

CONCEPTUAL POSSIBILITIES OF MAKING A DUAL DIAGNOSIS OF CONDUCT DISORDER AND ASPERGER'S SYNDROME IN CHILDREN

**A research report submitted in partial fulfilment of the requirements for the
degree**

Master of Arts in Clinical Psychology

**In the faculty of Humanities at the
University of the Witwatersrand, Johannesburg**

NOVEMBER 2008

By:

Andrea Jamieson

Student Number:

0305833T

Supervisor:

Renate Gericke

Declaration

I declare that this research report is my own, unaided work. It is submitted for the degree of Master of Arts in Clinical Psychology at the University of the Witwatersrand, Johannesburg. It has not been submitted before for any degree or examination at this or any other university.

Signed this 12th day of October 2009.

Andrea Jamieson

Word Count: 31 190

Abstract

Very few studies have addressed the possible dual diagnosis of conduct disorder (CD) and Asperger's syndrome (AS) in children and as such there is little evidence to either support or dispute such a dual diagnosis. This research explored psychodynamic professionals' opinions on the possibility of the dual diagnosis of CD and AS in children by considering how these clinicians conceptualise each disorder in terms of attachment (Bowlby) and mentalisation (Fonagy) theory, and whether they believe an overlap can or cannot exist diagnostically and/or theoretically. The research drew upon four clinical psychologists and four child psychiatrists' experiences of these disorders in their clinical practice. Semi-structured interviews were utilized and the clinicians' responses were analysed using thematic content analysis. The results indicated that the clinicians understand each disorder inversely where CD is related to impaired attachment and AS to impaired mentalisation and that only superficial diagnostic and theoretical overlaps exist between the two disorders, indicating that AS and CD are not a single construct. The possibility of dual diagnosing CD and AS is understood by some clinicians to occur due to impaired attachment or if a child with AS is exposed to additional risk factors often implicated in the development and persistence of CD. However, some clinicians highlighted that a dual diagnosis is not possible as a child with AS does not have the biological 'wiring' to engage in behaviour that children with CD manifest and that a dual diagnosis is precluded for children with AS as diagnostic systems do not allow for such a possibility.

Abbreviations = Asperger's syndrome (AS), conduct disorder (CD), pervasive developmental disorders (PDD), Theory of Mind (ToM)

Acknowledgements

To all the clinicians who gave so graciously of their time to help provide insight into an area of research about which little is known, thank you. Your willingness and generosity to share both your experience and professional opinion is deeply appreciated.

A special thank you to my supervisor, Ms Renate Gericke, for her guidance and insightful contribution, without whom this research would have been an insurmountable task.

I am grateful to both Wendy and Alison for spending many hours helping to refine this project, thank you.

Finally, to my partner and best friend, Mike, your care and support has been invaluable.

Table of Contents

DECLARATION	i
ABSTRACT	ii
ACKNOWLEDGEMENTS	iii
CHAPTER 1: INTRODUCTION	1
CHAPTER 2: LITERATURE REVIEW	5
2.1 Pervasive Developmental Disorders	5
2.2 Disruptive Behaviour Disorders	7
2.3 Attachment Theory	8
2.4 Mentalisation Theory	14
2.5 AS, attachment, mentalisation and empathy	16
2.6 CD, attachment, mentalisation and empathy	25
2.7 AS and CD: Co-morbid or mutually exclusive	32
2.8 Conclusion	35
Research questions	37
CHAPTER 3: METHOD	38
3.1 Sample and Sampling	38
3.2 Procedure	39
3.3 Data Analysis	42
3.4 Ethical Considerations	44
CHAPTER 4: RESULTS	45
4.1 Clinicians' understanding of the conceptualisation of Asperger's syndrome in relation to attachment theory	45
4.2 Clinicians' understanding of the conceptualisation of conduct disorder in relation to attachment theory	48
4.3 Clinicians' understanding of the conceptualisation of Asperger's syndrome in relation to mentalization theory	51
4.4 Clinicians' understanding of the conceptualisation of conduct disorder in relation to mentalization theory	54

