in this child's life for the last two years or so and so. So there's been little kind of incidents around behaviour..."

Clinician 3

Supporting other professionals in the child's network, commonly social workers and teachers, in managing and co-ordinating their relationships with the children was also described.

"...sometimes the social workers come in and really value the space to discuss and just to sort of sometimes offload like their own sort of views on the case or their confusion about the case. Sometimes there's quite a lot of chaos..."

Clinician 5

Because clinicians primarily viewed their "patient" as the child's relationships, rather than the individual child, many expressed a view that the SDQ had limited value because it looked for difficulties or problems in the wrong place.

"The SDQ doesn't include items that focus on how children relate to other people, so how children relate to adults, are children able to accept care? So, some of the difficulties that specifically stem from adverse childhood experiences that were really impacting on children's placements, so children being very controlling, trying to keep control and being very adult in their presentation, not being able to kind of tolerate boundaries from adults. Those kinds of things are not well-captured on the SDQ... but were underpinning quite a lot of the instability in placements and things that we were seeing."

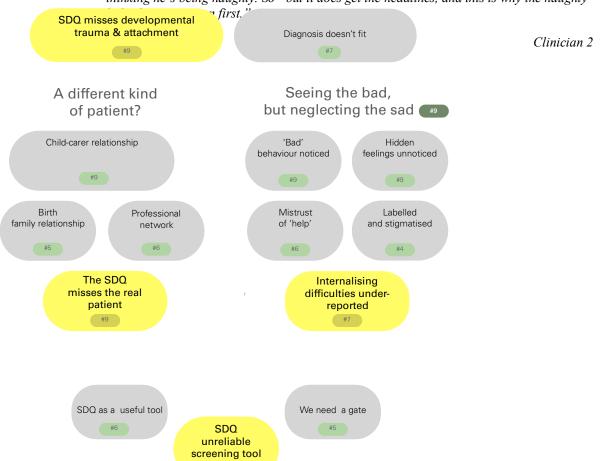
Clinician 8

As a result, SDQ scores may fully or partially miss the child's difficulties, both at assessment and at follow-up if used as an outcome measure.

"I think sometimes when people look at the difference in scores, they might not see a lotand that's what commissioners look at - but actually, there's been a lot of positive changes. There's been... the placement hasn't broken down because actually the carers have got a bigger understanding and they can then change or adapt how they might approach the child because of that understanding." There was a sense that a measure of the child's relationships would be useful. Alternative measures focussing on the carer-child relationship and the carer's understanding of the child were suggested, including the Outcome Ratings Scale (Miller, Duncan, Brown, Sparks, & Claud, 2003), the Parent Reflective Functioning Questionnaire (Luyten, Mayes, Nijssens & Fonagy, 2017), and the *Thinking About Your Child* questionnaire (also known as the Carer's Questionnaire; Wassall, Golding, & Barnbrook, 2011).

Theme 3: Seeing the "bad" and neglecting the sad.

"Some people will show you that they're feeling frightened or insecure by wrecking their room or punching somebody, and others just retreat into themselves. But they may be having similar level of what was going on internally, but from the way that professionals react, it's quite different, because people tend to go down this conduct route for that sort of thing, apart from the running away maybe, and look at it as them needing to learn to behave properly rather than thinking about well is it something to do with the way they feel. Or some people will say, yes, it's obviously something to do with the way they feel, but can pay her to be have properly, because at the back of my mind, they're still thinking he's being naughty. So - but it does get the headlines, and this is why the naughty



#8

Looked after children seen by the service were typically reported to have been referred for behaviour that was causing problems for their carers, schools and others.

Aggression, defiance and expressed anger were noticed and responded to by the professional network. Clinicians however conceptualised these difficulties as symptoms of emotional, relational and contextual difficulties, rather than discrete problems. Much of their therapeutic work with carers was described in terms of helping them to understand the feelings hidden beneath the behaviours.

"I would imagine that at times, carers get into internalising the behaviour directed towards themselves, whereas actually if they externalised it and thought about actually what's going on, what's triggering this, you know, but it's easier said than done, isn't it? When you're trying to live your life and go on and do things and you can't always be that reflective..."

Clinician 1

Some clinicians (n=4) described stigma and labelling as difficulties affecting the looked after population. There was a perceived tendency or requirement to attribute pathologising labels to children and families in order to gain access mental health services.

One of the bits of language might be... um, I don't know, 'sexualised behaviour,' in quotes, or it might be 'attachment disorder' or it might be -I don't know - 'behaviour conduct disorder', 'behavioural problems'. And what those things do, I think, is that all sorts of ideas like those things and lots of other things too, they get stuck to looked after children in a way that these things do not get stuck to other children. And so in a sense, what you end up with is a child who's almost unseeable, invisible, behind all the stuff that gets stuck to them. And I think that that means almost everything that they do and say is sort of seen through the lenses of those particular kinds of sticky things that are stuck to them and the particular sorts of languages that get used about them.

Clinician 4

The SDQ was identified as contributing to this with predominantly negative statements that located difficulties within the child, via statements that were viewed as making assumptions and value judgements. There was concern that the negative tone of some of the statements might feed into negative self-beliefs and children feeling that they are to blame for their difficulties.

[&]quot;I feel like it can be quite blaming... it, you know, it puts a lot in the child and doesn't think about how we might make sense of it."

Clinician 9

"...I think one of the things to me is when I first saw it – and even before coming into this team, and I used to use it in tier 2/3 CAHMS – is sort of like the negativity of the statements. I think when people – young people especially – sort of read it for the first time, it's quite disheartening because it is about problems. It's not about what are they managing and what they are able to do..."

Clinician 1

While behavioural difficulties were commonly reported, emotional difficulties that were internalised by children – which did not cause overt disruption at home or school - appeared more likely to go unnoticed by the adults in the child's life.

"...we've got young people that would maybe kind of repress their sort of thoughts and their feelings and sort of really internalise it, so they become really withdrawn, and there are other people that would maybe like act out like through behaviour and... So that's maybe seen as being kind of worse or seen as being more problematic, whereas the sort of more withdrawn young people might not kind of show up on somebody's radar..."

Clinician 5

Almost all clinicians (8/9) described or gave an example of the SDQ missing internalising difficulties in children that were later seen by the team. SDQs from carers and teachers were typically described as more likely to report difficulties with behaviour, hyperactivity and concentration, while emotional difficulties, which might be more difficult to spot, were often under-reported by the adults in children's lives. This was partially attributed to the adults not recognising children's inner worlds, but also to the design of the SDQ questions.

"So this child who's in the fight or flight mode is sort of really acting out and would really probably show up on an SDQ because it'll be like all there – everything's externalised, whereas a child who's actually quite withdrawn and compliant, they might not really come up on that but actually there's a lot to be a bit worried about with them, so yeah, it's something like that. I think it's not always that well-suited to."

Clinician 7

There was also a view that the children themselves may not notice or attend to their own sadness. They may never have learnt to - or felt safe enough to - recognise their feelings.

"...they haven't had that significant primary caregiver who they can build a consistent, attuned, you know, regulating, co-regulating attachment with and it's only after that co-regulation occurs that they can then start to understand and make sense of their own feelings through the other. And I think a lot of these children haven't had that in their early life, which means at a later stage or however old they are, when they come into care, they usually can't make sense of their feelings, you know?"

Clinician 9

Conversely, some clinicians stated that some of the young people with scores on the "close to average" or "slightly raised" range on the SDQ-S had reported internalising difficulties in the clinical range on the emotional symptoms subscale. However, because they reported lower levels of difficulty on the conduct, hyperactivity and peer subscales than their parents or teachers might report, the total difficulties score had not reached the clinical threshold.

Another subtheme identified that looked after children might have developed a mistrust of professionals such as social workers and clinicians, as well as caregivers. These children's relationship to help (Reder & Fredman, 1996) – that is, their attitudes and beliefs towards so-called "helping" systems – were understood by the participants in this study to originate from their experiences of care in their birth families and in the child protection and local authority care system. This mistrust was viewed by clinicians as a barrier to children having their emotional needs recognised and supported.

"I guess...some of them do ...they...I don't know, they [looked after children referred to the Targeted Team] don't trust services and things and some of them have been told don't talk, don't say anything, and don't, you know, talk to like social workers or professionals and things like that and so there might be that kind of element to it, that they don't want to let on actually, you know, be honest. They might think they're not...we're not going to listen anyway and there's not always that much trust..."

[&]quot;...what particularly strikes me is - they [looked after children referred to the Targeted Team] would always underplay problems because of the fear that if the problems were too much, the foster carer will say, "No, I can't handle this," and then that would be it, off they go and somewhere else. So it's a sort of, play the "I'm doing all right," card, they can fool people quite a long time usually, but unfortunately, it goes wrong in the end.

Most clinicians (7/9) stated that they considered the possibility of under-reporting by young people when reviewing the SDQ-S. Mistrust of carers and professionals was the most common reason identified by clinicians for this under-reporting on the SDQ-S. Minimising and hiding emotional difficulties was also thought to contribute to carers and teachers under-reporting of internalising difficulties on the SDQ-P and SDQ-T.

"...for a child's SDQ, I would factor in for such as, is the child underreporting certain concerns or over reporting strengths or kind of normal, normally expected answers to the questions - for various reasons you know it might be, you know, just wanted to be seen as normal or just want to please the parent or the carer, which is a common dynamic in looked after children, um, or just not knowing whether, you know, reporting it honestly might lead to something bad for the child. So there's that element for the child, over reporting or underreporting, which obviously automatically will come up in the scores."

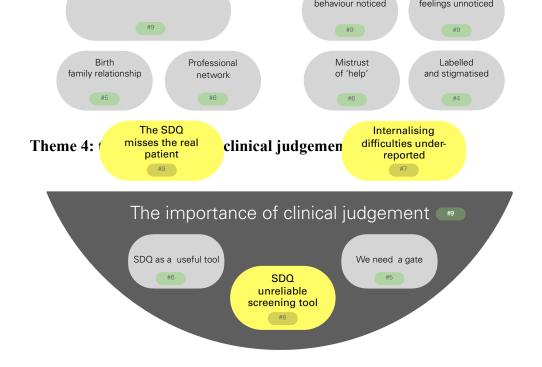
Clinician 3

"He minimises stuff. He's actually said before though that he just ticks whatever because he just thinks people won't help anyway so I think it's that lack of trust in professionals and services and adults and that kind of defeat, I suppose. Like...and...yeah, just thinking you're not going to help anyway, yeah."

Clinician 7

As a result of initial under-reporting, some clinicians described how an increase in SDQ scores over the course of therapy might actually represent positive progress in therapy. This was because young people might be more willing to report their symptoms honestly as the therapeutic relationship developed.

"If you're filling the questionnaire then it might look like she sort of deteriorated but actually, there's been a bit more sort of honesty with her. She's kind of, 'Oh well, nothing's changed' but, actually, 'when I fill this questionnaire in before, I didn't fill it in honestly, I just sort of just put what maybe what I wanted it to be like or what I thought you wanted to hear."



"It [the SDQ] gives us a sense that we sort of know what we're doing... but it's a false sense I think, because mostly we don't, and that's fair enough. We don't and we probably shouldn't because it's complicated and difficult, and it should be. These things [SDQs] try to reduce, don't they? They're reductive. They try to reduce the complexity of the things that we're doing because it's too much for us, and of course- so it's an attempt in a way to reduce the anxieties that we experience about the work that we do, in one way of thinking about it."

Clinician 4

Given the complexity of the difficulties affecting children, their carers and families, and the networks around them, clinicians described *The importance of clinical judgement* when making decisions about whether treatment should be offered. Clear criteria for accessing the service were uniformly described: children should have a social worker, a score of 15 or more on the SDQ, and mental health difficulties that did not meet threshold for Tier 3 CAMHS. However, all clinicians described using clinical judgement to over-ride the SDQ score requirement where other evidence in the referral suggested that the SDQ might be under-estimating the level of difficulty.

"[The SDQ] is used, but it's not used in isolation, but it is used as a ... I wouldn't say guide. It's used to aid your clinical judgment of the information that you're getting. You know, does it make sense with the information that you've been given? Doesn't it make sense? So, for example, occasionally we will accept them if they're lower because actually, the information written really very clearly shows that this child or, you know, this family is in distress and there's clearly a mental health component. It doesn't show on the SDQ, but it's very clear so... so they don't match up, but actually, the risk factors are enough... written down that... yeah, that we'll respond so..."

"I would certainly not rely only on the questionnaire to make a judgement as to the difficulties of looked after children. It might be enough to give a basic indication as to whether concerns are present of an emotional, behavioural, conduct nature, but I wouldn't use it as a main too-... I wouldn't use it as a clinical guidance on saying, yes, this case definitely is not... or this child or looked after child is definitely doesn't need the service for mental health."

Clinician 3

Clinical judgement was deemed necessary because the SDQ was not felt to be a reliable screening tool for this population. Single-report SDQs were frequently described as subjective or inaccurate. Comprehensive assessment, including accounts from multiple sources in the child's life, was deemed particularly important because of the complexity of the difficulties experienced by children, their carers and networks.

"You know, things aren't as straightforward as how an SDQ makes out it is. I don't think it works as a screening tool. I think there's a lot more to the physical things that we see and the symptom-like things that we see. There's a lot more in terms of the relationships, the carers, the school, you know, everything. It's so multi-dimensional that an SDQ isn't going to capture that. I think... yeah, no, I really don't think it works as a screening tool for our service."

Clinician 9

When used in conjunction with clinical judgement and comprehensive assessments, however, the majority of clinicians (n=6) agreed that the SDQ could be a helpful tool, particularly when more than one informant had completed an SDQ.

It's helpful. It's a very helpful tool I think, and especially helpful when there's these differences I say between one person scoring high and others scoring low, you know it makes you wonder what the difference is about and you can go and explore that. And the same with probably most other questionnaires.

Clinician 3

"...if the carer's scoring this and you know, they're considerate of other people's feelings, they, you know, they're not restless, they're all relaxed, all of that, you would hope that the carer would be able to think... well actually, they are doing okay, and if they wasn't able to, you'd have to have a conversation with them about, well actually, if you would just look at this, their strengths are pretty good, you know? So sometimes it can be a helpful tool in that respect."

Clinician 6

The SDQ was also deemed more helpful when administered by the clinician as part of a conversation, rather than submitted with referrals. Another advantage highlighted was that

the measure is commonly used by social care and other CAMHS services. However, three clinicians stated that they did not find the SDQ useful and did not use it, or only used it because they had to.

The majority of clinicians described the SDQ as playing a role as a gatekeeper to services. In this role, the SDQ was described as a necessary barrier to prevent the service from being overwhelmed with referrals.

"I wouldn't have put a huge amount of weight on the score alone, but I think as a team, we try to because we had to have this gate. There had to be a line somewhere in terms of managing referrals."

Clinician 8

"So any other parts of the service, they would do the SDQ at the choice appointment so they would triage referrals in a slightly different way to how we do it but we just felt because there was a possibility or likelihood, we would get so many referrals when the service started that we needed some sort of screening mechanism."

Clinician 1

However, there was also a suggestion that this gate was not wholly effective. Carers and professionals might over-report in order to gain access to the service, while expectations of service provision might be raised if children met the criteria.

"it kind of makes me suspicious that the carers and teachers would maybe do the opposite and almost like over-... or perhaps sometimes overly sort of described things, especially the things that they look at and think are the key things that might get service. Kind of makes me a bit cynical, they're kind of, "how do we get a service here?" or "how can we get over the number of things"

Clinician 5

"I think there's a myth in social services that if it's 15, that automatically means that they've got mental health needs, and it doesn't. You know, that's ... that's just a guide to suggest that actually you need to think about what's going on for this child."

Clinician 6

Two clinicians suggested that some children who needed support with their mental health but whose difficulties were not accurately represented by the SDQ might miss out on support. This was due to pressure to stick to the service criteria, as a result of limited

capacity and significant demand for services. However, they also listed efforts to ensure that this did not happen, such as holding consultations and drop-in clinics.

"It kind of sometimes feels like we're tied down to that criteria and whether we've got permission to kind of screen somebody and say and accept a referral that is less than 15. So I think those kinds of ... I don't know whether to call them politics or whatever they are, those kinds of questions arise that I can imagine people are sometimes missed because of it. Um... It all depends on the clinician, about what's being looked at, what's not being looked at, but I can imagine that... you know, because a referral can only hold so much information. So a lot of it is done by the SDQ, so yeah, no, I can imagine actually a lot of children are missed because of it, because they don't score higher."

Clinician 9

"I suppose it [the service requirement for a score of 15 or more on the SDQ] would've potentially been on people's minds because, in terms of sort of pressure for throughput and pressure to kind of maintain a manageable caseload would sometimes feel like we're looking for reasons not to offer a service and that may well have been one of them. And I'm sure in some cases, that did happen..."

Clinician 8

Another clinician described pressure from non-clinical managers, who did not appreciate the SDQ's limitations.

"I think that the problem is people who are non-clinical see them as, er, a sort of gospel. "Oh, this says that, therefore it must be so." It's dangerous, and it's dangerous in a sense that operational managers, because they are not clinically based, will think no, it's 15 or bust, and yet the evidence is that actually there's quite a serious problem going on, and although they scored under 15, you've still got to see them."

Clinician 2

Although the quote above explicitly mentions danger, concerns about the consequences of failing to offer treatment to children who needed help were rarely articulated. However, one clinician did mention possible adverse outcomes for looked after children, including mental health difficulties beyond childhood, prison and suicide.

Unfortunately, Government data on outcomes for care leavers (National Audit Office 2015) suggests that looked after children are at increased risk of adverse outcomes, and such concerns – coupled with a lack of confidence in the SDQ as a screening tool – may explain

clinicians' willingness to offer a service to children with mental health needs even when their SDQ scores do not reach the service requirements.