4.5 Clinicians' opinions of diagnostic and theoretical similarities and differences between Asperger's syndrome and conduct disorder	60
4.6 Clinicians' opinions regarding the possibility of the dual diagnosis of AS and CD in children	63
4.7 Clinicians' opinions about the possibility of misdiagnosis AS as CD	69
CHAPTER 5: DISCUSSION, LIMITATIONS & RECOMMENDATIONS	71
5.1 Discussion	71
5.2 Limitations	86
5.3 Implications and recommendations for future research	87
CHAPTER 6: CONCLUSION	89
REFERENCE LIST	92
APPENDICES	i
Appendix A: Participant Information Sheet	i
Appendix B: Informed Consent Form	iii
Appendix C: Audio Tape Consent Form	iv
Appendix D: Interview Schedule	v
Appendix E: Interview Transcripts	ix
Participant one	ix
Participant two	xv
Participant three	xxi
Participant four	xxvii
Participant five	xxxviii
Participant six	xlvii
Participant seven	lvii
Participant eight	lxxii

CHAPTER 1: INTRODUCTION

A recent newspaper article detailed how an adolescent diagnosed with Asperger's syndrome (AS) had been found guilty of a cyber crime that involved approximately R156 million in damage to computers worldwide (Squires, *The Citizen*, May 2008). He admitted to accessing a computer for dishonest purposes which leaves one questioning the intention of such behaviour in an adolescent with AS and whether this behaviour is characteristic of the disorder itself as these children show repetitive, narrow interests and social dysfunction; or would this individual be manifesting traits of a disruptive behaviour disorder as he has violated the rights of others as well as societal norms?

Hans Asperger's first description of AS placed emphasis on the unpleasant behaviour manifested by children with the disorder and referred to what he called 'autistic acts of malice' that appear to be calculated and sometimes provide these children with a sense of delight (Rogers, Viding, Blair, Frith, & Happe, 2006). However, this is not true of all children with AS as some authors have pointed out that although these children may engage in behaviour that is hurtful and seems malicious, the intention is not to cause harm (Frith, 1991), but what about the children that do engage in antisocial or aggressive behaviour? The question is whether such children exist on the spectrum and if so what factors would contribute to the development of such malicious behaviour and intent to cause harm.

Anecdotal reports have suggested a possible correlation between AS and violent behaviour (Chen et al., 2003; Everall & Lecouteur, 1990; Haskins & Silva, 2006; Kohn, Fahum, Ratzoni & Apter, 1998; Mawson, Grounds, & Tantam, 1985; Palermo, 2004) but the research does not account for the occurrence of conduct disordered symptoms in certain individuals with AS and whether these symptoms are part of the disorder or demonstrative of a separate manifestation of a behavioural disorder. Although there may be evidence in relation to the presence of aggressive and violent behaviour in individuals with AS, this is certainly not true for all individuals with this disorder (Palermo, 2004),

which essentially begs the question about why some children with AS develop aggressive behavioural difficulties and others do not.

Very few studies have addressed the possible dual diagnosis of Conduct Disorder (CD) and AS in children. In this respect, Proquest Psychology Journals, Academic Search Premier and Ebsco Host 'search engines' evidenced the paucity of research on such a possibility as there is little evidence to either support or dispute such a dual diagnosis. Some research attempts to address the possible overlap between these disorders but there is a lack of clarity in accounting for why AS and CD symptoms co-occur in some children (Rogers et al., 2006). Some studies highlight the lack of awareness and understanding in relation to conceptual understandings and whether an overlap exists or not between these two disorders (Palermo, 2004). Future suggestions from these studies have highlighted the need for further investigation and understanding into such a possibility as well as how symptoms can be accounted for either exclusively or comorbidly (Palermo, 2004).

Previous research has noted possible overlaps or differences between the two disorders (Gadow, DeVincent, Pomeroy, & Azizian, 2004; Gillberg & Billstedt, 2000), but hardly any have tried to account for why this may be. Some research has highlighted superficial similarities and differences between these two disorders (Green, Gilchrist, Burton & Cox, 2000), but few studies have addressed theoretical understandings in relation to these disorders especially in relation to psychodynamic theory. Academic Search Premier, Proquest Psychology Journals and Ebsco Host "search engines" evidence research on the theoretical understandings of mentalisation and/or attachment theory in relation to each disorder separately (e.g. Baron-Cohen, Leslie, & Frith, 1985; Rogers, Ozonoff, Maslin-Cole, 1991; Sutton, Smith, & Swettenham, 1999), but research has not been conducted on mentalisation and attachment theory in relation to the similarities and differences between these two disorders, and whether a dual diagnosis is or is not possible.

Attachment theory is one of the most influential theories in relation to children's social and emotional development and additionally provides one of the most useful frameworks for understanding risk and protective factors in development (Bowlby, 1973).

Additionally, reviewing theoretical concepts that consider the first relationship within which the infant experiences the world is often viewed clinically as the optimal time in which to intervene to prevent later mental health problems (Zeanah, Boris, & Larrieu, 1997). The parent-child relationship has been seen to be fundamental in the development of affect regulation, the ability to infer the mental state of the other and self, and the ability to empathise (Fonagy & Target, 2003). However, the fundamental underlying problem in CD has been linked to affect regulation and impaired attachment (Keiley, 2002) and both AS and CD have been viewed as disorders of empathy (Blair, Monson, & Frederickson, 2001; Baron-Cohen & Wheelwright, 2004).

It has been hypothesized that the development of a secure attachment between child and caregiver forms the basis for the development of empathy later in life (Diego & Jones, 2007). Children with CD are often understood as having an insecure attachment (Green & Goldwyn, 2002; Lyons-Ruth, Alpern & Repacholi, 1993; Penzerro & Lein, 1995).

Although there is evidence to suggest that children with AS attach securely (Connor, 2004; Rogers et al., 1991; Rutgers, Bakermans-Kranenburg, van IJzendoorn, & van Berckelaer-Onnes, 2004), there is a paucity of *recent* research into whether some children with AS do not attach securely and how this affects their ability to empathise and whether said attachment and mentalisation abilities hold true in the clinical setting when working with and trying to understand these children. This research therefore saw the importance of exploring how attachment and mentalisation are perceived to be involved in understanding these disorders, although there was room to explore other possible theoretical understandings in considering the clinicians' opinions.

However, further literature searches on Academic Search Premier and Proquest Psychology Journals "search engines" highlighted a dearth of research around clinicians' perceptions in relation to these disorders. As there is a paucity of theoretical understandings for why a dual diagnosis may or may not be possible, an investigation

into the clinicians' minds who are involved in clinical work with these children may help to clarify anomalies evident in the little research conducted previously and whether the role of the parent-child relationship is important in the development of additional behavioural difficulties in some children with AS.

As misdiagnosis of AS as CD has occurred in clinical settings (Scragg & Shah, 1994) and as these disorders are psychiatric in nature, this research further highlighted the importance of obtaining an understanding of professionals' opinions in relation to the diagnosis of CD in AS. Previous research has highlighted the importance for clinicians to consider possible autistic spectrum impairments that may underlie presentations of conduct symptoms (Green et al., 2000) and perhaps the reverse is also true. Again, evidence for significant symptomatic overlap was noted, but the research failed to account for a theoretical understanding for why an overlap sometimes exists.

This research is important as our understanding of the conceptualisation of either one or both conditions needs further refinement. Thus this research drew on experienced clinical opinion to inform, question, and build on existing theory with regards to the possibility of dual diagnosing AS and CD. As such the main aim of this research was to investigate psychodynamically orientated Psychologists and Psychiatrists' opinions on the possibility of the dual diagnosis of CD and AS in children by considering how these clinicians conceptualise each disorder in terms of attachment theory (Bowlby) and mentalisation theory (Fonagy). A further aim was to investigate whether clinicians believe an overlap can or cannot exist diagnostically and/or theoretically between these disorders. The research aimed to draw on these clinicians' experiences of these disorders in clinical practice to better understand each disorder more fully.

CHAPTER 2: LITERATURE REVIEW

AS and CD are frequently referred to as disorders of empathy or disorders governed by empathic dysfunction (Baron-Cohen & Wheelwright, 2004; Blair, 2005). As this research conducted a conceptual investigation, a review of appropriate theoretical understandings was important to fully grasp what is being studied and so as to better understand current diagnostic and theoretical positions of both CD and AS. This research is positioned in relation to psychoanalytic attachment theories where the concepts under study were considered using Fonagy and Targets' model of mentalisation in combination with Bowlby's attachment theory. The theories highlight the importance of the mother-child relationship in the development of empathy and in acquiring the ability to distinguish one's thoughts, beliefs and feelings as distinct from others. The main concepts are discussed with reference to both disorders in light of available research reviewed.