Discussion

Overview

This study aimed to further understanding of the utility of the SDQ as a screening measure for mental health difficulties in looked after children. It also aimed to understand why some looked after children's difficulties were not identified by the SDQ. It was hoped that the research could contribute to decision-making about the future role of the SDQ in screening and monitoring mental health difficulties in looked after children.

This chapter will re-orientate the reader to the study's research questions, and summarise key findings, in the context of existing literature and relevant government policy. The study will then be evaluated using two quality checklists, the CASP Diagnostic Checklist and Elliot, Fischer and Rennie's (1998) Evolving Guidelines for reviewing qualitative research. Strengths and limitations will be presented. Implications for policy and clinical practice discussed, and suggestions for further research are outlined.

Review of research questions

The study aimed to answer the following questions:

- How well does the SDQ perform in identifying looked after children whose mental health difficulties require treatment in referrals to a specialist LAC mental health team?
- How do clinicians understand the reasons why some looked after children's mental health difficulties are not identified by the SDQ?

Key findings in relation to the research questions will now be discussed.

Summary of findings

Research question 1

How well does the SDQ perform in identifying looked after children whose mental health difficulties require treatment by a specialist LAC mental health team?

In the study sample of 144 children referred to a specialist LAC mental health team, the performance of the SDQ varied according to the informant. The parent/carer report SDQ (SDQ-P) predicted children who required CAMHS support with low accuracy (AUC = .62, z=1.98, p <.05), and performed no better than chance in predicting children who needed any type of mental health or neurodevelopmental service (p >.05). Using the Total Difficulties Score (TDS) of 17 (which is the cut-off point for a "high" score, according to Youth in Mind, 2016), approximately 1 in 3 children's mental health needs would be missed (sensitivity = .67, 95% CI = .53, .78 for CAMHS, .62, 95% CI = .51, .73 for any mental health service), and approximately 2 in 5 of those identified would be false positives (specificity = .57, 95% CI = .40, .73 for CAMHS, .60, 95% CI = .36, .81 for any mental health service).

The sample here differs from others in the literature review because it only includes children referred to a Tier 2 CAMHS service, and not a general LAC population. Lehmann *et al.* (2014) reported the highest SDQ-P accuracy for any of the published studies; this may indicate positive differences in the training and education of foster carers in Norway or could be explained as an outlying result. It is interesting to note that the SDQ-P sensitivity reported in the present study is better than that reported in Goodman *et al.*'s (2004) study (.51 for children aged 5-10 and .60 for 11-15s), which has been described as evidence that the SDQ is a is a "good" and "valid" screening measure for looked after children (Goodman & Goodman, 2012). Goodman *et al.* (2004) state that sensitivity is "likely to be of particular importance in deciding whether the screening efficiency is adequate to warrant a formal trial

of screening" (p.28). Large numbers of false negatives, indicated by low sensitivity, is of particular concern because of the risk of adverse outcomes for these children if opportunities to intervene are missed. Therefore, the levels of sensitivity reported in the present study, and elsewhere in the literature, are likely to be inadequate if the SDQ is being used as *the only* assessment of vulnerable children's mental health, in routine screening and in enabling access to Targeted CAMHS. Low specificity also has important implications for mental health services, and it is therefore surprising that Goodman *et al.* (2004) chose not to report this in their paper.

As previously stated, the utility of the SDQ-P has particular importance to children in England because it is the only measure routinely used to assess children's mental health at entry to care and annually, as a statutory requirement (Department for Education & Department of Health, 2015). The evidence presented here, and in the literature review, does not support this policy, and no evidence of the "formal trial" of the screening suggested by Goodman et al. (2004) has been identified. Given the importance of this issue, further research is needed to assess the utility of the SDQ-P as a screening tool in a whole LAC population (rather than a subsample of Tier 2 CAMHS-referred LAC), as discussed below.

The teacher-report SDQ (SDQ-T) performed much better in this sample, predicting children who required treatment from CAMHS (AUC .81, z = 4.57, p < 001) and any other mental health service (.74, z = 2.81, p < .01) with accuracy in the moderate range. A TDS cut-off score of 17 would miss approximately 1 in 5 children in need of CAMHS treatment (sensitivity = .79, 95 % CI: .58, .93), while approximately 1 in 5 would be wrongly identified (specificity = .79, 95% CI .44, .90). However the sample was small (n=42), and the confidence intervals are large, so caution is needed here. Only 29 percent of the children

referred to the service had an SDQ-T, so it is necessary to consider why teachers might find time to complete the questionnaire for some children and not others. It may be that teachers are more inclined to complete SDQ-Ts and seek support for children who display the types of difficulties that have been found to be more accurately captured by the SDQ, such as hyperkinetic disorder and ADHD (Goodman *et al.*, 2004), which is likely to cause more problems in a classroom than emotional difficulties (as defined by the SDQ). The literature review found the greatest variation in the performance of SDQ-T, with sensitivity ranging from .33 (in the only sample where children were comprehensively assessed by specialist LAC clinicians, Milburn et al. 2008) to .95 (for Norwegian teachers, compared to diagnostic interviews). Further research is needed to draw conclusions about the utility of the SDQ-T.

As in the existing literature, the self-report SDQ performed poorly in this study. AUROC analyses found that its ability to predict recommendations of treatment by CAMHS or any mental health service was no better than chance (p > .05). Again, this was a small sample (n=42) with large confidence intervals. However, the results are consistent with Goodman's (2004) study, which also found that the SDQ-S performed considerably worse than parent and teacher report versions, reporting a sensitivity of just .16 at the probable cut-off¹⁴. Reasons why there might be a particular difficulty in the use of the SDQ-S in a population of looked after children were explored in the qualitative part of the study, and are summarised below. It is interesting that Milburn *et al.* (2008) reported a better performance for the SDQ-S (sensitivity .61, specificity .92, at the borderline cut-off), as in their study the

¹⁴ According to Goodman, Renfrew & Mullick, the SDQ algorithm predicts that a disorder is "probable" on the basis that the relevant symptom score (on the conduct, emotional or hyperactivity subscales, or total difficulties score) was above the 95th centile and the impact score was two or more. Based on the old hand-scoring information for the SDQ-S (Youth in Mind, 2016), as would presumably have been used at that time (this is not specified), this would require scores on the subscales as follows: emotional =>7, behavioural =>5, hyperactivity =>7 as well as two "quite a lot" answers on the impact questions, or one "a great deal" answer.

SDQ-S was administered by LAC clinicians as part of a comprehensive therapeutic assessment involving up to 4 sessions with the child. It's not clear how or at what stage in this process the SDQ-S was administered, but it may be that clinicians involved in a wider assessment of the young people's needs were better able to support them in completing the SDQ, and/or to make them feel more comfortable in disclosing their difficulties. In the present study, SDQs were administered by social workers and submitted with referrals, in line with Government guidance on promoting the health and wellbeing of looked after children (Department for Education & Department of Health, 2015). In the qualitative interviews, several clinicians indicated that they would prefer to be able to support young people in completing the self-report SDQ, rather than receiving completed SDQs with referrals. Nevertheless, there is clear evidence here and in the literature that the SDQ-S should not be relied upon alone to identify mental health difficulties in looked after children.

Overall, in this study, the performance of the single-report SDQ in identifying mental health difficulties in children referred to a specialist LAC team was inadequate. The study provides evidence that clinicians in the Targeted Team were routinely over-riding criteria for accessing the service, which specified that children should have an SDQ score 15 or more at referral, and were offering treatment to children with lower SDQ scores. The second phase of the study sought to better understand the reasons for this.

Research question 2

How do clinicians understand the reasons why some looked after children's mental health difficulties are not identified by the SDQ?

The second phase of the study sought to understand why some looked after children's mental health difficulties were not identified by the SDQ. The results of the thematic

analysis suggested that clinicians understand the reasons for this as follows. First, the SDQ is designed to detect common mental health problems and not complex difficulties arising from adverse effects of childhood trauma, which are common in this population and inadequately described by existing diagnostic classifications. Second, the SDQ is looking for mental health difficulties in the wrong patient i.e. in the child, rather than in their closest relationships, which is where the difficulties are likely to be located in this population, as a result of early interpersonal trauma and attachment disruptions. Third, the SDQ misses emotional difficulties, especially where these are internalised, which is common in this population due to stigma and a mistrust of carers and professionals linked to experiences of maltreatment and care proceedings. Fourth, given the complexity of looked after children's difficulties and contexts (see points 1-3), clinical judgement is required in order to make decisions about whether children would benefit from input from mental health services.

1. Developmental trauma and attachment difficulties.

In this study, clinicians reported that developmental trauma and attachment difficulties are commonly found in children referred to the service, and that these difficulties are not always identified by the SDQ. These findings are similar to concerns highlighted by the Expert Working Group for Looked After Children that the SDQ is "unable to detect post-traumatic stress disorder (PTSD), attachment disorganisation and developmental issues such as autism spectrum condition" (p28). Similarly, Milburn (2008) identified PTSD, developmental disorders, and attachment disorders as types of diagnoses missed by the SDQ in children who have recently entered care. Milburn's (2008) study focused on the presence of diagnoses in looked after children, whereas clinicians in this study referred to difficulties that they felt were not adequately described by the diagnostic classification system. As

outlined in the literature review, the limitations of diagnosis in describing difficulties arising from chronic interpersonal trauma in early childhood have also been described by researchers and clinicians (e.g. Cook, 2005; van der Kolk, 2005; DeJong, 2010). It is also important to note that concerns have been raised that clinicians may under-diagnose common mental health problems in looked after children as a result of "quasi-diagnostic overshadowing" (Woolgar 2018) and the 'allure of rare disorders' in maltreated children (Haugaard, 2004).

2. A different kind of patient?

The SDQ looks for evidence of common mental health difficulties in children: in the view of the SDQ, the child is the patient. However, in this study, clinicians were more likely to describe looked after children's difficulties as existing within their relationships; to them, the "patient" was the relationship between the child and their carer (most commonly their foster carer, but also their birth parents, especially where unification was planned, or their professional network – their "corporate" parent). This concept appeared similar to definitions of infant mental health, where the patient is conceptualised as the transactional, reciprocal process between child and parent over developmental time (Sameroff, 2004). In a review of good quality psychological services for children with complex social care needs, Silver, Golding and Roberts (2015) describe supporting the development of an attachment bond between child and carer as a key task for clinicians, stating that "psychological interventions with the systems around the child, especially those providing day-to-day care, are likely to prove most beneficial." (p.123). Theories of attachment and developmental trauma predict that children who have experienced interpersonal trauma in early life will present particular challenges to their carers. Baylin and Hughes (2010) have proposed the term "blocked care" to describe the psychobiological processes by which caregiving capacities are shut down as a result of chronic and acute stress on parenting systems. Caring for traumatised children can

be hazardous for the mental health of carers: an online survey of foster carers found clinical levels of secondary trauma symptoms in a fifth to quarter of respondents (Hannah & Woolgar, 2018). The SDQ may capture aspects of the child's behavioural or emotional presentation, but will not capture the carer's response to it, nor their own wellbeing, nor – as one clinician pointed out in the present study – the child's willingness to accept care. Therefore, the SDQ is not assessing the primary "patient", as viewed by the team.

It is important to note that the focus of Mentalization-Based Treatment for Fostering (MBT-F) – the treatment being assessed through the wider feasibility RCT – is the quality of the relationship between the child and carer (Keaveny *et al.*, 2012). As part of the RCT, half of the clinicians in the Targeted Team completed training in MBT-F and used the model to treat referred children. Therefore, this theme may well have been influenced by the impact of the RCT on clinicians' thinking and practice within the team. However, many other attachment and trauma focused interventions commonly used with looked after children also take a relationship-based approach to intervention (e.g. Blaustein & Kinnisburgh, 2010; Dozier, Stovall & Albus, 1999; Hughes, 2008).

3. Seeing the bad and neglecting the sad.

Clinicians in this study reported that the SDQ is much better at identifying children whose emotional distress and/or trauma responses are externalised, for example, via challenging behaviour. However, it performs less well at identifying children who internalise their distress. This theme is supported by evidence in the literature: for example, Goodman *et al.* (2004) found that carers and teachers were better at identifying hyperkinetic disorders and ADHD than anxiety and depression. Golding (2010) has suggested that looked after children whose relationship style leads them to hide their emotional distress, via excessive self-

reliance, are at particular risk of missing out on the treatment they need from services. She suggests that interagency meetings can help to increase the identification of these types of difficulties, and it may be that the consultations offered by the Targeted Team is helping the team to identify these children's needs, even where the SDQ does not. This is in line with NICE Guidance, which states that commissioners should "ensure that equal priority is given to identifying the needs of those children or young people who may not attract attention because they express emotional distress through passive, withdrawn or compliant behaviour" (NICE 2010).

A prominent subtheme identified a particular problem with children under-reporting difficulties on the SDQ, perhaps as a result of stigma and mistrust of "helping" professionals. This sub-theme is supported by evidence of the poor performance of the SDQ-S in the quantitative part of the present study, which suggests that there is a particular problem with young people self-reporting difficulties on the SDQ-S. Future research should seek views from young people on this topic.

4. The importance of clinical judgement

Clinicians described the importance of clinical judgement when assessing the needs of these complex children. They described a conflict between making space for children's overwhelming complex difficulties and circumstances, while needing a barrier against it to prevent the service from being overwhelmed by referrals. There was a sense of being torn between pressure to make simple, black and white judgements about who was eligible for the service – and who was not – using the SDQ, whilst holding the view that the difficulties affecting these children cannot be neatly categorised using the tools available to them.

Emmanuel (2002) described the "triple deprivation" of looked after children. The first deprivation is the child's experience of maltreatment and neglect. The second derives from the child's "crippling defences" (Henry, 1974), which impacts on the quality of their subsequent relationships, thus cutting them off from potential sources of help (this concept is consistent with themes 2 and 3, described above). The third deprivation occurs when the networks around children unconsciously replicate these defences against anxiety, causing networks to disintegrate and allowing children to fall through the gaps between services.

Music (2009) has linked this triple deprivation specifically to children who have experienced neglect, who "can too easily slip 'out of sight and out of mind'." (p.143.) One of the clinicians interviewed in the present study described the SDQ as an attempt to reduce anxiety in professionals by reducing the complexity of these children's stories. The evidence presented here suggests that although a policy of reducing looked after children's mental health to their SDQ results may have the effect of reducing anxiety in their corporate parents — that is, the local authority and, ultimately, the Government — it also increases the risk of perpetuating a triple deprivation, with children falling through the gaps.

Quality evaluation

The quality of this study was assessed using two quality frameworks. First, the quantitative phase was assessed using the CASP checklist for diagnostic tests (Critical Appraisal Skills Programme, 2018). Although the SDQ is not a diagnostic test, the principles for assessing the quality of these are appropriate to the evaluation of studies of screening measures. Second, the quality of the study was assessed using Elliot, Fischer & Rennie's (1998) Evolving guidelines for publication of qualitative research studies in psychology and related fields, which include some criteria for both quantitative and qualitative research, as

well as some specifically aimed at qualitative research. These evaluations can be found in *Appendix 11* and *Appendix 12*.

Quality review: Critical Appraisal Skills Programme (CASP)

An evaluation of the quantitative phase against the CASP checklist for diagnostic tests is presented in *Appendix 11*. In evaluating the quality of the study, it was important to consider the context in which the present study was conducted. The study formed part of a wider Randomised Controlled Trial, which conformed to all standards set out in the CASP checklist for RCTs. The data utilised in the quantitative phase of the present study was collected for the purpose of screening for inclusion in the RCT, from data that was already routinely collected by the service; it is therefore highly unlikely to have been influenced by the design of the present study, which was conceived after the majority of the data had been collected. It is possible that pressure to recruit for the RCT could have influenced the outcome of assessments of some children who were eligible for inclusion.

The evaluation highlights that the study meets many of the quality criteria recommended by CASP, and where it does not, there are valid reasons for this. Given the available options, the outcome of an assessment of the child's referral by a multi-disciplinary specialist LAC CAMHS team is a valid reference standard, and sufficient information about the study population is included. Appropriate analysis has been conducted and the results are clearly presented, with confidence intervals. The study was conducted within a real-world CAMHS setting, which results in high external validity; however, this is achieved at the expense of internal validity, because only children referred to the Targeted Team, and not all children in the local LAC population, were included in the study. It is important to note that clinicians were not blind to SDQ scores and actively considered them when making a decision on whether to offer treatment. Children were offered treatment despite low SDQ

scores and were not offered treatment despite high SDQ scores, despite SDQ scores of 15 or more being a requirement of accessing the service. This provides important information about clinician confidence in the SDQ.

Quality review: Elliot, Fischer and Rennie (1998)

The present study was evaluated using criteria from Elliot, Fischer and Rennie (1998). These criteria were selected for this mixed-methods study because they include an initial set of seven evaluation criteria shared by both quantitative and qualitative approaches, in addition to a further set of criteria applicable to qualitative research (Elliot, Fischer & Rennie, 1998). The full evaluation can be found in *Appendix 12*.

In summary, the evaluation found that the study provides an important contribution to the literature on the use of the SDQ with looked after children; it addresses a highly relevant and timely question, given current debates over the role of the SDQ in screening for mental health difficulties in looked after children at entry to care and annually. The finding that a substantial proportion of looked after children referred to a Tier 2 CAMHS team have difficulties that are not identified by the SDQ has important implications for clinical practice (outlined below). The qualitative phase adds to this finding by exploring clinicians' views about the reasons why some looked after children's difficulties are not identified, providing important information about the SDQ's limitations when used with this population. The study interviewed a small sample of clinicians (n=9) who worked in or had worked in a single Tier 2 specialist LAC CAMHS team, about their work in that team. Caution is therefore required in generalising findings across other LAC mental health contexts. Care has been taken to include adequate detail about the team and clinicians, to enable readers to make informed judgements about the extent to which these findings might be applicable to their own contexts. Themes are presented clearly and coherently, with examples from the

data. The level of information provided about the author's own perspective is appropriate to the study's critical realist epistemology, and appropriate credibility checks are described.