For the purpose of this research 'children' means persons from '2 years, 0 months' to '17 years, 11 months'. The reason being that in children's wards in hospitals in the South African context, professionals treat individuals from as young as approximately age two up until '17 years, 11 months' before being referred on to an adult ward (R. Gericke, personal communication, March 26, 2008). As both professionals working in hospital settings and private practice were considered for this research, a wide age range was selected so as to encompass possible variations in the understanding of what a child is in different settings.

2.1 PERVASIVE DEVELOPMENTAL DISORDERS:

Pervasive developmental disorders (PDD) refer to a broad array of impairments that are placed under one diagnostic umbrella because of the core similarities in behavioural symptoms (Mayes, 2003). According to the text revision of the fourth edition of the *Diagnostic and Statistical Manual of Mental Disorders* (DSM-IV-TR), PDD's are characterized by impairment in several areas of development and individuals show deficits in reciprocal social skills, communication skills and behavioural patterns where children with a PDD often exhibit difficulties in responding to their social environment;

are governed by narrow, restricted interests; and are inflexible to change (American Psychiatric Association, 2000). These disorders cause persistent dysfunction and manifest early in life (Sadock & Sadock, 2003). There are five PDD's included in the DSM-IV-TR namely autistic disorder; Rett's disorder; childhood disintegrative disorder; Asperger's disorder, and pervasive developmental disorder not otherwise specified (APA, 2000). There is reason to believe that autistic disorder and Asperger's disorder lie on a spectrum and may be similar disorders (Macintosh & Dissanayake, 2004), although findings have been inconclusive as of yet.

Recent research found high rates of emotional and behavioural disturbances in children with AS and according to parent reports, children with AS showed more symptoms of anxiety and disruptive or antisocial behaviour (Tonge, Brereton, Gray, & Einfeld, 1999), therefore, for the purposes of this research AS will be considered in greater detail.

2.1.1 Diagnostic criteria for Asperger's syndrome

AS is classified as a PDD and is characterised by severe impairment in social interaction where those with the syndrome demonstrate extreme egocentricity; and display restricted, narrow interests and repetitive patterns of behaviour (APA, 2000). According to the DSM-IV-TR (APA, 2000), speech and language peculiarities, non-verbal communication problems and motor clumsiness are present in Asperger's disorder. Those with Asperger's fail to develop peer relationships due to their lack of social and emotional reciprocity abilities and their inability to express pleasure in others' happiness (Sadock & Sadock, 2003). Narrow interests are often pursued to the extent that other activities are excluded and communication difficulties result from social dysfunction and the inability to appreciate nonverbal cues (APA, 2000). Cognitive development usually appears developmentally appropriate during the first three years of life and AS is often only diagnosed once the child's social difficulties become apparent, which occurs frequently after age three (APA, 2000). In contrast to autistic disorder, there are no significant delays in language, cognitive development or self-help skills (World Health Organization, 1994). Language delay is defined as not using single words by 2 years of age or not using phrase speech by 3 years of age (APA, 2000).

According to the 10th *Revision of the International Statistical Classification of Diseases and Related Health Problems* (ICD-10), Asperger's syndrome is characterised by abnormalities in reciprocal social interaction; unusually intense or restricted interest and repetitive patterns of behaviour; and there is no significant delay in language or cognitive development (WHO, 1994).

2.2 DISRUPTIVE BEHAVIOUR DISORDERS:

According to the DSM-IV-TR, disruptive behaviour disorders include two persistent constellations of disruptive symptoms that are separated into two separate categories, oppositional defiant disorder (ODD) and conduct disorder (CD) (APA, 2000). One must bear in mind that some defiance or disruptive behaviour is developmentally appropriate in children but disruptive behaviour disorders are characterised by the frequency and severity of the symptoms that contribute to impairment in academic or social functioning in the child (Sadock & Sadock, 2003). A diagnosis of ODD is based on less severe disruptive behaviours than CD and is characterised by negativistic, hostile and defiant behaviour toward authority figures in the absence of violations of the rights of others or social norms (APA, 2000). The ICD-10 characterises ODD as a less severe variant of CD rather than a distinct type (WHO, 1994).

2.2.1 Diagnostic criteria for conduct disorder

According to the DSM-IV-TR, CD is characterised by repetitive displays of behaviour where the basic rights of others or societal norms are violated (APA, 2000). Children with CD display repeated acts of aggression towards people or animals that may cause physical harm to themselves and others; the destruction of property; deceitfulness or theft; and the violation of rules (Kazdin, 1995). CD is characterised by persistent behavioural patterns which evolve over time and consequently impair social and academic functioning (APA, 2000). Aggressive behaviour may take the form of truancy, bullying, physical aggression, defiant behaviour, vandalism, stealing, destructiveness, fire setting, and aggressive sexual behaviour but this may vary among children as some children display fewer problems than others (Sadock & Sadock, 2003). One needs to

consider the age of onset and severity of behaviour as CD can be diagnosed in childhood or adolescence and is categorized depending on the severity of harm inflicted on others (APA, 2000). The ICD-10 characterises conduct disorders as repetitive and persistent patterns of “dissocial, aggressive, or defiant conduct” (WHO, 1994).

CD can be classified as the ‘child-onset’ subtype if at least one symptom has emerged repetitively before age 10; or as the ‘adolescent-onset’ subtype if there are no symptoms present until after age 10 (APA, 2000). However, the age of onset is not always specified and as such a child may be classified as having an ‘unspecified onset’ (APA, 2000). Some refer to the child-onset subtype as ‘the life-course persistent type’; and the adolescent-onset subtype as the ‘adolescence limited type’, emphasizing that the two have differing etiologies (Krol, Morton, & De Bruyn, 2004). Furthermore, the literature acknowledges extreme forms of disruptive behaviour such as psychopathic tendencies (Krol et al., 2004), although the DSM-IV-TR does not specify this type of behaviour.

2.3 ATTACHMENT THEORY:

Bowlby's attachment theory emphasizes the importance of early primary caregiver-child relationships as fundamental to the child's interpersonal social functioning later in life, where these early relationships provide a prototype for later relationships (Senior, 2001). ‘Attachment’ refers to the specific emotional tie that a child has to his/her caregiver which gradually develops from as young as one month through to approximately three years of age (Fonagy & Target, 2003). Children form varying ties to their caregiver in terms of their sense of security within the caregiver-child relationship (Gutstein & Whitney, 2002). Essentially, a secure attachment forms if the child believes the caregiver will be physically and emotionally available and responsive when needed (Gericke, 2006). Attachment behaviours form as a result of the cumulative outcome of the child's experiences in interaction with the caregiver where the experience of security in the attachment relationship serves as a “regulator of emotional experience” (Fonagy, Target, & Gergely, 2000, p. 103).

The infant's experiences within the attachment system contributes to the development of what Bowlby termed 'internal working models' where these internal mental representations of relationships have both cognitive and affective representations that help organize affect and social experience that shape current and future relationships (Fonagy et al., 2000). When an infant experiences heightened arousal, the presence of the caregiver reduces the infant's reaction to stimuli that may be perceived as dangerous. The infant seeks out the caregiver for protection and safety and when separation ensues, the child is exposed to the fear of the loss of the source of protection and it is through the caregiver's availability that the child learns to regulate these states of arousal from which the internal working models are created (Fonagy & Target, 2003).

The quality of a child's care giving experience is predictive of the kind of attachment that develops between the child and their caregiver (Smyke, Dumitrescu, & Zeanah, 2002). Bowlby's views have been further developed by the work of Ainsworth and colleagues who during their investigation of attachment behaviours developed a method called the 'Strange Situation Procedure' (Ainsworth, Blehar, Waters, & Wall, 1978) so as to assess the specific style of interaction between child and caregiver and thus the quality of the attachment relationship. As a result of assessing attachment relationships, children's attachment behaviours can be coded according to Ainsworth and colleagues (1978) attachment classification system that was developed from observing a child's response and behaviour to the reunion with their caregiver after periods of separation.