Summary of key strengths and limitations

Key strengths.

- Provides an important and timely contribution to the literature base on screening for mental health difficulties in looked after children.
- Systematic review presents findings from the literature in an accessible format.
- Reports sensitivity and specificity for a wide range of cut-off scores to enable readers to make informed decisions about the utility of the SDQ as a screening measure for this population.
- Themes from interviews with clinicians help to explain why some children's difficulties are not identified.
- Findings translated into practical recommendations for clinicians and commissioners.

Key limitations.

- Sample of looked after children referred to a Tier 2 CAMHS service, not all
 looked after children in the local authority, so the extent to which findings can be
 generalised to the LAC population is unclear.
- Assessments of looked after children's needs were not standardised.
- The qualitative study focused only on clinicians' views, and not those of looked after children and young people, their carers, social workers and teachers.

 Critical realist epistemology limited the exploration of how ideas about the mental health of looked after children were constructed within the team and wider society.

Clinical implications

In summary, the evidence presented here suggests that the single-report SDQ should not be relied upon as a sole means of identifying mental health difficulties in this vulnerable and high-risk population. The findings of this study, coupled with the literature reviewed here, support for the conclusions of the Expert Working Group that the SDQ "by itself is not an effective way of measuring the mental health and emotional wellbeing of young people" (SCIE 2017, p.7). Therefore, commissioners, managers and clinicians should work together to ensure that referral pathways and eligibility criteria for LAC CAMHS services do not exclude looked after children with low SDQ scores from accessing mental health assessment from a suitably qualified clinician, and appropriate treatment, if there are concerns about their mental health. Consideration should also be given to how services can ensure that children who internalise their distress are equally prioritised, in line with NICE guidance (National Institute for Clinical Excellence, 2010). Self-report measures focusing on internalising difficulties, such as the Revised Children's Depression and Anxiety Scale (RCADS; Chorpita, 2000) and the Child Revised Impact of Events Scale (CRIES; Perrin, Meiser-Stedman & Smith, 2005) may be useful but should be used in conjunction with other tools due to the risk of under-reporting. The Assessment Checklists for Children (ACC; Tarren-Sweeney, 2007) and Adolescents (ACA; Tarren-Sweeney, 2013b), completed by the child's carer, may help to highlight types of internalising difficulties commonly found in children who have experienced maltreatment, such as insecure or anxious-distrustful behaviours or negative self-image.

It is important to recognise clinicians' fears that, in a context of limited capacity and rising demand, removing the SDQ as a "gate" to service could result in a level of demand that they cannot meet. When considering alternative screening measures, it is important that overall accuracy is considered, to avoid overwhelming services with requests for assessments. There is no avoiding the fact that better identification of mental health difficulties in looked after children will result in more children requiring intervention for their mental health difficulties, and there are no easy answers to how already stretched services can increase the number of children they support without additional investment. However, it is important to note that this population is at high risk of adverse outcomes such as leaving school without qualifications, using drugs, going to prison and becoming homeless, and in terms of health economics, greater investment in services for this vulnerable group is likely to pay dividends in the long term (Silver, Golding & Roberts, 2015). If commissioners and Government departments are planning service provision on the basis of single-report SDQ data, in line with statutory guidance (Department for Education & Department for Health, 2015), and epidemiological data that is more than 15 years old, then they may be underestimating the true level of need. Better data on the mental health of looked after children is urgently needed in order to inform service planning. In the meantime, active steps must be taken to avoid perpetuating the neglect of traumatised children who do not demand or expect attention by excluding them from access to CAMHS services. While the data presented here shows that clinicians can and do use clinical judgement to over-ride service criteria, all of the clinicians reported that SDQ scores are a consideration in decision-making, some described pressure to comply with service criteria, and the study did not independently assess the mental health of children who were not offered a service. In addition, we cannot know how many children are not referred in the first place due to not meeting thresholds for

the service, nor how many are turned away at initial contact with the Single Point of Access (SPA).

The findings of this study, and the literature reviewed here, suggest that the SDQ by itself should not be relied upon to identify mental health difficulties in children entering care. Therefore, they provide some support for the recommendations from the House of Commons Education Committee (2016) that children entering care should have their mental health assessed by a qualified mental health professional. Furthermore, given the questions raised here about the utility of the SDQ as a screening tool for looked after children referred to CAMHS, the current method of monitoring the mental health of the national population of looked after children warrants further investigation.

This does not suggest that the SDQ has no utility in LAC services, and indeed the majority of clinicians described the SDQ as providing a helpful contribution as part of a wider assessment. The results presented here suggest that it may be useful to consider additional measures alongside the SDQ, including a measure of developmental trauma and attachment, as well as a measure of the child-carer relationship.

This study formed part of a wider feasibility RCT of a mentalisation-based treatment for looked after children and their carers, the Herts and Minds study (PB-PG-0614-34079). The findings presented here suggest that SDQ scores should not exclude looked after children from participating in research trials for interventions that may benefit them. They also raise questions about the use of the SDQ as a primary outcome measure, because change is unlikely to be adequately captured if initial difficulties are not. Particular questions are raised about the use of the SDQ-S if, as reported in the qualitative study, an increase in SDQ-S

Total Difficulties Scores could represent positive change, because they indicate that the young person feels more able to disclose difficulties. Furthermore, the results of the qualitative analysis highlight the point that inclusion criteria and outcome measures should target the correct patient; if the target of the intervention is the relationship between the child and their carer, then this should surely be the focus of primary outcome measures.

Suggestions for further research

The research presented here raises important questions about the way that LAC mental health is screened and monitored in England. The findings of this study, coupled with limited previous findings, support the SCIE recommendation that the SDQ alone should not be relied upon to identify mental health difficulties in looked after children. Further research is needed in order to make recommendations for a more effective system of screening and assessing LAC mental health. A future study could include all looked after children in a local authority area, with SDQ scores compared with the outcome of a mental health assessment by experienced clinicians who were blind to SDQ scores. An alternative would be to tie this in to an updated epidemiological study of looked after children's mental health in England, which is long overdue. Looked after children and young people's views, and those of carers, teachers and social workers, in relation to the use of outcome measures should also be explored. An important aspect of this could be ethics and consent relating to routine monitoring of looked after children's mental health, as well as the particular challenges of using self-report measures with this population.

Reflections on the research process

As stated in the Introduction, I embarked on this research project with experience of, and an interest in, working clinically with looked after children. I think that this has helped

me to identify the value of the data collected for the RCT and to design a study with very practical implications for clinical practice and Government policy. On the other hand, having a close relationship to the subject has meant that I have had to work harder to ensure that the themes identified were genuinely grounded in the data. It has been particularly useful to be able to draw on a wider research team, with different perspectives, in addition to my supervisors. Consultation with young people with care experience, and input from a second coder, has been invaluable.

Conducting this research has opened my eyes to the need to maintain a curious and critical stance towards the routine outcome measures, service criteria and referral pathways regularly encountered in clinical practice. I wonder how it happens that we find ourselves accepting or learning to work around "the way things are" – without using our training to interrogate the evidence base or collect and publish our own. There have been uncomfortable memories and reflections on my own practice to contend with.

Guidelines from the National Institute for Health and Care Excellence (2013) recognise that "the UK evidence base does not serve the needs of looked after children and young people as well as it might" (p.86). Through this process, I have learned that although it is difficult and time consuming to conduct research with looked after children, it is not impossible. I hope that I am able to take this knowledge forward into my future career.

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Appendix 1:

Proposed Criteria for Developmental Trauma Disorder

(van der Kolk, Pynoos et al., 2009)

A. Exposure

- 1. Multiple or chronic exposure to one or more forms of developmentally adverse interpersonal trauma (abandonment, betrayal, physical assaults, sexual assaults, threats to bodily integrity, coercive practices, emotional abuse, witnessing violence and death).
 - 2. Subjective Experience (rage, betrayal, fear, resignation, defeat, shame).

B. Triggered pattern of repeated dysregulation in response to trauma cues

Dysregulation (high or low) in presence of cues. Changes persist and do not return to baseline; not reduced in intensity by conscious awareness.

- Affective
- •Somatic (physiological, motoric, medical)
- •Behavioral (e.g. re-enactment, cutting)
- •Cognitive (thinking that it is happening again, confusion, dissociation, depersonalization).
- •Relational (clinging, oppositional, distrustful, compliant).
- Self-attribution (self-hate and blame).

C. Persistently Altered Attributions and Expectancies

- •Negative self-attribution
- •Distrust protective caretaker
- •Loss of expectancy of protection by others •Loss of trust in social agencies to protect
- •Lack of recourse to social justice/retribution •Inevitability of future victimization

D. Functional Impairment

•Educational •Familial •Peer •Legal •Vocational

Appendix 2:

Summary of studies in the literature review

Authors & title	Participants	Method	Relevant findings	Strengths & Weaknesses
Callaghan (2004)	45/50 consecutive	SDQs from carer and young	77.78% of children referred to the service and accepted	+Real world CAMHS setting
	referrals; LAC aged 4-	person collected by researcher	for direct work had scores within the clinical range on	-Nature of CAMHS assessment not described
Evaluation of a New	17 in England	following referral.	the carer- and self-rated SDQ version.	-No data on children not offered service
Mental Health Service for				
Looked after Children				
Durluyn & Broekaert	142/166 unaccompanied	Questionnaires completed by	Total difficulties scores on the self-report SDQ	+Only study to investigate unaccompanied
(2007)	refugee children and	social worker or foster parent,	suggested 9.8% were in the clinical range, 21.1% in the	minors
	adolescents living in	and young people aged 12+.	borderline range and 69.2% in the normal range. For	+Used other well validated measures including
Different perspectives on	centres, foster	Measures included Hopkins	carer/social worker reports, the scores were 18.5% in	CBCL, and specific trauma measures
emotional and	placements or alone in	Symptom Checklist-37 for	the clinical range, 10.2% in the borderline range and	-All questionnaire measures from 2 informants;
behavioural problems in	Belgium.	Adolescents, SDQ, CBCL,	71.3% in the normal range. Agreement between self	no other measures of mental health
unaccompanied refugee		Stressful Life Events (SLE)	and social worker/carer report was .20 (Cohen's kappa	-Did not directly compare performance across
children and adolescents		scale & Reactions of	coefficient).	different measures
		Adolescents to Traumatic	By comparison, scores on the CBCL were 25.2% in the	
		Stress questionnaire (RATS)	clinical range, 18.7% in the borderline range, and	
			56.1% in the normal range. On the RATS PTSS scale,	
			scores were 19.4% clinical, 25% borderline and 55.6%	

			normal range. On the HSCL, scores on the anxiety	
			scale were 17.9% clinical, 19.4% borderline and 62.7%	
			normal, and on the depression scale were 32.8%	
			clinical, 14.2% borderline and 53% normal.	
Goodman & Goodman	1391 looked after	Combined data from 3	Each one-point increase in SDQ score among looked	+Large sample.
(2012)	children from England,	surveys of LAC mental	after children corresponded to an increased prevalence	+Appropriate reference standard.
	Scotland and Wales	health, where DAWBA and	of clinical disorder, except for very low scores.	- Insufficient data on accuracy of single-
Strengths and Difficulties		carer SDQ scores were	Graph appears to show a relatively high prevalence of	informant SDQs (no sensitivity, specificity,
Questionnaire scores and		available. Individual-level	mental health difficulties in children under the	ROC).
mental health in looked		analysis involved plotting	published borderline and clinical cut-off points.	-Does not accurately summarise findings of other
after children		children's SDQ score against	When grouped by placement type, groups with higher	SDQ studies.
		the measured prevalence of	mean SDQ scores also had a higher prevalence of	
		disorder for that score.	disorder, (ranging from 31% for children in kinship	
		Population-level analysis	care to 73% in residential care).	
		involved plotting estimated	The SDQ prevalence estimators provided good	
		prevalence by placement type	approximate estimates of these (discrepancies 3–7%	
		against the measured	across our four subpopulations.	
		prevalence of disorder in that		
		subpopulation.		
Goodman (2004)	1028 Looked After	DAWBA & SDQ	Multi-informant SDQs (parents, teachers, older	+Clear study question.
	Children aged 5-17 in	administered to carers,	children) identified individuals with a psychiatric	+Large sample.

England (539 had full	teachers, and – for ages 11+ -	diagnosis with a specificity of .80 and a sensitivity of	+Appropriate reference standard.	
data available)	young people. Clinicians	.85.	+Comprehensive results for multi-informant	
	(blind to SDQ scores)	The multi-informant SDQ was most sensitive to	algorithm.	
	reviewed data and allocated	hyperkinetic (97.7), ADHD (87.9), and conduct-	-Insufficient data on accuracy of single-informant	
	diagnoses.	oppositional disorders (87.8), and less sensitive to	SDQs (no specificity, no ROC).	
		anxiety (82.7) and depression (84.6).		
		Single-report SDQs were less sensitive. For carers,		
		sensitivity was .51 for 5-10s and .60 for 11-15s. For		
		teachers sensitivity was .60 for 5-10s and .59 for 11-		
		15s. For self report (aged 11+) sensitivity was just .16.		
219 Dutch foster	Part of a larger longitudinal	On the BAC, over three-quarters of children and	+Relatively large sample	
children	study of foster children.	adolescents were screened positive for clinically	+Other measure designed for this population,	
	Foster parents completed	meaningful mental health difficulties (BAC-C=85.6%,	aimed at attachment/trauma difficulties	
	Dutch versions of Brief	BAC-A=78.2%). On the SDQ, scores were 39.8%	-Both measures are questionnaires completed by	
	Assessment Checklist and	clinical, 17.8% borderline, and 42.4% normal for	same respondents; no independent measure	
	SDQ.	children, and 36.6% clinical, 15.9% borderline and	-Does not explore why more children are	
		47.5% normal.	identified by the BAC than SDQ	
		Correlations between SDQ total difficulties score and		
		BAC measures were 83 for the BAC-C and .80 for the		
		BAC-A.		
	data available) 219 Dutch foster	data available) young people. Clinicians (blind to SDQ scores) reviewed data and allocated diagnoses. Part of a larger longitudinal study of foster children. Foster parents completed Dutch versions of Brief Assessment Checklist and	data available) young people. Clinicians (blind to SDQ scores) reviewed data and allocated diagnoses. The multi-informant SDQ was most sensitive to hyperkinetic (97.7), ADHD (87.9), and conduct- oppositional disorders (87.8), and less sensitive to anxiety (82.7) and depression (84.6). Single-report SDQs were less sensitive. For carers, sensitivity was .51 for 5-10s and .60 for 11-15s. For teachers sensitivity was .60 for 5-10s and .59 for 11- 15s. For self report (aged 11+) sensitivity was just .16. 219 Dutch foster Part of a larger longitudinal study of foster children. Foster parents completed Dutch versions of Brief Assessment Checklist and SDQ. Dutch versions of Brief Assessment Checklist and SDQ. Assessment Checklist and SDQ. Dutch versions of Brief Assessment Checklist and SDQ. Assessment Checklist and SDQ. Cinical, 17.8% borderline, and 42.4% normal for children, and 36.6% clinical, 15.9% borderline and 47.5% normal. Correlations between SDQ total difficulties score and BAC measures were 83 for the BAC-C and .80 for the	

Janssens (2009)	292 children aged 3-18	Foster carers and agency	Good internal consistency for parent (Chronbach's	+Relatively large sample	
	who had been in care	carers completed SDQs and	alpha coefficient .72) and teacher (.75) scales.	+Compared SDQ to well validated package of	
Screening for	for 4 weeks or longer in	ASEBA (this is a package of	Inter-rater correlations were .41 foster parent - self, .36	questionnaires.	
psychopathology in child	Belgium	questionnaires including the	foster parent - agency carer and .35 agency carer - self.	-Reports correlations between questionnaire	
welfare: the Strengths and		CBCL, TRF and YSR).	Strong correlations between SDQ and ASEBA scores	responses by same respondents; no independent	
Difficulties Questionnaire			from foster parents (.81), agency carers (.71) and self-	measures of mental health other than current or	
(SDQ) compared with the			report (.75).	previous engagement with services, which is	
Achenbach System of			36% of children whose foster parents scored them in	unlikely to be a reliable reference standard.	
Empirically Based			the clinical range of the SDQ had been or were		
Assessment (ASEBA)			engaging with mental health services; for agency carers		
			and self-report, figures were 34% and 41%		
			respectively.		
Jee (2011)	138 foster children aged	SDQs were collected from	Parents were significantly more likely than children	+Appropriate reference standard	
	11-17 in the USA;	children and their foster	themselves report scores in the clinical range for	+Clinicians conducted the assessments and	
Validating office-based	subsample of 50 had	carers. A subsample of 50	conduct difficulties (38% v 16%) and total difficulties	allocated diagnoses.	
screening for	full data	also completed Children's	(30% v 16%).	+Reported sensitivity and specificity	
psychosocial strengths		Interview for Psychiatric	For any identified problem (scores in the clinical range	+ Researchers independent from SDQ authors	
and difficulties among		Syndromes (ChIPS)	for total difficulties or on any subscale) sensitivity was	-Relatively small sample	
youths in foster care		assessments. Trained masters-	.71 for parents and .54 for self report. Using service use	-No ROC analysis	

		level clinicians (psychologist	as a validation criterion yields a sensitivity of 58 and	
		and social worker) conducted	specificity of .53 for foster parent SDQ and a	
		the ChIPS interviews under	sensitivity of .47 and specificity of .49 for the agency	
		the supervision of a PhD-level	care giver. When parent and self reports were	
		psychologist and assigned	combined, the sensitivity was .93 and the specificity	
		psychiatric diagnoses using	was .50 for any identified difficulty. Combining parent	
		DSM-IV.	and self report total difficulties scores yielded a	
			sensitivity of .50 and a specificity of .95.	
Lehmann (2014)	279 foster children in	Foster parents and teachers of	Area Under the Receiver Operating Curve at 95% CI	+Relatively large sample
	Norway	279 foster children completed	was .83 for carer-report and .77 for teacher-report	+Appropriate reference standard
Screening foster children		the SDQ and the diagnostic	SDQs.	+ROC data and sensitivity and specificity for
for mental disorders:		interview Developmental and	A cut-off score of 13 was optimal for both caregivers	different cut-off options reported
Properties of the		Well-Being Assessment	(82.8% sensitivity, 73.7% specificity) and teachers	+Researchers independent from SDQ authors
strengths and difficulties		(DAWBA). ROC analyses	(86.4% sensitivity, 77.3% specificity).	-Assessments were not completed by clinicians
questionnaire		performed.	Children with Total difficulties scores in the low range	-Different language and culture, findings may not
			from 4 to 9 had a prevalence of disorders ranging	be generalizable to UK population.
			between 13.0 and 29.0%. For carer reports, a score of 2	
			or more on the impact score had a sensitivity of .80 and	
			specificity of .70. For teacher reports, a score of 1 or	
			more was optimal, sensitivity .78, specificity .67.	