There are four different types of attachment classifications. Children who are classified as securely attached use their caregiver as a secure base from which to explore the world and if distressed are able to draw on the caregiver for support and comfort (Ainsworth et al., 1978). Insecure attachments can be classified into three different types, avoidant, anxious/ambivalent or disorganised patterns of attachment. An avoidant attachment is marked by minimal interactions and avoidance of the caregiver upon reunion; and anxious/ambivalent attachments, which are also referred to as resistant/ambivalent attachments in the literature, are characterised by some proximity seeking laced with angry resistance and distress where upon separation from the caregiver, immense distress

arises and upon reunion, the child cannot be comforted (Rutgers et al., 2004). A fourth distinction, that was previously unclassifiable, was later added by Main & Solomon (1986), which is when a child demonstrates disorganised patterns of attachment which involves contradictory displays of attachment behaviours. A disorganised attachment develops when a child experiences the caregiver as negligent and unable to meet their needs and can thus be understood as the lack of development of any attachment strategies to others which is often generalized into later relationships (Green & Goldwyn, 2002).

The experience of a 'containing' relationship, where the child shares his internal and external world as one, embodies the beginning of the development of feeling for others without being separate from the caregiver (Fonagy, Gergely & Target, 2007). Research has shown that children who are securely attached have a significantly better ability to understand emotion, therefore suggesting that the feelings experienced in the dyadic relationship contribute to the development of early empathy (Fonagy et al., 2007).

Bowlby (1979) hypothesized the importance of the separation of the infant from the caregiver from approximately age two, so as to recognise the caregiver as having their own beliefs, interests, feelings and thoughts as separate from the infants. The primary caregiver serves as the 'secure base' from which the child is able to explore the environment with the knowledge that the caregiver is nearby if needed, which essentially facilitates the development of independence or 'separateness' from the caregiver (Senior, 2001). Essentially, the developmental milestones of attachment and recognising 'separateness' overlap as the child needs a secure attachment to return to while learning that the world is separate from the self. Therefore, Bowlby acknowledged the importance of the nature of an infant's attachment in the development of the infant's ability to understand and learn that the self is separate from the primary caregiver (Fonagy et al., 2007). Much research has supported the importance of attachment in the later development of one's ability to mentalise (e.g. Fonagy, 2001; Fonagy et al., 2007; Fonagy & Target, 2003).

2.3.1 Is Attachment set in stone?

Bowlby emphasized the idea that one's internal representations are relatively open in changing conditions (Fonagy et al., 2000). Although previous research has emphasized that if a child's first relationship is compromised, the likelihood of later pathology increases (Nakash-Eisikovits, Dutra, & Westen, 2002), the above comment suggests that the nature of the attachment relationship in early infancy doesn't always serve as a prototype for later attachments which is further supported by evidence that suggests that the stability of a secure attachment style can be altered through traumatic events, neglect or abuse for example (Fonagy et al., 2000). This is further supported by studies on the notion that one's internal representations from early attachment can be open to change as recent research has been focusing on fostered or adopted children and how these children's early attachment styles may alter in a new environment (Green & Goldwyn, 2002). Successful adoptions presuppose that a child will gradually develop a secure attachment with their new family despite enduring years of neglect or abuse (Hughes, 1999) transforming the insecure attachment into an 'earned secure' attachment over time (Schoore, 2003). Additionally, it has been suggested that stressors that arise in early adolescence may temporarily disrupt underlying attachment although the attachment organization may re-appear at a later stage or when the stressor has dissipated (Allen, Land, Liebman, Bell, & Jodl, 1997)

Adoptive studies have highlighted that 'problem children' who often manifest signs of disorganised attachment are not completely hopeless and if adopted into a family that fosters an environment that facilitates the development of an attachment, a child's attachment may change (Hughes, 1999). However, if there is a significant impairment in attachment and thus the development of the self, change may be difficult and perhaps unlikely as some children who are adopted lack interest in the parent-child relationship and do not know that other adults may be able to respond to and meet their needs when necessary and as such their attachment capacity is somewhat impaired (Hughes, 1999). It has been posited that these children avoid entering into reciprocal relationships with the other as it would mean that the child would need to relinquish the control and self-reliance that has allowed them to survive their emotional isolation (Hughes, 1999).

Furthermore, some research has shown that pre-schoolers, who were understood as disorganised in infancy, continue to demonstrate the presence of disorganised attachment and seems to be pertinent to children with this kind of attachment whereas other kinds of attachment seem more open to change (Green & Goldwyn, 2002).