			An optimal balance between sensitivity and specificity	
			was obtained when both Total Difficulties scores (13 or	
			more) and Impact scores (2 or more) were used.	
			Defining test positives as a score above the cut-off on	
			one of the two scales identified 89.1% of the children	
			with a disorder. Of the test positives, 37.9% did not	
			have a mental disorder.	
Milburn (2008)	All children (0-17)	Therapeutic assessment from	62% of children who completed the full therapeutic	+ Full, comprehensive multidisciplinary, multi-
	entering care for the	a team of clinicians,	assessment met criteria for a major psychiatric	informant assessment as reference standard.
Early identification of	first time in the Western	comprising one or two	diagnosis.	+ Researchers independent from SDQ authors
mental health needs for	Metropolitan Region of	interviews with parents; one	Using the borderline (14) cut-off, for the parent/carer	+Researchers independent from SDQ authors
children in care: a	Melbourne in 2002 (N =	or two interviews with carers;	SDQ the sensitivity was .80 and specificity .58. For	-Relatively small sample
therapeutic assessment	161).	an appointment with the	teacher reports, the sensitivity was .33 and the	
programme for statutory		paediatrician, and up to four	specificity was .50. For self-report, the sensitivity was	
clients of child protection		individual sessions with the	.61 and the specificity was .92.	
		child. Diagnoses made by	Convergence between SDQ score and clinical diagnosis	
		MDT based on assessment	was 73.7% for the parent/carer report, 62.5% for	
		information. SDQs also	teacher report and 57.1% for self report.	
		collected.		

Millward (2006)	82/100 children aged 4-	Carers completed Reactive	The Pearson correlation between the Reactive	+Uses a measure of attachment disorder
	16 in care in West	Attachment Disorder Scale	Attachment Disorder Scale and SDQ total difficulties	-Both measures are questionnaires completed by
Reactive attachment	Dunbartonshire	(Minnis et al., 2002)	score was .84.	same respondents; no independent measure
disorder in looked-after		and SDQ questionnaires.		-Does not directly compare cases
children				
Newlove-Delgado (2012)	Children aged 4-16 in	For the eligible sample	At least 1 SDQ was returned for 18 children. Children	+Study designed to test SDQ as screening tool in
Evaluation of a pilot	care in a London	(n=23), SDQs were sent to	with "probable" (n=12) or "possible" (n=3) SDQs were	real world CAMHS setting
project for mental health	borough for 4	carers, teachers and to young	invited to complete a DAWBA; 9 attended.	-Very small number of participants with both
screening for children	consecutive months or	people if they were aged 11 or	Of 9 children who completed the DAWBA, 7 were	SDQ and DAWBA data available
looked after in an inner	more.	over.	given a psychiatric diagnosis and 2 were not.	
London borough				
Ratnayeke (2014)	83 looked after	Carers completed an SDQ and	124 of the 199 children (62%) were within the clinical	+Reasonably large sample
	children, 67 adopted	Relationship Problems	SDQ range, which was lower than expected for a	+Study shows proportion of children scoring in
When are attachment	children, and 49 young	Questionnaire (RPQ –	clinical sample. The number of children scoring in the	clinical range on SDQ who have been assessed as
difficulties an indication	offenders (24%)	Minnis, Rabe-Hesketh and	clinical range for each group were: 45 (54%) looked	needing treatment in real world CAMHS setting
for specialist mental	attending a specialist	Wolkind, 2002)	after, 52 (78%) adopted and 27 (55%) young offenders.	-Does not describe how children are assessed and
health input?	CAMHS team for		The difference was significant (chi-square 12.07, df 1/4	accepted by the service
	vulnerable children in		2, p 1/4 0.001). Young offenders scored significantly	-Did not directly compare performance across
	England (before 1st		lower on the RPG than the other two groups but there	different measures
	appointment)		was no significant difference between looked after and	
			adopted children on the RPG.	

HRA Approval



East of England - Cambridgeshire and Hertfordshire Research Ethics Committee

The Old Chapel Royal Standard Place Nottingham NG1 6FS

17 January 2018

Dr Nicholas Midgley
Director MSc in Developmental Psychology & Clinical Practice / Child and Adolescent
Psychotherapist in Family Support Services
The Anna Freud Centre
21 Maresfield Gardens
London
NW3 5SD

Dear Dr Midgley

Study title:	Herts and Minds: supporting the emotional well-being of looked after children in Hertfordshire
REC reference:	15/EE/0332
Amendment number:	7
Amendment date:	08 January 2018
IRAS project ID:	180132

The above amendment was reviewed by the Sub-Committee in correspondence.

Ethical opinion

The members of the Committee taking part in the review gave a favourable ethical opinion of the amendment on the basis described in the notice of amendment form and supporting documentation.

Discussion

There were no ethical issues raised.

Approved documents

The documents reviewed and approved at the meeting were:

Document	Version	Date
Covering letter on headed paper		04 January 2018
Interview schedules or topic guides for participants	1.1	04 January 2018
Notice of Substantial Amendment (non-CTIMP)	7	08 January 2018
Participant consent form [Clinicians]	1.1	02 January 2018
Participant information sheet (PIS) [Clinicians]	1.1	02 January 2018
Research protocol or project proposal	2.7	04 January 2018



Membership of the Committee

The members of the Committee who took part in the review are listed on the attached sheet.

Working with NHS Care Organisations

Sponsors should ensure that they notify the R&D office for the relevant NHS care organisation of this amendment in line with the terms detailed in the categorisation email issued by the lead nation for the study.

Statement of compliance

The Committee is constituted in accordance with the Governance Arrangements for Research Ethics Committees and complies fully with the Standard Operating Procedures for Research Ethics Committees in the UK.

We are pleased to welcome researchers and R & D staff at our Research Ethics Committee members' training days – see details at http://www.hra.nhs.uk/hra-training/

15/EE/0332:

Please quote this number on all correspondence

Yours sincerely

Muallace

Mr David Grayson Chair

E-mail: nrescommittee.eastofengland-cambsandherts@nhs.net

Enclosures: List of names and professions of members who took part in the

review

Copy to: Professor Tim Gale, HPFT

Jenny Ricketts, Anna Freud National Centre for Children and

Families

HPFT Letter of Access





Human Resources Department The Colonnades Beaconsfield Road Hatfield Hertfordshire AL10 8YE

Hannah Wright 10 Hyndewood Bampton Road London SE23 2BJ

16th February 2018

Dear Ms. Wright,

Extension to existing Letter of access for research

As an existing NHS employee you do not require an additional honorary research contract with this NHS organisation. We are satisfied that the research activities that you will undertake in this NHS organisation are commensurate with the activities you undertake for your employer. Your employer is fully responsible for ensuring such checks as are necessary have been carried out. Your employer has confirmed in writing to this NHS organisation that the necessary pre-engagement check are in place in accordance with the role you plan to carry out in this organisation. This letter confirms your right of access to conduct research through Hertfordshire Partnership University Foundation Trust (HPFT) for the purpose and on the terms and conditions set out below. This right of access commenced on 21/08/17 and is being extended until 30/06/18 unless terminated earlier in accordance with the clauses below.

You have a right of access to conduct such research as confirmed in writing in the letter of permission for research from this NHS organisation. Please note that you cannot start the research until the Principal Investigator for the research project has received a letter from us giving permission to conduct the project.

You are considered to be a legal visitor to HPFT premises. You are not entitled to any form of payment or access to other benefits provided by this organisation to employees and this letter does not give rise to any other relationship between you and this NHS organisation, in particular that of an employee.

While undertaking research through HPFT, you will remain accountable to your employer [Cambridgeshire and Peterborough NHS Foundation Trust] but you are required to follow the reasonable instructions of your nominated manager [Professor Tim Gale] in this NHS organisation or those given on her/his behalf in relation to the terms of this right of access.

Where any third party claim is made, whether or not legal proceedings are issued, arising out of or in connection with your right of access, you are required to co-operate fully with any investigation by this NHS organisation in connection with any such claim and to give all such assistance as may reasonably be required regarding the conduct of any legal proceedings.

You must act in accordance with HPFT policies and procedures, which are available to you upon request, and the Research Governance Framework.

You are required to co-operate with HPFT in discharging its duties under the Health and Safety at Work etc Act 1974 and other health and safety legislation and to take reasonable

Page 1 of 2

care for the health and safety of yourself and others while on HPFT premises. Although you are not a contract holder, you must observe the same standards of care and propriety in dealing with patients, staff, visitors, equipment and premises as is expected of a contract holder and you must act appropriately, responsibly and professionally at all times.

If you have a physical or mental health condition or disability which may affect your research role and which might require special adjustments to your role, if you have not already done so, you must notify your employer and the HPFT Research & Development Department (Thanusha Balakumar 01707 253835), prior to commencing your research role at the Trust.

You are required to ensure that all information regarding patients or staff remains secure and *strictly confidential* at all times. You must ensure that you understand and comply with the requirements of the NHS Confidentiality Code of Practice (http://www.dh.gov.uk/assetRoot/04/06/92/54/04069254.pdf) and the Data Protection Act 1998. Furthermore you should be aware that under the Act, unauthorised disclosure of information is an offence and such disclosures may lead to prosecution.

HPFT will not indemnify you against any liability incurred as a result of any breach of confidentiality or breach of the Data Protection Act 1998. Any breach of the Data Protection Act 1998 may result in legal action against you and/or your substantive employer.

You should ensure that, where you are issued with an identity or security card, a bleep number, email or library account, keys or protective clothing, these are returned upon termination of this arrangement. Please also ensure that while on the premises you wear your ID badge at all times, or are able to prove your identity if challenged. Please note that this NHS organisation accepts no responsibility for damage to or loss of personal property.

We may terminate your right to attend at any time either by giving seven days' written notice to you or immediately without any notice if you are in breach of any of the terms or conditions described in this letter or if you commit any act that we reasonably consider to amount to serious misconduct or to be disruptive and/or prejudicial to the interests and/or business of this NHS organisation or if you are convicted of any criminal offence. You must not undertake regulated activity if you are barred from such work. If you are barred from working with adults or children this letter of access is immediately terminated. Your employer will immediately withdraw you from undertaking this or any other regulated activity and you MUST stop undertaking any regulated activity immediately.

Your substantive employer is responsible for your conduct during this research project and may in the circumstances described above instigate disciplinary action against you.

If your circumstances change in relation to your health, criminal record, professional registration or suitability to work with adults or children, or any other aspect that may impact on your suitability to conduct research, or your role in research changes, you must inform the NHS organisation that employs you through its normal procedures. You must also inform your nominated manager in this NHS organisation.

Yours sincerely

C. HUNTON

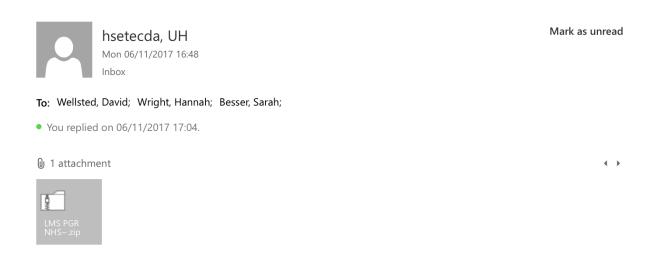
Human Resources Department

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Appendix 5:

UH Ethics

UH Ethics response to Form EC1C: Declaration of involvement in a non-UH approved study (n.b. Herts & Minds study sponsored by the Anna Freud National Centre for Children & Families).



Dear Hannah,

Thank you for confirming the arrangements under which you will collect your data for the study entitled *Herts and Minds: supporting the emotional well-being of children 'Looked After' in Hertfordshire.* The Chairman of the Health, Science, Engineering and Technology ECDA has confirmed that you may quote UH protocol number **LMS/PGR/NHS/02906** on your submission paperwork and exam arrangement form.

Kind regards, Leire.

Leire Caselles Vallejo

Academic Services Officer (Ethics) Academic Services University of Hertfordshire Hatfield AL10 9AB UK Tel +44(0)1707 28**1254**

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Participant Information Sheet





Interview information for clinicians

Herts and Minds: supporting the emotional wellbeing of looked after children in Hertfordshire

Key Points:

- The Targeted CAMHS team in Herts is part of a research project, 'Herts and Minds'.
- This research ultimately aims to learn more about the most effective way to help children looked after (CLA) with emotional and behavioural problems.
- The Strengths & Difficulties Questionnaire (SDQ) is being used to screen children for inclusion in the Herts & Minds study, and to measure the effectiveness of the interventions that we are researching. Therefore we need to ensure that it is accurately identifying children's emotional and behavioural problems.
- If you agree to take part, you will be interviewed about your views on the
 use of the SDQ in screening for emotional and behavioural problems in
 looked after children referred to the service.
- Where relevant, these interviews will include discussion of your work with children who may have been appropriate for inclusion in the Herts and Minds study but whose difficulties were not identified by the SDQ (as they scored in the "normal/close to average" range) and children who had SDQ scores that were eligible but may not have fully captured the extent of their difficulties.
- These interviews will help us to explore clinician's perspectives on the types of difficulties that may not be identified by the SDQ at referral, and possible reasons for this.
- We plan to use this information to make recommendations to improve screening for emotional and behavioural difficulties in the CLA population, and to inform the design of a large-scale clinical trial to test the effectiveness of using MBT-Fostering.
- Everything discussed in these interviews will be confidential. (Please note that recordings may be shared with an external transcription service for the purpose of transcription only).

PIS for clinicians: 2 January 2018 v 1.1 | IRAS Project ID: 180132



Children and Families





Introduction

This information is about a study the Targeted CAMHS team in Herts is doing in partnership with the Anna Freud Centre (www.annafreud.org) and the University of Hertfordshire. All children who are in foster care who have been referred to this service with an SDQ score of 13 and above are being asked to take part in a study called 'Herts and Minds'. The overall aim of the study is to investigate the best ways of supporting the emotional wellbeing of looked after children in Hertfordshire. We are trying to find out whether a form of support called MBT-Fostering is helpful for children who are looked after.

The purpose of this information is to inform you about the study and ask whether you will agree to take part in an interview to discuss your work with particular children who have received a CAMHS team service during the course of the Herts and Minds study but whose difficulties were not fully identified by the SDQ provided at referral. Before you decide whether you are willing to take part it is important you understand why the research is being done and what it involves. Please read this information carefully and if you have any questions please contact Hannah Wright, Trainee Clinical Psychologist (contact details on page 4).

What is this study about?

In order to design a trial of the effectiveness of MBT-Fostering, it is important to establish whether our primary screening and outcome measure, the Strengths & Difficulties Questionnaire (SDQ), is reliably identifying the emotional and behavioural difficulties of children referred to the Targeted CAMHS team. This is to ensure that we are accurately measuring the presenting difficulties of children, and to ensure that children who might benefit from participating in therapy are not wrongly excluded. In cases where the SDQ does not appear to be identifying children's difficulties, we are asking you to help us to understand why this might be occurring.

What is involved?

If you agree to take part, you will be invited to an interview with a member of the research team. The interview will focus on your views on the use of the Strengths & Difficulties Questionnaire within the team. Where relevant, this will include discussion of your work with children in the targeted CAMHS service during the course of the Herts and Minds study (since January 2016) who scored in the "low" or "slightly raised" categories on the SDQ at referral, but were assessed as needing a service. The topics to be explored include: the nature of the difficulties experienced by the children, the level of awareness of those difficulties in the network around the child, your views on why these difficulties were not identified by the SDQ and what questions could be added to the SDQ to make it more relevant to this population.







The interviews will take place after you have finished working with the children, to ensure that it cannot influence the treatment they receive. You will be informed about which children you will be asked about in advance of the interview. Interviews will be arranged to fit around your diary, and will take place at the Targeted CAMHS Team clinic, or another mutually agreed location, to minimise disruption.

Do I have to take part?

Participation in the interview is optional, and you may withdraw at any point, if you wish, without having to give a reason. This will not affect your relationship with the University of Hertfordshire or the Anna Freud Centre in any way. If before you decide whether or not to participate you have questions or concerns about the study, please contact Hannah Wright; details can be found at the end of this information sheet.

I am happy to take part - what happens now?

If you agree to take part, you will be asked to fill in a form to provide written consent. Once you have given informed, written consent to take part, you will be notified of the cases that will be included in the interview, and will be contacted to arrange a suitable time for the interview.

What if something goes wrong?

The research team trust that you will find the study a positive experience. If you are unhappy about any aspect(s) of the research, in the first instance, please contact a member of research team (contact details can be found at the end of this information sheet) who will do their best to resolve any difficulties. If you remain unsatisfied and wish to complain formally you can seek advice from your staff union. You may also send formal complaints about the conduct of the research to The Anna Freud Centre. Please send in writing to: The Chief Operating Officer, The Anna Freud Centre, 12 Maresfield Gardens, London, NW3 5SU or via email: ros.bidmead@annafreud.org.'

Confidentiality - who will know that this child is taking part in this study?

All the information provided to the research team will be treated in strict confidence and stored securely, in accordance with the Data Protection Act (1998). No identifying information relating to the child will be stored with the interview data; children will be identified only by trial ID number.

Who is organising and funding the study?

This study is being undertaken collaboratively by Hertfordshire Partnership University NHS University Foundation Trust (HPFT), the Anna Freud National Centre for Children and Families (AFNCCF) and the University of Hertfordshire









(UH). The research is funded by a National Institute of Health Research 'Research for Patient Benefit' grant (Grant reference number: PB-PG-0614-34079).

I have some questions about this research, who do I contact?

If you have any questions or wish to get more information about the research project, contact details are given below.

For more information about the research project, please contact Hannah Wright in the first instance:

Hannah Wright Trainee Clinical Psychologist **Email:** h.wright20@herts.ac.uk

Address: Doctorate in Clinical Psychology <u>1F411</u>, Health Research Building, College Lane Campus, University of Hertfordshire, Hatfield, AL10 9AB

You can also contact Sarah Jane Besser:

Dr Sarah Jane Besser Trial Manager **Tel:** 01707 284 139

Email: s.j.besser@herts.ac.uk

Address: Centre for Health Services and Clinical Research, Health Research Building, University of Hertfordshire, Hatfield, Herts, AL10 9AB

You can also contact my academic supervisors:

Dr David Wellsted

Head of the Centre for Lifespan and Chronic Illness Research

Tel: 01707-286291

Email: d.m.wellsted@herts.ac.uk

Address: Centre for Health Services and Clinical Research, Health Research Building, University of Hertfordshire, College Lane, Hatfield, Herts, AL10 9AB

Dr Jacqueline Gratton

Highly Specialised Clinical Psychologist/Clinical Lecturer

Email: j.gratton@herts.ac.uk

Address: Doctorate in Clinical Psychology 1F411, Health Research Building, College Lane Campus, University of Hertfordshire, Hatfield, Herts, AL10 9AB

Thank you for reading this information sheet

Consent Form









Consent Form for Clinician Interviews

Herts and Minds: supporting the emotional wellbeing of looked after children in Hertfordshire

Please initial box

I confirm that I have read and understand the information sheet (dated 2 January 2018, version 1.1) for the above study. I have had the opportunity to consider the information, ask questions and have had these answered satisfactorily.
I understand that my participation is voluntary and that I retain the right to withdraw consent at any time without giving any reason, without my professional relationship with the Targeted CLA Team, or social services, being affected.
I agree to the interviews being audio-recorded. I understand this is for the purpose of transcription and analysis, and that the tapes will be stored securely, fully anonymised, and that they will be destroyed when the study is complete.
I agree to take part in this research
Name of Therapist:
Signature:
Date:
Name of person (researcher) taking consent
Signature:
Date:
The original copy of this form is to be kept by the participant, and a copy is to be kept by the researcher.

Consent form for clinician interviews 2 January 2018 v1.1 | IRAS Project ID: 180132

Interview schedule

Hertfordshire Partnership University NHS Foundation Trust









Herts and Minds: supporting the emotional wellbeing of looked after children in Hertfordshire

The use of the SDQ in assessing mental health difficulties in looked after children: therapist interviews

As recommended in guidelines for qualitative research interviewing (e.g. Smith et al., 2009), the interview would be semi-structured, with the interviewer having in mind some key areas to be explored, but flexibly and led by the therapist.

The interview will begin by explaining that the aim of the interview is to help understand what criteria the targeted team use to decide when a child may need a service, even when their SDQ may indicate that their difficulties are only "slightly raised", or "normal". If you have worked with children during the study, we want to discuss this, but our interest and focus is on the thinking process within the team itself. We hope this will help us to better understand and articulate the criteria the service uses, and perhaps also understand better the strengths and limitations of the SDQ as a screening questionnaire for access to services.

The key areas to be explored would be:

1. The team

Can you tell me about what the Targeted Treatment Team does and what your role in the team is?

How would you describe the types of difficulties that are experienced by the children that see in this team?

2. General questions about referral & assessment in the team

When referrals come into the team, how do you decide whether the child has difficulties that require treatment from a mental health team?

What does an assessment typically involve, and what are you looking for?

What kinds of reasons would there be for not offering a service?

What role does the SDQ play in your assessment of children's mental health needs?

How much weight do you put on SDQ score when making decisions about whether to offer treatment?







Instruction: If relevant, clinicians to be provided with a list of SDQ scores at referral for children who they worked with as part of the Herts & Minds study, and those who were treated during that time but excluded from the study due to low SDQ scores. The list will be divided into categories (as per scoring instructions): normal, slightly raised, high and very high.

3. For clinicians who have worked with children with low SDQ scores who were screened for the study:

Instruction: Clinicians to be directed to talk about these children as a group.

Referrals:

Who referred these children to CAMHS? (Is this typical for the service?)

What were the reasons given for the referrals?

The CAMHS assessment:

What difficulties were identified as a result of the assessment?

Possible prompts: Behavioural difficulties, Hyperactivity, Emotional regulation, Low mood/anxiety, Interpersonal/attachment difficulties, Trauma, Problems with food, Abnormal pain response, Sexual behaviour problems, Self-harm, Any psychiatric diagnosis?

How do these difficulties differ from other children who were treated as part of the trial?

Who in the children's lives knew about these difficulties? Who was the most/least concerned? Carer, Social worker, School, Child

What is your understanding of how these children came to have these difficulties?

If you had completed an SDQ for the children as part of the assessment, do you think the score would be the same? What would be different?

The Strengths & Difficulties Questionnaire:

The SDQ provided at referral indicates that these children's difficulties were in the "normal" range at that time – was that an accurate reflection of their mental health? What doesn't it show?

[Describe sub-scale scores] - how accurately did these scores describe their difficulties?

Why do you think the SDQ provided at referral did not pick up the children's difficulties?

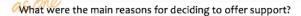
If you had completed an SDQ for the children as part of the assessment, do you think the score would be the same? What would be different?

Decision making

How was the decision made to offer these young people an intervention?







In hindsight, do you think it was the right decision to offer treatment? Why/why not?

Intervention

Can you describe the work that your team has done with the children?

If you compare today with when the children began therapy, what do you think is different and what remains unchanged with regard to his/her problems and difficulties? [What has improved? What has got worse?]

4. For clinicians who have worked with children with "Slightly raised" SDQ scores who were eligible for the study.

Instruction: Clinicians to be directed to talk about these children as a group.

Can you describe the types of difficulties that these children were experiencing at referral?

Possible prompts: Behavioural difficulties, Hyperactivity, Emotional regulation, Low mood/anxiety, Interpersonal/attachment difficulties, Trauma, Problems with food, Abnormal pain response, Sexual behaviour problems, Self-harm, Any psychiatric diagnosis?

What is your understanding of how these children came to have these difficulties?

Who in the children's lives knew about these difficulties? Who was the most/least concerned?

Carer, Social worker, School, Child

The SDQ provided at referral indicates that these children's difficulties were in the "slightly raised" range at that time —was that an accurate reflection of their mental health?

[Describe sub-scale scores] - how accurately did these scores describe their difficulties?

(If appropriate) what is the SDQ missing? Why do you think that is?

As a group, how would you describe the types of difficulties that these children had? How do they differ from the group who scored high/very high?

Can you describe the work that your team has done with the children?

If you compare today with when the children began therapy, what do you think is different and what remains unchanged with regard to his/her problems and difficulties? [What has improved? What has got worse?]

5. General questions

Overall, how much confidence do you have in the SDQ as a tool for screening for mental health difficulties in children?





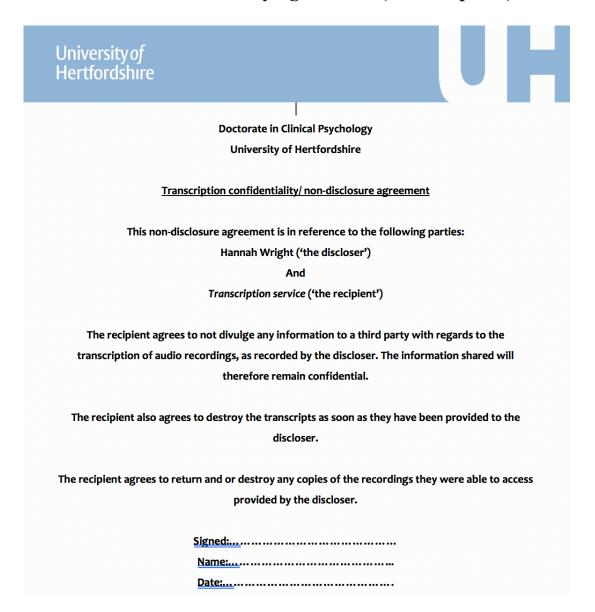


In your experience, are there particular groups of children for whom the SDQ seems to work particularly well or not so well?

Possible prompts: gender, age, ethnicity, SEN, disability, types of difficulty, placement factors.

Is there anything that we haven't talked about that seems important?

Confidentiality agreement (transcription)



Appendix 10:

Coding Frame

Code name	Definition	Example
META: Alternative measures	Clinicians describe alternatives to current SDQ	
	screening	
Alternatives-carer	Clinicians describe alternative measures of the	"So there is the Parental Reflective Functioning Questionnaire and, again, that takes away from the
	carer	child and that kind of aspect that it's about the child. It looks more at the carer or the parent or the
		adoptive parent, whoever it might be, and it'll set their reflective functioning skills, you know, how
		they're making sense of the behaviours? What understanding do they have?"
Alternatives-child	Clinicians describe alternative measures of the child	"So the RCADS was the other measure that was used in the targeted team and it's not particularly
		much better for this population because people would quite often be scoring under the clinical
		threshold for all of these specific clinical problems, again because the difficulties were more in their
		relationships and driven by attachment problems."
Alternatives-co-produced	Clinicians describe alternative measures that are	"the only scoring things that I've used that seems to really accurately reflect complex situations is
	administered via discussion	the SKID-II, I don't know if you came across that, that's for personality disorders in adults, it's not the
		young people, and the way you deal with that is you talk them through. There's a 119 questions, and
		you talk them through each question."
Alternatives-relationship	Clinicians describe alternative measures of the	"I find the Outcome Rating Scale is quite useful especially because the child can fill it out and the
	carer-child relationship	parent or the carer fills it out and it does look at relationships and you can go into a lot more depth"
Covered by other codes –		
patient-carer-child-relationship		
Alternatives-clinician-	Clinicians describe finding the SDQ more useful if	"We're not sat with them filling them in so they're just get given to us. And whereas when we do the
administration	administered by clinician (rather than submitted by	RCADS, it'd be part of a choice appointment, and I'd often go I might not go through them all with
	social worker) as part of a conversation	somebody I might just sort of say, "Is there anything there that stands out or surprises you?" or
		"What was it like to fill in this?", and "how might I know that that's what you're experiencing, what sort
		of things do you do?" And whereas because we've not had that dialogue with this, we don't really

		know what time of day it is or any of those sort of things that might influence, how quickly they've had to fill it in"
Meta=clinician expressed views on SDQ	Clinician offers explicit opinion on the SDQ	
View-don't-like don't-use Renamed: View-SDQ-not-useful	Clinician states that they do not use them	"I don't like them and I don't really use them. I probably - you know, I should but I don't. I think that those sorts of things are clumsy."
View-implicit judgements [merged with View-SDQ-stigmatising-labelling]	Clinician states that the SDQ makes assumptions and judgements	"There is a sort of assumption isn't there that that [being considerate of other people's feelings]'s a good thing, and maybe it is. It also assumes that you know what considerate means. It also assumes that you can – that there's a sort of way of identifying clearly and precisely other people's feelings. This is not the case in my understanding of the world."
SDQ-misses-LAC-difficulties	Clinician offers opinion that the SDQ is not well suited to screening for mental health difficulties in LAC population	"In the children that I work with or the team works with, I don't have that much faith in them because I don't think they really capture what the children's difficulties are."
View-questionnaires-general	Clinician offers more general views on the use of screening questionnaires	"Most screens in my experience are not terribly useful, so there's SDQs, RCADS, there are various others, and they can give you a bit of a basic idea, but it's an idea that you would've had from your conversation with them anyway."
View-SDQ-not-reliable-alone	Clinician offers opinion that SDQ score should not be relied upon for identifying LAC mental health difficulties	"I'm conscious that SDQ, I think with all its drawbacks, I think To be honest, I think it's not a bad form, you know, I think one just has to be cautious about giving too much weight to it and not relying on it, you know. Or you can use it, but it can't be used in isolation to depict I think difficulties of this nature."
View-SDQ only because have to [merged with view-not-useful]	Clinician states that they only use the SDQ because they have to	"Um I don't think it plays a big role in my assessment at all. I think the only quite truthfully, the only reason I probably use it is because we have to."
View-SDQ-helpful-tool	Clinician states that the SDQ can be a helpful tool in assessing LAC mental health	"so, for example, you know if the carer's scoring this and you know, they're considerate of other people's feelings, they, you know, they're not restless, they're all relaxed, all of that, you would hope

		that the carer would be able to think well actually, they are doing okay, and if they wasn't able to, you'd have to have a conversation with them about well actually, if you would just look at this, their strengths are pretty good, you know? So sometimes it can be a helpful tool in that respect."
View SDQ improve Contents better covered by other codes	Clinician makes suggestions to improve the SDQ	"Actually, it'd be really, really hard to make them better because they're obviously It's put in the way it is for a reason to give people a measurable understanding of somebody's presentation. But I think it could do if probably been a bit more child friendly. I don't know how you do it but"
View-SDQ-stigmatising-labelling	Clinician states that the SDQ is labelling, stigmatising or overly negative about young people	"It's really quite labelling that some Like if you Like kind of somebody might not have thought about these things and then they're filling it in and they're kind of, oh okay, I don't know, yeah."
META: decision to offer treatment	Clinicians discuss the decision-making process following referrals to the team	
Decision-carer-placement-factors	Clinician describes the role of carer and placement factors in deciding whether to accept referrals	"I'm not sure but I think it's sort of really down to the descriptions that are given about the children and sort parents and carers experiences of living with these children. When you speak to the adults involved with these group of children, you think about how much they are struggling – child struggling – but the adults are also struggling. So I think it's probably a lot to do with description that is given if that makes sense."
Decision-clinical-judgement-key	Clinician describes clinical judgement as the key factor in making decisions about referrals	"It [the SDQ]'s used to aid your clinical judgment of the information that you're getting. You know, does it make sense with the information that you've been given? Doesn't it make sense? So, for example, occasionally, we will accept them if they're lower because actually, the information written really very clearly shows that this child or, you know, this family is in distress and there's clearly a mental health component."
Decision-current-functioning	Clinician describes the role of current functioning in making decisions about referrals	"we'll have a look in at their sort of day to day functioning, sort of look at how they're managing at school, how they're managing in placement if they are in care, how many placements have they had and have placements broken down because of the child's behaviour. So even though they may not meet the SDQ score, they're definitely sort of struggling and in the state of being distressed a lot of the time."

Decision-network-pressure [Merged with Patient-network]	Clinician describes the role of network pressure in making decisions about referrals	"I just remembered being involved twice, I think it was - where everyone was convinced there was something awful going on with this young person and it's like, 'Oh my god, you got to sort it. Oh god, it's awful.' And every time we saw him we thought, 'There's not much wrong with him.' It's like, why is everyone so concerned? It was really strange, but they had the microscope on this person as if every last thing they did or said was being analysed in the nth degree, and they were so anxious about them that they kept running to different professionals to see if there's anything they thought might be a bit odd."
Decision-not-mental-health	Clinician describes declining referrals that are not related to mental health	"If it sounds like it's not really mental health so much as it's kind of I don't know I mean because we do get involved with behavioural stuff whereas I think Tier 3 CAMHS probably wouldn't, but yeah I guess if it sounds more like straightforward parenting, then we probably would ask the social worker to do that piece of work."
Decision-other-services-involved	Clinician describes declining referrals if other services are currently or very recently involved	"And also if the child was already receiving service elsewhere then there is a question how suitable would it be for that child then to be given something else on top of what they're already receiving. And also we would be hesitant if So if they just come from another service like [other service name]."
Decision-process-consultation	Clinician describes the role of consultation to the professional network in making decisions about referrals	"So we would've had a consultation with the social care team, and the, usually, principle carer beforehand, or the school although we would see basically who're the best people to have the consultation, and sometimes, that's where the input will end, because the consultation, we will give advice to the end of consultation or what we think needs to happen, and that would be enough. But if after the consultation you thought, "Blimey, this is actually quite a lot more severe and that one session isn't going to go help with it," then we would ask [the child] to come in for assessment."
Decision-process SDQ-referral- info	Clinician describes the process of comparing SDQ scores to the information provided by the referrer when making decisions about referrals	"You've got referral where the SDQ scores are very high and the referral information doesn't indicate the mental health concern, so the question there is, where does the difference come from in terms of the menthe referral form and the information which is being given and the high scores from SDQ
Merged with decision-clinical- judgement-key		what's the lack of correlation there, kind of thinking a bit about that."
Decision-process-team-meeting	Clinician describes the role of the team meeting in making decisions about referrals	"It's discussed- the referral is discussed to the whole team at a team meeting, and the team meeting is like a red line meeting, it's not something people just roll in if they like it, everyone is there because

		of that very reason, to discuss the case, and then your usually doing the case with somebody as well."
Decision-process-unclear	Clinician suggests a lack of clarity about how decisions about referrals are made	"We have our discussion in the team meeting but I think there's so much to do with the sort of language and to do with how something is portrayed and how a certain element of what's going on with the young person, how much weighting gets placed on different factors and different influences, so actually like it's something really important to try and sort of be quite objective rather than kind of, like get drawn into almost the dynamics of it."
Decision-risk	Clinician describes the role of risk assessment in making decisions about referrals	"the risk is quite a big one, obviously, with this. If the risk is too high, the targeting team couldn't take them, because we don't have the infrastructure to deal with the high risk cases, so that would have to be Tier Three."
Decision-SDQ-15+required	Clinician states that an SDQ total difficulties score of 15 or more is required to access the service	"Because they have to score 15 or above and there's an agreement in our commissioning contract with the children services that if a child scores 15 or above then we will accept the referral, so we do put a lot emphasis on that."
Decision-SDQ-cut-off-flexible	Clinician states or gives example of flexibility in the requirement for an SDQ score of 15 or more	"So I think that would trump the SDQ cut off if we did a consultation with the social worker who was describing lots of problems then I would think we would have still offered a service regardless of the SDQ score."
Decision SDQ validates clinical- judgement [merged with view-SDQ-helpful- tool]	Clinician states that the SDQ score contributed to decision making by validating the clinician's judgement.	I think that the role SDQ had was almost like a questionnaire which almost validated that there is a significant level of menelements of mental health presentation requiring our service. Yes, so in that respect, it plays a significant part in our thinking. It's not the primary justification, I think the clinicians' overall assessment and impression, coupled with the SDQ and the others were what ultimately led to case being accepted or not. But it certainly played a part in our thinking of how the case would progress.
Decision-service-context	Clinician states that decisions about referrals are influenced by the service context	"I think it's to do with relationships between NHS and [local] council, the sort of politics of those relationships which fluctuate for all sorts of reasons. It's partly about individual relationships between members of the team and members of other teams. It's all sorts of things."

Decision trauma history	Clinician describes the role of, or gives an example	"it would be because, actually, the description of their past experiences and the trauma that they
	of, trauma history contributing to decisions about	had experienced, or the experiences that they'd had in relation to, you know, perhaps early
[Merged with: population-	referrals	experiences or recent experiences, was such that you would expect there to be some emotional
developmental-trauma]		impact on that child that warranted at least meeting with them to think about, are you okay? Yeah."
Decision-young-people's-views	Clinician describes taking young people's views into	"Also, if the young person doesn't want to, as well. If they're saying no, I don't want to go and talk to
	account when making decisions about whether	somebody, but then we might support the foster carer if they're up for that, but we do get a lot of I
	treatment is recommended.	want you to see the child, but yeah if they were saying actually no, I don't really want to talk to
		anybody then we wouldn't obviously force them so, so we've got that."
META: diagnosis		
Diagnosis	Clinician describes a diagnosis.	"It might have been that there was a kind of diagnosable clinical problem like anxiety or mood
		difficulties or a kind of PTSD type presentation"
Diagnosis-unsuitable-LAC-	Clinician states or implies that the diagnostic	"What we didn't look for is diagnostically, this would- you know, we wouldn't look and say, would this
difficulties	classification system does not adequately describe	person be diagnosed with metal health problem? We would look at are there a cluster of behaviour
	the difficulties experienced by looked after children	and emotional problems that are impairing this person's either ability to stay on their placement or
Renamed: problems-with-		their ability to just live a normal-ish, an okay life, and do as well as they can be reasonably expected
diagnosis		to do"
META: normal range	Clinician's descriptions of the presentation of	
	children seen by the service with SDQ scores in the	
	normal range	
Normal-range-accurate	Clinician states or implies that scores in the normal	"They'd been in the care system for several years, and has had really horrible experiences both at
	range were an accurate description of the child's	home and in foster care, but somehow, this young person there are other positives in that they've
Merged with: view-SDQ-useful-	mental health	got good peer relationships, they're they're doing okay at school, they've got other interests. So
tool		they've got something going on in their life that probably are protective factors that actually help
		them I don't know if it's the right word, sort of shrug off sort of some of the difficulties or be able to
		function despite the difficulties, but that'sthat's that's my perception."
Normal-range-attachment-	Clinician describes attachment difficulties in children	"Almost all of them. Rarely attachment disorder, I don't know if you know that that's particularly
difficulties	with SDQ scores in the normal range	that's really rare, very, very rare, but almost all of them had attachment problems, difficulties. Really, if
		you come from a family where social care had been so involved that you're on the child protection

[Merged with sdq-misses- attachment-difficulties]		plan, it's quite likely that your early life experiences have led you to have attachment problems one way or another, so yes."
Normal-range-behavioural- difficulties	Clinician describes behavioural difficulties in children with SDQ scores in the normal range	"The presenting difficulties at the point of referral – if that's what you're interested in – might have been to do with what can be, kind of, vaguely classed as behaviour, challenging behaviour difficulties picked up from school or from the carers of the child, um, and maybe some emotional regulation difficulties on the back of, or underneath, the behaviour difficulties."
Normal-range-birth-family [SDQ-misses-birth-family-issues]	Clinician describes difficulties in relationships with the birth family in children with SDQ scores in the normal range	"And what was going on was also unfortunately negatively affecting the relationship with the foster carer, as was the young person's - the young person was having unsupervised contact with their mother, and would become quite disturbed afterwards, but then would go and see her again, unsupervised. She wasn't supposed to see her at all, but the mother would find ways of making contact and it would all go horribly wrong."
Normal-range-carer-pressure	Clinician describes carer belief that the child must have a mental health problem due to previous experiences	"My bottom line is I actually do think that some children, despite having awful experiences, that there's something within them intrinsically that they do do okay, you know? Yeah and that they're actually managing okay despite those difficulties and it's usually the carer usually the carer more than school, but sometimes school, that actually feel that there needs to be that they have to had been affected."
Normal-range-carer-struggling [Covered by SDQ-misses-carer-child-relationship and SDQ-misses-within-carer-factors]	Clinician describes difficulties within the carer	"When you speak to the adults involved with these group of children, you think about how much they are struggling – child struggling – but the adults are also struggling."
Normal-range-disordered-eating	Clinician describes disordered eating in children with SDQ scores in the normal range	"One had issues with hoarding food so would like steal food. Some foster carers would see it as stealing. Others don't see it as stealing. But definitely issues with taking food and either eating it in secret but maybe leaving the wrappers lying around so the cares would know or just like hiding it and that, just in case."

Normal-range-internalising-	Clinician describes internalising difficulties in	[child] "was actually quite a lot more disturbed by past events than people had thought. The problem
difficulties	children with SDQ scores in the normal range	is with that particular person was that they're actually quite, um, resilient, and were able to go to
		school, and do some of those sort of things and appear okay at most of the time, but actually,
Merged with SDQ-misses-		underneath were having quite disturbing thoughts and dreams and all that sort of thing. But some of
internalising-problems		this took quite a long time to come out"
Normal-range-placement-risk	Clinician describes risk of placement breakdown in	"she was in foster care but moving from one placement to another to another because she really,
	children scoring in the normal range	really struggled with attachment to anybody and like would often like move on, take some control of
Merged with SDQ-misses-carer-		that and just push people away and move on, but a lot of self harm and a lot of thoughts about
child-relationship		suicidal ideation, about drowning herself, really like intense emotions that she struggled to manage"
Normal-range-self-harm	Clinician describes self-harm in children scoring in	"One of them is head banging. So every time he became distressed, he would head bang. One of the
	the normal range	others used to sort of pinch, just like scratching their arms when they are angry or upset, and they're
Merged with SDQ-misses-risk		both quite young children, they're both under 10. Well, that just shows their level of distress, and
		emotional dysregulation that they experience."
Normal-range-transitions	Clinician describes difficulties relating to placement	"There's been - the whole case was in a process of a significant change, meaning that the order was
	transitions for children scoring in the normal range	being revoked, so the child was unbecoming looked after and becoming going back to the parents. So
Covered by other codes e.g. sdq-		that's a significant event. There are questions around how the child might feel split loyalties, there are
misses-birth-family and problem-		questions around this child feeling the loss of the foster carer, as well as longing for rekindling the
context		relationship with the mum."
Normal-range trauma-history	Clinician describes trauma history of children	"One child had been quite significantly sexually abused and that's why he was in care, so that was
,	scoring in the normal range	having an impact on how he viewed adults and relationships. One of the other ones that I worked with
Covered by other codes e.g.		experienced the neglect and emotional abuse alongside physical abuse so she had great difficulties
SDQ-misses-developmental-		with attachment and trusting people but then also difficulties in letting adults to care and parent her."
trauma		
Normal-range-underestimates	Clinician states that normal range is an under-	"So I have to think back at the assessment stage because again, that might have been a time when
	estimate of the children's difficulties	they're minimising feelings and not really, you know, not really talking yet and stuff soso yeah,
		thinking of these ones, I'd probablysomelet me see if I'd agree with any of them. No, definitely
		not. Because this one wasn't even going to school."
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META: who is the patient? Patient-birth-family	According to the clinician's description, who or what do they seem to regard as the patient who is the target of the intervention? The "patient" is the birth family	"When I first saw them, the older child was angry and quite abusive to his mum. I think I saw them probably three or four times altogether. And by the third one really, the mum was saying actually,
		'There's much less of that.' And maybe having a bit of a sort of, you know, a place to sort ofactually sort of speak, just to sort of say how cross he was what had happened and she apolo-, you know, saying sorry."
Patient-carer	The "patient" is the carer	It's helping people I think to think more – in a more sort of nuanced way that probably whatever this is, this thing, these phenomena are going to go and happen in one way or another, probably for years. It's them that are going to have to change. The child may change over time but it'll sort of be like this, and you'll just have to do what you can, be there as best you can.
Patient-child-carer-relationship	The "patient" is the child-carer relationship	"What I've kind of found is once an intervention or whatever the work is that you're doing is complete, you might not see a change in behaviours or a change in presentation, but what you do see a change in is how the carers understand and make sense of what they're seeing, their levels of toleration, which are also impacted on by understanding, and that in itself has a huge difference in how that relationship and the attachment then forms and builds."
Patient-child	The "patient" is the child	"But we did have a small number of cases where there were where the child's goal was to feel better or to get out and do more, so there would be a short piece of work that was done with the child around that."
Patient-network	The "patient" is the network	"if you have a 17 year old come along that's had a horrendous history of neglect and abuse for a long, long time, and found themselves in foster care quite late, there was very little directly you could to help them a lot of the time within the sessions that you could do in the Targeted Team but what then try to do is work with the system around them to try and support them at least as much as they could."
Problem-context	Clinician describes the problem in terms of children's contexts	"this new environment they've come into is probably quite threatening for them because they're not used to people caring, people giving them cuddle, whatever it might be. So that's quite threatening

		because I think it doesn't take into account any of that as differences in how they perceive their life and how we might perceive their life as an outsider."
Problem-put-in-child	Clinicians describe adults locating the problem in the child they are referring	"And often I think people have an idea that what's required - even now they have an idea and that's sort of Anyway, they have an idea that Basically what needs to happen is that the child needs to be seen by somebody who can fix them. That's the model really. I know that people (inaudiable). But actually, it seems to me that that is often very strongly implicit, if not explicit: 'You as a therapist person need to see this child and help them talk about everything so that they can then have a talk about everything in their past, they can then' and I'm doing that in a kind of sort of bit of a performatively cynical way because I don't think it is like that. Maybe sometimes it is but I think very rarely is it like that."
Problem-relationships	Clinicians describe the problem as residing in children's relationships	"It's actually the relationship that's going to capture those complexities because you're going to see the transference, you're going to see how they speak to you and how then that might reflect what's happening in other relationships. A questionnaire is not going to tell you that. It's going to be about relationship."
META: population difficulties	Clinician describes mental health difficulties in the children seen by the service	
Population-attachment- developmental-trauma	Clinician describes attachment difficulties or developmental trauma in children seen by the team	"A lot of the children have developmental trauma or attachment issues. Um I think just by design of being involved with social services and having a social worker, um, it's meant that they've experienced abusive of one sort or another, so that's generally emotional abuse, physical abuse, sexual abuse, emotional abuse, er, neglect. So they have generallysort of those experiences have impacted on their development whether it's sort of social development but it's mainly emotional development and they have difficulties in managing their emotions."
Population CAMHS-stigma [Merged with population-relationship-to-help]	Clinicians describe stigma attached to using CAMHS for children seen by the team	"I think for the young people it's about education and it's about also education about mental health that actually, because we're a mental health service, that doesn't mean that they're mental, because quite often that's the perception that young people have which straight away puts them off coming. "

Population-challenging-behaviour	Clinicians describe challenging behaviour in children seen by the team	"So this population of children tends to be sort of quite controlling and aggressive to manage their emotional states. Um Also, I think quite a few children in our population that we work with also have difficulties in sort of taking authority from adults as well because they've had such mixed messages when they've been with their birth families, it's really hard for them to then accept authority because they just don't know what to do with that, and they tend to fight back because it's something new sort of for them. Or they've been like overly disciplined and they've experienced physical violence so they sort of tend to go into that fight or flight mode."
Population-disordered-eating	Clinician describes disordered eating in children	"The problems we get with food, with that population are not that commonly eating disorder based,
	seen by the team	things like all the shape, shape and weight type problems, they're more usually to do with either the
[Merged with population-		hording of those because they're not having any before, so it's the fear of not having anymore, or
developmental-trauma]		binging, because it's like the- because this could be the last time I get anything to eat for ages, things
		like that. Disordered eating rather than an eating disorder."
Population-emotional-regulation	Clinician describes emotional regulation difficulties	"He is, emotionally, a lot younger than his chronological age so kind of regulation problems with his
	in children seen by the team	emotions so there'll be outbursts and things like that, often triggered by him thinking he's going to get
		told off. I suppose I don't know what he fears that the telling off will be or if he sort of thinks
		placement's going to end, so worry about that or triggers like if you break something"
Population-internalising-	Clinician describes internalising difficulties in	"we've got young people that would maybe kind of repress their sort of thoughts and their feelings
difficulties	children seen by the team that may be less	and sort of really internalise it, so they become really withdrawn, and there are other people that
	noticeable to adults around them	would maybe like act out like through behaviour and So that's maybe seen as being kind of worse
		or seen as being more problematic, whereas the sort of more withdrawn young people might not kind
		of show up on somebody's radar of being less concerning."
Population-labelled	Clinicians describe how looked after children seen	"One of the bits of language might be um, I don't know, 'sexualised behaviour,' in quotes, or it might
	by the team are often given multiple labels	be 'attachment disorder' or it might be – I don't know – 'behaviour conduct disorder', 'behavioural
		problems'. And what those things do, I think, is that all sorts of ideas like those things and lots of other
		things too, they get stuck to looked after children in a way that these things do not get stuck to other
		children. And so in a sense, what you end up with is a child who's almost unseeable, invisible, behind
		all the stuff that gets stuck to them. And I think that that means almost everything that they do and say

		is sort of seen through the lenses of those particular kinds of sticky things that are stuck to them and
		the particular sorts of languages that get used about them."
Population-mask-minimise-	Clinicians report that children seen by the team	"a lot of them have learned survival instincts, their survival instinct have learned how to play along
difficulties	actively mask or minimise their difficulties	with things, because they don't want to move. They don't want to be moved from one place to
		another, so some of them anyway, not all of them, but some of them look fairly adaptive, they look like
		they're doing- okay, just struggling with a few things, when actually, they are fairly dysfunctional in the
		sense of their emotional life, their cognitive life even, their ability to think ahead, comprise it, they're very good at hiding it."
Population-context-masks-	Clinicians report that children's mental health	"so first and foremost, I would say that they're pretty much all complex and they in terms of mental
mental-health	difficulties are masked by their contexts	health presentation, that often is masked by complex environmental factors or complex you know,
mental nearth	difficulties are masked by their contexts	sort of situations that the families are in that mask actually what may be going on for the children or
		the family emotionally, but when you unpick it, actually, the complexities of the child's emotional
		presentation is usually quite large."
		presentation is usually quite large.
Population-naughty-kids-seen-	Clinicians report that children with externalising	"some people will say, yes, it's obviously something to do with the way they feel, but can you get
firet	difficulties tend to be referred more frequently	them to behave properly, because at the back of my mind, there's still thinking he's being naughty. So
		- but it does get the headlines, and this is why the naughty kids always get seen first."
[Covered by population-		
challenging-behaviour]		
Population-peer-difficulties	Clinicians report peer relationship difficulties in	"Definitely issues with peers, so unable to manage like social interactions with their peer group and
	children seen by the team	sort of problem solve. So this population of children tends to be sort of quite controlling and
		aggressive to manage their emotional states."
Population-relationship-to-help	Clinicians report that children seen by the service	"The more placements they've had, the harder they are to help. That's just fairly obviously isn't it
	have difficult relationships to help	really. Once you're being bounced around a bit, you're not going to trust anyone to start with, because
		everyone is new again."

Population-school-difficulties	Clinicians report school difficulties in children seen by the team	"I think a lot of them do sort of present in very similar ways like there's issues at school because they can't concentrate properly, or they've sort of missed out on so much of their education they're so far behind."
Population-self-harm	Clinicians report self-harm in children seen by the team	"what we would normally be presented with was behavioural problems and emotional lability, sometimes with some minor self-harming - if the self-harming is too severe then they will go to Tier Three"
Population sexual behaviour	Clinician reports worrying sexual behaviour in children seen by the team	"when they start becoming sexually aware, they don't know how to attach to say, if you're a girl, it's hard to know how to attach to the boys and other than just let them do what they want to do, because then they really know they'll have relationships other ways. Or you get people acting out their own abuse on other people, we've had difficulties with siblings doing that, and they've had to be taken apart because they would keep re-enacting the things that were going on when they're at home."
META: SDQ reasons used	Reasons given by clinicians for using SDQ in the service referral process	
Reason-had-to-use-something	Clinician states that a screening measure was needed to manage referrals	"I wouldn't have put a huge amount of weight on the score alone, but I think as a team, we try to because we had to have this gate. There had to be a line somewhere in terms of managing referrals."
Reason-other-services-use-it	Clinician states that the SDQ is used due to other services using it	"I think that it's it's what the local authority use I think it's probably it's probably hereditary in terms of systems within systems." Q: Say a bit more about that? "So those systems evolve overtime, don't they, you know, and obviously you're working in conjunction with other services and so if one person's using the SDQ, then rather than reinvent the wheel, you adopt that and it may not be the most useful thing, but it'sI guess it's going with what you've got until you find something that works better, but there being some parity between services so that there's amarrying up if you like of, you know, oh yeah that makes sense, that makes sense."
META: respondent = carer	Explicit statement or example of issues with carer- report SDQ	

Carers-miss-internalising	Clinician states that carers are more likely to miss	"what I find is that a lot of these are - just from my experience that a lot of the kind of emotional
	internalising problems in children	problems are end up being described as lower and then the sort of more behaviour problems tend to
		be like over recorded, especially maybe from parents or from school."
Carers-over-report	Clinician states that carers sometimes over-report	"If there's a clear sense that there are difficulties with the child's behaviour for instance but then, if the
	children's difficulties to get a service	parent knows that it needs to reach a certain point, a certain level of points, otherwise the services will
		not be accessible, there's probably a tendency that the way the parent interprets the questions and
		responds might be influenced to that degree, and then the same with scores as well."
Carer-own-anxiety	Clinician states that carer's own anxiety can impact	"It tends to pick up more on carer anxiety really than anything else, but that's not often a good
	on SDQ score	measure of what the actual problems are, and a lot of carers would say, because I'm anxious about it,
		it is the actual problem, but sometimes people are over anxious about the types of behaviours"
Carers-report-externalising	Clinician states that carers find it easier to report	"So I think things like being overactive, things like how they might interact with other children. I think
	externalising problems	those kinds of things because they can physically and they can actually see what's going on."
META: respondent = teacher	Explicit statement or example of issues with	
	teacher-report SDQ	
Teachers-miss-internalising	Clinician states that teachers are more likely to miss	"I think again, I can imagine it'll be quite difficult for a teacher to understand the internal world and
	internalising problems in children	how that internal world of a child then plays out in a classroom setting because there's so many
		children in the classroom."
Teachers-over-report	Clinician states that teachers sometimes over-report	"it kind of makes me suspicious that the carers and teachers would maybe do the opposite and
	children's difficulties to get a service	almost like over or perhaps sometimes overly sort of described things, especially the things that
		they look at and think are the key things that might get service. Kind of makes me a bit cynical, they're
		kind of, 'how do we get a service here?' or 'how can we get over the number of things?""
Teachers-report-attention	Clinician states that teachers report attention	"I think they might be good at spotting like over activeness, restlessness, um, the ability to
	difficulties in children	concentrate or focus."
Renamed: teachers-report-		
classroom-behaviour		
Teachers-report-conduct	Clinician states that teachers report conduct	"Sometimes teachers are asked to score them and they tend to score them quite highly, if the child is
	difficulties in children	struggling behaviourally at school"

[Merged with: teacher-report-		
classroom-behaviour]		
, ,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,		
META: respondent = self-report	Explicit statement or example of issues with self-	
	report SDQ	
Young-people-under-report	Young people may under-report difficulties in the	"For a child's SDQ, I would factor in for such as, is the child underreporting certain concerns or over
	SDQ	reporting strengths or kind of normal- normally expected answers to the questions - for various
		reasons you know it might be, you know, just wanted to be seen as normal or just want to please the
		parent or the carer, which is a common dynamic in looked after children, um, or just not knowing
		whether, you know, reporting it honestly might lead to something bad for the child."
Young-people-don't-recognise-	Young people may not recognise their difficulties	"if we thought about it from an attachment perspective where a lot of these children that have come
		into care and who are looked after, they haven't had that significant primary caregiver who they can
		build a consistent, attuned, you know, regulating, co-regulating attachment with and it's only after that
		co-regulation occurs that they can then start to understand and make sense of their own feelings
		through the other. And I think a lot of these children haven't had that in their early life, which means
		at a later stage or however old they are, when they come into care, they usually can't make sense of
		their feelings, you know?"
Young-people-relationship-to-	Young people may not trust services to help them	"I guesssome of them dotheyI don't know, they don't trust services and things and some of
help		them have been told don't talk, don't say anything, and don't, you know, talk to like social workers or
		professionals and things like that and so there might be that kind of element to it, that they don't want
		to let on actually, you know, be honest. They might think they're notwe're not going to listen anyway
		and there's not always that much trust"
Young-people-dislike	Young people do not like to fill in SDQs	"Well, anytime a questionnaire is brought out it's like "oh, do I have to do these again?" Because I
		think they've been through a system where they probably, in their journey into social care, had to fill
		out a lot of questionnaires and had to do a lot of answering of questions and, you know, telling people
		about their background or telling people how they're feeling, all the rest of it. So when you bring
		something up, I've got to admit that I sometimes do feel like oh, do I have to put them through this?"
Young-people-report-internalising	Young people report internalising difficulties	"It's interesting that she saw that though [points to raised emotional symptoms score], and like that
		[conduct difficulties score] is really low whereas the carers I would imagine would've scored that really
		high"
	<u> </u>	

META: all respondents	Clinician describes issues that can affect all respondents	
Respondents-context-impacts	Clinician reports that children's contexts can impact on SDQ score	"I think, say if somebody's move placements quite a lot and they maybe had to adapt to two different things, or if behaviour is very much a mask but, yeah, I think when somebody's moved or they've only just moved into a placement, and then they're not really been able to like have time to settle into a routine, or like a carer might not really know what they are like sort of in all situations, they might be kind of much more heightened or hypervigilant than they may have been before."
Respondents most authentic [merged with View-SDQ-helpfultool]	Clinician reports that most respondents complete authentically	"I think most people do like do record them and complete them sort of authentically. And I think most people, it does prompt some sort of a, "Oh, has that?" you know, some sort of thought and some sort of maybe reflection, but I think it's how we use them."
Respondents-multiple	Clinician describes the use of multiple SDQs from different informants	"I actually think that they can be quite helpful for like showing the differences betweenot about the number as such but showing the differences in sort of the themes say across school and home, and I think that regardless as to what the number is that if, you know, somebody's highlighted to have kind of lots of problems at school but not at home or the other way around, that I think can be like quite eye-opening because you can kind of think, oh, what's going on there."
Respondents-subjective	Clinician reports that responses on the SDQ are subjective opinions	"Well it depends on who's doing the scoring, so you have a highly anxious foster carer that come in massively high, we used to get ridiculous scores and things, which are actually quite small problem sometimes, and you look at it and think, "Well okay." Yeah, they're not that good at school, but they go, they're a bit argumentative, they don't like doing some of the things that they're supposed to do for chores, blah, blah, blah, scores like through the roof, because there's someone who doesn't tolerate it. We have other, very competent foster carers that can handle that sort of stuff quite easily, who would score the same person a lot lower. This is where the scores don't really mean a lot."
META: impact of child characteristics on SDQ score		
Impact-disability	Clinician describes the impact of disability on SDQ scores	"But lear- learning issues, I think that one could be a problem because II meanwell it's not specific for that soand they wouldn't be able to do the self-report, so yeah."

Impact-ethnicity	Clinician describes the impact of ethnicity on SDQ	n/a
	scores	
Impact-gender	Clinician describes the impact of gender on SDQ	n/a "I certainly don't feel that there's tendencies for things to be picked up more by SDQ based on
	scores	gender or difficulties picked up No I don't think there are concerns as such."
META: Things the SDQ misses in	Explicit statement about or example of difficulties	
looked after children	missed by the SDQ	
Sdq-misses-attachment	The SDQ misses attachment difficulties	"It's not made to screen for attachment. So it might not because you might get a really over-
		compliant child who has got a type of attachment where they're a bit frozen or a bit kind of um, so
		the opposite of fight and flight I suppose. So this child who's in the fight or flight mode is sort of really
		acting out and would really probably show up on an SDQ because it'll be like all their – everything's
		externalised, whereas a child who's actually quite withdrawn and compliant, they might not really
		come up on that but actually there's a lot to be a bit worried about with them, so yeah, it's something
		like that."
SDQ-misses-birth-family-issues	The SDQ misses difficulties in relation to the child's	"So I guess for that young person, she really wanted to move back in with her mum. She was in a
	birth family	conflicting situation of, 'my mumdoes she love me? Does she not?' She got scapegoated as a child.
		She had gender identity difficulties as well because her dad had always wanted her to be a boy. You
		know there was so much to it that actually, it doesn't really capture it."
SDQ-misses-child-carer-	The SDQ misses the quality of the child-carer	"Some of the difficulties that specifically stem from adverse childhood experiences that were really
relationship	relationship	impacting on children's placements, so children being very controlling, trying to keep control and
		being very adult in their presentation, not being able to kind of tolerate boundaries from adults. Those
		kinds of things are not well-captured on the SDQ but were underpinning quite a lot of the instability
		in placements and things that we were seeing."
SDQ-misses-within-carer-	The SDQ misses difficulties within the carer	I think the other thing that this doesn't capture is carers, you know, their own perspective, their
difficulties		attachments, their background, because anything that you see, any behaviour, it takes two you
		know, there's an interaction between two people and it's the other person's behaviour that then
		interacts with orI don't know, has an impact on the child's behaviour. So I think it doesn't capture
		that
SDQ-misses-complexity	The SDQ misses the complexity of children's	"I don't think it captures the complexities and intricacies of what we might see in looked after children.
	difficulties and contexts	You know, things aren't as straightforward as how an SDQ makes out it is. I don't think it works as a
		screening tool. I think there's a lot more to the physical things that we see and the symptom-like

		things that we see. There's a lot more in terms of the relationships, the carers, the school, you know, everything. It's so multi-dimensional that an SDQ isn't going to capture that."
SDQ-misses-developmental-trauma	The SDQ misses developmental trauma. To include direct references and descriptions covering aspects of proposed diagnosis including exposure, patterns of repeated dysregulation, persistently altered expectations and impairment in everyday functioning.	"Sothis boy is so complex, it's really hard to say. So, PTSD-type symptoms, developmental trauma, he's on the kind of I think he might be on the autistic spectrum so there's other reasons why he might not be able to verbalise how he's feeling butreally struggles to get in touch with how he's thinking but clearly, he's really anxious and just doesn't really trust adults as well."
SDQ-misses-internalising- problems	The SDQ misses children whose emotional difficulties are internalised. To include explicit references to internalising difficulties and descriptions e.g. withdrawn, depressed, anxious.	"I think it was missing in the sense that internalising problems are usually under-reported. So if you have a really baldy behaving boy or girl that likes to smash their room up when their angry, then the scores are usually really, really high, but you have someone that doesn't do that sort of thing, and their scores are usually normal or low, when it doesn't mean actually that they're doing very well at all And I think that's the problem between externalising and internalising problems, it doesn't pick up on the ones that are struggling and muddling, getting through, but in the end actually, often end up in the worst state than the externalising ones."
SDQ-misses-relational difficulties	The SDQ misses relational difficulties	"It doesn't capture I think the whole range of difficulties children have in trying to, one makes sense of their world and two form relationships with new people sometimes on quite a regular basis. You think about what they're going through every time they move foster placement or every time they move to a new school, or they have a new social worker and they're just constantly meeting all these people who don't really know them and they're working out who everybody else is."
SDQ-misses-risk	SDQ misses risk	"It certainly doesn't pick up anything about psychotic presentation, certainly it doesn't pick up anything about PTSD, and certainly it doesn't pick up anything about complex self-harming or even low moods to a degree. It might pick up generic kind of pointers to a low mood or emotionally, you know, emotional difficulties category, but it doesn't differentiate much or it doesn't give I think a higher score, you know, just because you tick often on a lot of the cases, or very often, it doesn't mean that it can differentiate most specifically about the element of mental health risk increasing, it might still give it in the same bracket as middle or high where in fact the mental health risk can be high or very high, if that make sense."

SDQ misses sexual behaviour Covered by other codes e.g. sdq- misses-risk META: SDQ identifies	Clinician reports or gives examples of the SDQ missing worrying sexual behaviour Explicit statement about or example of difficulties	"The child who had been sexually abused had been sexually inappropriate with other children at school, and so he had a risk assessment around him and lots of supervision."
	identified by the SDQ	
SDQ-identifies-attention	The SDQ identifies attention and hyperactivity difficulties in children	"If it was like let's say a child with ADHD or something, they're going to score very, very high but then there might be children that don't really act out that they wouldn't soso I don'tagain, I don't think it's that helpful for that kind of group, and it might score too high for a group thatyeah, there's kind of developmental stuff, ADHD or something like that."
SDQ-identifies-behaviour	The SDQ identifies behavioural/conduct difficulties in children	"I think the reason that children were scoring highly is because they would have a quite high score for conduct difficulties and then a kind of moderate score for emotional problems because they were usually having big outbursts of emotion and anger, being kind ofthey were, they were, the kind of narrative was usually that they're defiant, they're controlling, that they won't be helped, they won't stick to the rules, and that kind of picture of a child who's struggling in that way rather than a child who's struggling with mood per se."
SDQ-identifies-emotional	The SDQ identifies emotional difficulties	"The SDQ is a measure to look at the sort of emotional areas, behaviour areas. Yeah, the strengths as well, I guess, and the difficulty, it's in the name."
SDQ-identifies-strengths [Merged with: view-sdq-helpful-tool]	The SDQ identifies strengths	"And I think it is about strengths as well as difficulties which, again, I think that's important to actually think about strengths."
SDQ-identifies-symptoms-not- problems	The SDQ identifies symptoms rather than core difficulties	"So for instance high attachment problems where might lead to a high score or high behaviours through attachment might lead to a high behaviour score for SDQ, yes, in that senseit probably might pick up something, but I'm not sure how reliably it would pick it up because it doesn't actually pick up the main problem, it's inadvertently through some kind of behaviours which the questions depict, it might pick up some problems and increase of problems."

requirement of the service	
Clinician describe service commissioning	"so the team is commissioned to do six session to start with, but there was the possibility after a
requirements	review to add an additional six sessions if it was absolutely necessary, but that was it, and we weren't
	supposed to let it run over that"
Clinician suggests that SDQ cut-off scores may lead	"So I suppose it would've potentially been on people's minds because, in terms of sort of pressure for
to children in need of help being declined a service	throughput and pressure to kind of maintain a manageable caseload would sometimes feel like we're
	looking for reasons not to offer a service and that may well have been one of them. And I'm sure in
	some cases, that did happen"
	"I think they need to be used with caution. I think that the problem is people who are non-clinical see
may over-estimate the reliability of the SDQ	them as, er, a sort of gospel. "Oh, this says that, therefore it must be so." It's dangerous, and it's
	dangerous in a sense that operational managers, because they are not clinically based, will think no,
	it's 15 or bust, and yet the evidence is that actually there's quite a serious problem going on, and
	although they scored under 15, you've still got to see them."
	"I think there's, there was pressure to manage referrals and there's capacity pressure in the team, in
service criteria	any team. So I suppose it would've potentially been on people's minds because, in terms of sort of
	pressure for throughput and pressure to kind of maintain a manageable caseload would sometimes
	feel like we're looking for reasons not to offer a service and that may well have been one of them."
Clinicians describe being unclear about how SPA	"I'm wondering what weight SPA puts on it because I haven't seen that many that come through that
implement service criteria	haven't that have been below 15. So I guess that's a screening tool for them as well to say, oh, you
	know, does it meet CAMHS targeting criteria? So I'm thinking they must put some weight on the
	content of the referral as well"
Clinicians describe service-level difficulties with	"It got very expensive and so the trust don't pay for it, so now we don't even get the computer
administration of the SDQ	generated results for it, which were more useful than what we get now, which is where they get
	marks, and then put into a computer system that is separate from the system that we use, and
	therefore most people don't really look at them very much."
	Clinician describe service commissioning requirements Clinician suggests that SDQ cut-off scores may lead to children in need of help being declined a service Clinician reports concerns that non-clinical people may over-estimate the reliability of the SDQ Clinicians describe pressure to abide by official service criteria Clinicians describe being unclear about how SPA implement service criteria Clinicians describe service-level difficulties with

META: slightly raised		
Slightly-raised-behaviour	Clinicians describe behaviour difficulties in children scoring in the slightly raised range	"For the foster carer, she found difficulties as being the child's behaviours and she was sort of stressed by anything, she'll become quite physically violent. And the foster carer wants some strategies to manage her violence but also her high levels of anxiety."
Slightly raised birth family [Merged with: SDQ-misses-birth-family-issues]	Clinicians describe birth family related difficulties in children scoring in the slightly raised range	"She doesn't have any contact with her birth family and that was sort of causing issues for her."
ramily-issuesj		
Slightly raised underestimates	Clinician states that the SDQ score underestimates the difficulty of children scoring in the slightly raised	"I think it doesn't really capture those relationships, the background, her self-beliefs and her beliefs of others and how they treat her. So many things that it doesn't actually take into account. It just kind of
Covered by: SDQ-misses-LAC-difficulties	range	takes into account those surface-level, what people might be seeing, um yeah "
Slightly-raised-developmental-	Clinician describes developmental trauma in child	"Sothis boy is so complex, it's really hard to say. So, PTSD-type symptoms, developmental trauma,
trauma	scoring in the slightly raised range	he's on the kind of I think he might be on the autistic spectrum so there's other reasons why he
		might not be able to verbalise how he's feeling butreally struggles to get in touch with how he's
Covered by: SDQ-misses-		thinking but clearly, he's really anxious and just doesn't really trust adults as well."
developmental-trauma		
Slightly-raised-overestimates	Clinician suggests that the SDQ over-estimated	"I just remembered being involved twice, I think it was - where everyone was convinced there was
	difficulties in child scoring in the slightly raised	something awful going on with this young person and it's like, "Oh my god, you got to sort it. Oh god,
Covered by other codes	range	it's awful." And every time we saw him we thought, "There's not much wrong with him."
Slightly-raised-accurate	Clinician states that "slightly raised" was an	"I think that's a fair description to use. Yeah There were some issues in the placement but they
	appropriate description of the child's difficulties	weren't severe so they may only become triggered like one of the children, every time the education
Merged with view-sdq-helpful-tool		department try to get him in school, that would trigger her bouts of anxiety and so life would become more difficult. But outside of that, life is actually fairly calm for her."
Slightly-raised-learning-difficulty	Clinician reports learning disability in child scoring in	"One's got a learning difficulty, so she has issues with sort of processing information."
	the slightly raised range	

Slightly-raised-peer	Clinician reports peer relationship difficulties in child	"Having peer relationships which could be seen as just being, you know, a difficult personality so so
	scoring in slightly raised range	again, quite subtle."
Slightly-raised-PTSD	Clinician reports PTSD symptoms in child scoring in	"He has he has a lot of anxiety and he'd recently been having quite intrusive flashbacks and
	the slightly raised range	things."
Merged with: SDQ-misses-		
developmental-trauma		
META: treatment	Descriptions of interventions given by the team	
Treatment child-carer-	Focus of treatment is the child-carer relationship	"What I've kind of found is once an intervention or whatever the work is that you're doing is complete,
relationship	Todas of a cautiona is and smile said relationship	you might not see a change in behaviours or a change in presentation, but what you do see a change
relationship		in is how the carers understand and make sense of what they're seeing, their levels of toleration,
[Merged with: patient-child-carer-		which are also impacted on by understanding, and that in itself has a huge difference in how that
relationship]		relationship and the attachment then forms and builds. So I think sometimes when people look at the
, , , , , , , , , , , , , , , , , , , ,		difference in scores, they might not see a lot - and that's what commissioners look at - but actually,
		there's been a lot of positive changes.
Treatment_longterm_impact	Clinician describes treatment impact as emerging	"I can think of four or five people that made big changes, improvements, and the rest didn't. That
	over time	doesn't mean they didn't- they won't make improvements though, because I often tell families, it's a
[only 1 example, covered by		bit like watching a plant from a seed, you put your seed in the earth and you start watering it, and you
other codes]		keep looking at it every day and nothing happens, you think that's it, nothing's happened. You carry
		on watering it, eventually, something start poking through, and a lot of interventions we might do, we
		don't get to see the benefit of."

Coding example

Transcript	Codes
I: how would you describe the types of difficulties that were	
experienced by children that you were seeing in that team?	
00:01:14	
C8: So difficulties around stability in placement, difficulties	Patient-child-carer-relationship
with so, children would often referred in difficulties like	
anxiety, depression, anger but my understanding would be	Diagnosis
more that the children who have had developmental trauma	Population-attachment-developmental-trauma
experiences and are struggling with emotional regulation	Population-emotional-regulation
across the board rather than specifically a kind of clinical	problems-with-diagnosis
anxiety or clinical depression problem.	
00:01:49	
I: And in that way how would you say they're different from	
other children in different types of CAMHS services?	
00:01:59	
C8: So I don't think in other parts of CAMHS, the children	
are doing okay inthey're doing generally okay, they're	
functioning okay apart from the clinical aspect of the	
problem, so they're doing okay at school, they're generally	
doing okay, they're not having huge problems in	
relationships with people, that they've got a more definable	Diagnosis
clinical problems, so depression looks more like kind of	
classic depression – I'm doing inverted commas on tape. It	
looks more like when people are withdrawn, flat, feeling	
hopeless and that might be having an impact on them at	
school but generally speaking in terms of relationships	
they're functioning okay whereas the young people that was	
seen in the targeted team having problems that were kind of	Problem-relationships
rooted in their relationships - more attachment based	Population-attachment-developmental-trauma
problems and they were having difficulties with sort of	
angry outburst, sadness that was having more of a	Population-emotional-regulation
widespread effect across the board in areas of their lives.	
Does that make sense?	
I: Yes. So when referral was came in to that team how did	
you decide whether the child have the kind of difficulties that	
needed treatment from a mental health service?	
00:03:23	
C8:	
See there was supposed to be an SDQ cut off that wouldn't	Decision-SDQ-cut-off-flexible
necessarily take precedent if there was a clinical need also	Decision-clinical-judgement-key
described in the referral, but more often than not there was	
a requirement for an SDQ cut off to be met and that would	Decision-SDQ-15+required
be kind of the initial discussion. We'd be looking at that and	
reading the referral information but what was common was	Decision-process-consultation
for that to be a consultation offered to the social worker and	

carer in most cases and at that point we can make a better decision about whether we were the right service or whether they needed a service of any sort at all. So usually it was SDQ and look at the referral initially, have a chat about that and then offer a consultation. It was not very common for a consultation to not be offered to a social worker and carer to hear a bit more about what was going on.

00:04:21

work there first.

I: And what... how would you make the... what would you be looking for in terms of children that needed more help, like how...how would you decide that?

00:04:33 S2: So it might have been that there was a kind of diagnosable clinical problem like anxiety or mood difficulties or a kind of PTSD type presentation but quite often we were looking at functional difficulties that they were having, so how are they getting on in school? How are the things going at home? What could we do in the placement to try and stabilize things for them so they didn't have another placement breakdown. And quite often I suppose the input wasn't for the child directly, it would have been indirectly via the carers, so we might invite foster carers and they would have... they would received the direct intervention with a clinician and then that would be kind of by proxy supporting, so helping the carer to help the child. But we did have a small number of cases where there were... where the child's goal was to feel better or to get out and do more, so there would be a short piece of work that was done with the child around that. So the targeted team is...was a time limited service when I was in it. So there was usually an aim to kind of hold only short term pieces of work which I think impacted a little bit on the interventions that we were able to offer as a service. So children would quite often come in, be referred in because the placement was in crisis and there was a feeling that the placement needed to be stabilized by social care before we could intervene or support. And I think part of the reason for that is because we're a time limited service. So that wouldn't have been my preference. My preference would be we can support the child regardless of whether they were in a stable placement or not, or support the carers to help the child through that instability, but because we're a time limited service guite often those kinds of referrals would be put back to social care to do a bit of

Diagnosis.

Population-internalising-difficulties

Population-PTSD

Decision-current-functioning

Patient-child-carer-relationship

Pateint-child

Decision-service-context

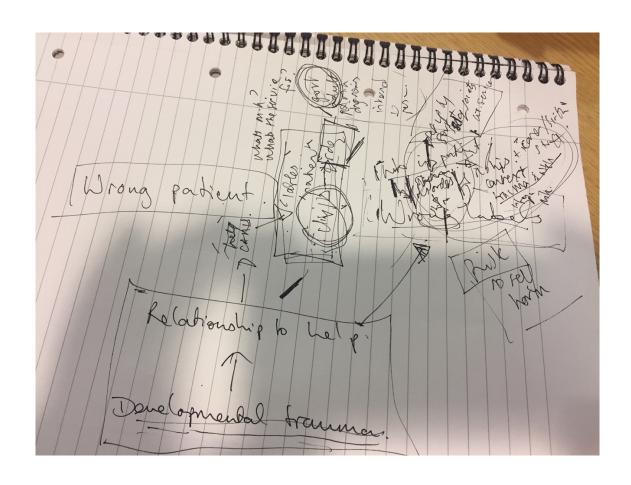
Decision-carer-placement-factors

Patient-child-carer-relationship

Decision-service-context

Appendix 12:

Example of theme development



Quantitative study evaluation using CASP Guidelines for

Diagnostic Tests

Section A: Are the results of the study valid?		
Was there a clear question for the	YES. The research question for the quantitative phase of the study is: How well	
study to address?	does the SDQ perform in identifying looked after children whose mental health	
	difficulties require treatment in referrals to a specialist mental health team?	
Was there a comparison with an	YES. SDQ scores were compared to the outcome of an assessment of the child's	
appropriate reference standard?	referral by a multi-disciplinary specialist LAC CAMHS team. Whilst it could be	
	argued that these assessments were not standardised and arguably subject to	
	individual bias and service pressure, this study takes the view that this is currently	
	the best available assessment of the complex mental health needs of this	
	vulnerable group, given the limitations of diagnostic classifications in capturing the	
	mental health needs of this group. It should, however, be noted that assessments	
	took place in the context of recruitment for a feasibility Randomised Controlled Trial,	
	and it is therefore possible that pressure to get the numbers for the trial could have	
	influenced the outcome of assessments.	
Did all patients get the diagnostic	NO. All referrals to the team must include at least one completed SDQ and should	
test and reference standard?	then be assessed by the MDT, so all children included in the study had both and	
	SDQ and an outcome of their referral. However, these comprised different versions	
	of the SDQ from different respondents. Of 144 children referred, 97 (67%) had an	
	SDQ-P, 41 (28%) had an SDQ-T and 41 (28%) had an SDQ-P. Respondents were	
	not selected at random; we must assume that there was some reason why	
	respondents were chosen or were willing to complete the measure. Furthermore, it	
	is important to note that this study was conducted within a real-world CAMHS	
	setting. This results in high external validity, which is achieved at the expense of	
	internal validity, because only children referred to the Targeted Team, and not all	
	children in the local LAC population, were included in the study.	
Could the results of the test have	YES. Clinicians were not blind to SDQ scores and actively considered them when	
been influenced by the results of the	making a decision on whether to offer treatment. Findings should be reviewed with	
reference standard?	caution because of this. However, the evidence presented here shows that children	
	were offered treatment despite low SDQ scores and were not offered treatment	
	despite high SDQ scores, despite SDQ scores of 15 or more being a requirement of	
	accessing the service. This provides important information about clinician	
	confidence in the SDQ. It is also relevant to consider that the criteria for the service	
	may have prevented some social workers from making referrals for children with	
	lower scores, although the presence of referrals for children with lower SDQ scores	
	indicates that this was not always the case. Further research should ensure that	
	clinicians are blind to SDQ scores and that their assessments are not influenced by	
	these scores (i.e. do not use the DAWBA diagnostic interview, as was used in	
	Goodman <i>et al.</i> 's 2004 study, but which prompts clinicians to ask additional	
	questions based on SDQ scores).	
Is the disease status of the tested	N/A. This is not a test for a specific disease, but a screening for any mental health	
population clearly described?	problem. As discussed throughout this thesis, defining mental health difficulties in	
population ordary dodonbou.	this population is a subject of considerable debate. The numbers of children whose	
	this population is a subject of considerable debate. The numbers of children whose	

	referrals were accepted by the team or referred for treatment at another CAMHS
	team, mental health or neurodevelopmental service are described. In this study, a
	recommendation of treatment is taken to denote the presence or absence of mental
	health difficulties requiring intervention.
Were the methods for performing	NO. In this study, the measure (the SDQ) was not administered by the researcher or
the test described in sufficient	
	by clinicians working in the service. Instead it was submitted by the referring social
detail?	worker with the CAMHS referral. As a result of this, no protocol was followed and
	the conditions and process of administration is unknown. However, this is in line
	with statutory guidance on monitoring the mental health of looked after children in
	England is collected. It therefore gives important information about the SDQ as it is
	commonly used in real-world settings.
Section B: What are the results?	
What are the results?	The results are clearly summarised in the Results section. Sensitivity, specificity and
	likelihood ratios are clearly presented for a wide range of cut-off scores, to enable
	the reader to weigh up the benefits and costs of different cut-off scores.
How sure are we about the results?	Confidence intervals are reported and highlighted in the Results section. This was
Consequences and cost of	an opportunistic sample as part of a feasibility RCT and the samples were relatively
alternatives performed?	small, therefore confidence intervals are large and reported figures should be used
	with caution.
Section C: Will the results help locally	?
Can the results be applied to the	This sample of looked after children is likely to have enough similarities with children
population of interest?	referred to other teams in England to be of use to them. However, demographic
	information relating to the sample is limited, because this was not collected as part
	of the initial screening for eligibility in the RCT. Ethnicity and nationality are
	particularly notable omissions, given the growing numbers of unaccompanied
	refugees in the looked after population, and the lack of literature on the impact of
	culture on the utility of the SDQ as a screening measure. Again, it is important to
	highlight that the study population was children referred to CAMHS and not all
	looked after children.
Can the test be applied to your	YES. The SDQ is freely available and is already commonly used in LAC CAMHS
patient or population of interest?	teams and by Local Authorities, as a result of statutory requirements. Hand scoring
patient of population of interest:	guidelines are freely available and are used in this study (as opposed to the online
	algorithm, which now attracts a small charge). The results of this study may be
	useful to commissioners and service managers in considering if and how the SDQ
1	should be used in services. Recommendations can be found in the discussion.

Quality review: Elliot, Fischer & Rennie, 1998

The study was evaluated using criteria from Elliot, Fischer & Rennie, 1998. These criteria were selected for this mixed-methods study because they include an initial set of seven evaluation criteria shared by both quantitative and qualitative approaches, in addition to a further set of criteria applicable to qualitative research (Elliot, Fischer & Rennie, 1998).

Criteria	Evidence for meeting criteria
Explicit scientific context and	The Introduction and Systematic Review chapters clearly establish an important
purpose.	rationale for the study. The gaps in the evidence base relating to the reliability of single-
	informant SDQs in screening for mental health difficulties in looked after children are
	highlighted. Research questions are clearly stated. The importance of this question to
	the LAC population in England, and to the mental health clinicians who serve them, is
	clearly articulated in the context of UK government policy.
Appropriate methods.	A mixed-methods explanatory design was selected because its complementarity would
	provide the most useful evidence in the context of the study's objectives, epistemology
	and research question. It enabled both an examination of the performance of the SDQ
	in screening for mental health difficulties in looked after children, and an exploration of
	possible reasons for the results found. The first, quantitative stage followed (as far as
	possible with the available data) CASP guidelines on diagnostic tests. The second,
	qualitative stage used Thematic Analysis, which was selected for a number of reasons
	including its ability to bridge the languages of quantitative and qualitative research, its fit
	with critical realist epistemology, its systematic and transparent qualities, and its
	capacity to produce results that are accessible to the educated public and well-suited to
	informing policy development. A limitation of the choice of Thematic Analysis over a
	critical realist version of Grounded Theory is that emerging themes raised by clinicians
	could not be explored in detail with other audiences, such as looked after children or
	their carers, which would have added richness and depth to the findings and could have
	been used to generate theory.
Respect for participants.	The methods section explains how ethical issues were carefully considered to ensure
	that the welfare of participants prioritised throughout. The study was designed to
	ensure that minimal, anonymised data collected via the screening log for an RCT was
	used to maximum benefit, whilst avoiding harm to participants, in line with the Code of
	Human Research Ethics (BPS 2010). Approval from the research ethics committee in
	Appendices 3-5, and participant information sheets and consent forms can be found in
	Appendices 6-7.
Specification of methods.	The process for collecting data in both the quantitative and qualitative stages is
	documented in the Method section. The semi-structured interview guide is included in
	Appendix 8. Steps for quantitative and qualitative data analysis are documented. A full
	coding frame and a sample of a coded transcript can be reviewed in Appendices 10 &
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	11. The information provided is sufficient for the study to be replicated, and for the
	quality of the study to be evaluated by the reader.
	4,,,,
Appropriate discussion.	The discussion chapter situates the findings in the context of wider literature, and
Appropriate discussion.	considers the implications for government policy, commissioning, research design and
	clinical practice. Strengths and limitations are discussed.
	clinical practice. Strongths and limitations are discussed.
Clarity of presentation.	The manuscript is organised into chapters, and structured with sub-headings, in APA
Gianty of presentation.	format. A contents page is provided. Technical terms are defined.
	Torriat. A contents page is provided. Technical terms are defined.
Contribution to knowledge	The study provides an important contribution to the literature on the use of the SDQ with
Contribution to knowledge.	
	looked after children. As outlined in the introduction, the study addresses a highly
	relevant and timely question, given current debates over the role of the SDQ in
	screening for mental health difficulties in looked after children at entry to care and
	annually. The finding that a substantial proportion of looked after children's difficulties
	are not identified by the SDQ has important implications for its use a screening
	measure. The qualitative phase adds weight to this finding by exploring clinicians' views
	about the reasons why some looked after children's difficulties are not identified,
	providing important information about the SDQ's limitations when used with this
	population.
Owning one's perspective.	The author's relationship to the subject of research is outlined in the introduction, and is
	considered in the discussion of the findings. The level of information provided is
	suitable for the critical realist epistemology and choice of thematic analysis as a
	qualitative method. Attempts to minimise the impact of the author's own perspective on
	the research findings are described; see "providing credibility checks" below.
Situating the sample.	Basic information about the Targeted Team and the clinicians interviewed for the study
Chairing the campion	is provided to aid the reader in judging the extent to which findings might be relevant to
	other clinical settings. Due to the mixed-methods design, basic information about the
	children referred to the team during the study period is also provided.
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Grounding in examples.	Every theme and subtheme in the results section is illustrated with quotes from
	participants, demonstrating how they are grounded in the data. The full coding frame,
	with annotations to show its development, is included in Appendix 10, an excerpt of a
	coded transcript is included in Appendix 11, and an illustration of the evolving thematic
	map is included in Appendix 12, enabling reader appraisal of the fit between the data
	and the codes and themes identified by the author.
Droviding orgalibility - 11	Stone were taken to encure that the excesse of coding was to see a size of coding was
Providing credibility checks.	Steps were taken to ensure that the process of coding was transparent, rigorous and
	credible. These included the use of a second independent coder, who used the coding
	frame to code approximately 10% of the dataset. Differences in coding were compared
	and used to improve the coding frame. Early themes – with examples – were checked
	with young people with care experience. The second supervisor also provided feedback
	on the coding frame, themes and map throughout the process.
Coherence.	Efforts have been made to represent themes and subthemes clearly and coherently,
	within a strong, over-arching narrative, whilst also representing the nuances in the data.
	•

Accomplishing general vs.	This study interviewed a small sample of clinicians (n=9) who worked in or had worked
specific research tasks.	in a single Tier 2 specialist LAC CAMHS team, about their work in that team. Caution is
	therefore required in generalising findings across other LAC mental health contexts.
	Care has been taken to include adequate detail about the team and clinicians, to enable
	readers to make informed judgements about the extent to which these findings might be
	applicable to their own contexts.
Resonating with readers.	It is hoped that this document presents the research in such a way as to stimulate
	resonance in readers or reviewers.