2.3.2 The role of attachment in the development of the brain and mentalisation

Attachment has been said to play a fundamental role in facilitating brain development with regards to social and emotional cognition in the first three years of life (Fonagy et al., 2007). Infants use multiple sensory capacities to interact with the environment from the moment they are born and the caregiver plays a crucial role in the development of the infantile brain. At approximately two months of age, the occipital cortex begins to mature which allows for the development of the infant's social and emotional capacities. At this stage the infant is exposed to various interpersonal stimuli that is mediated through the mother who helps the infant to regulate affective behaviour (Schorer, 2003). When the child begins to interact with the stimuli of the environment, which is done predominantly through visual stimuli, the mother acts as an 'arousal-regulating' mechanism, allowing the infant to communicate internal affect states. Therefore the mother needs to be psychobiologically attuned to the infant so that the somatically expressed communication of internal affect states of both the caregiver and child are effectively regulated, creating the beginning of psychological attachment where attachment becomes the "dyadic regulation of emotion" (Schorer, 2003, p. 39).

Both negative and positive affect states need to be regulated, so as to re-establish security in states of stress, and to encourage positive states through play (Schorer, 2003). The dyad of the attachment relationship affects the infant's brain development where the 'brain-brain' interaction between caregiver and child allows for the development of affect regulation and the development of consciousness in the brain (Schorer, 2003). Over the course of the first year, through the attachment process and experience within the caregiver-child bond, limbic circuitries begin to emerge and mature, around the same time that internal working models begin to develop (Schorer, 2003). The maturation of the limbic system is important for interpersonal and social behaviour and as such the process

of attachment is seen to play a role in the development of the part of the brain that is defined as the social-emotional brain (Schore, 2003). Furthermore, the biological synchronicity acts as the regulating mechanism between the caregiver-child dyad where the mother and child are attuned to each other's internal affect states which contributes to the development of empathy as the child learns how to recognise another's emotional state based on their own internal understanding (Schore, 2003).

Through the development of the attachment relationship and biological synchronicity, the orbitofrontal cortex is able to mature which allows for the development of affect regulation, theory of mind and the ability to empathise i.e. to reflect on another's mental state (Schore, 2003), which is in accordance with Fonagy & Target's (2003) understanding that psychologically secure attachment allows for the development of reflective functioning. Therefore attachment helps in the development of brain structures that have been seen to play a role in affect regulation and the ability to mentalise. However, research has shown that damage to this area in the first two years of life, influences abnormal development in social and moral behaviours (Anderson, Bechara Damasio, Tranel, & Damasio, 1999, as cited in Schore, 2003). Through the attachment process, crucial brain structures that play a role in the development of affect regulation mature which helps the infant to develop an internal sense of security and to understand that their emotional state can be regulated through the interaction with another and through internalised coping strategies (Schore, 2003), from which they are able to develop important self-functions. However, Schore (2003) suggests that insecure attachment histories contribute to abnormal brain development in the orbitofrontal cortex as the child-caregiver dyad is asynchronous and may contribute to the development of the inability to regulate emotion, poor mentalising abilities or decreased empathy as the child will be unable to process socio-emotional information adequately.

The attachment relationship can therefore be understood as going beyond the role of only providing physical and psychological protection for the infant, where the process of attachment can also be understood to play a fundamental role in the organisation of brain processes that help develop social cognition and equips the infant with strategies to exist

with others (Fonagy et al., 2007). Secure attachment relationships are most likely to facilitate the development of mentalisation “as it is likely to be associated with limited inhibitory effects on the brain networks subserving mentalisation” (Fonagy et al., 2007, p. 299).

2.4 MENTALISATION THEORY:

According to Fonagy and Target's model of mentalisation, attachment theory serves as the building block for the development of the ability to interpret behaviour related to both the self and other in terms of mental states (Fonagy, 2001). The ability to reflect on the content of another's mind and to have knowledge of one's own mind is optimised through the attachment relationship and develops out of interactions provided for the infant by its caregivers (Fonagy et al., 2007). A number of studies have observed that the nature of the primary attachment relationship facilitates the development of mentalisation or the knowledge of self and other (Ontai & Thompson, 2002; Pipp, Easterbrooks, & Harmon, 1992; Raikes & Thompson, 2006; Thompson, 2000). Mentalisation can be defined as a reflective function that involves imaginative mental activity that entails a belief that human behaviour is meaningful and intentional and involves the acquisition of the ability to understand the thoughts and feelings of others and the self, whilst recognising that one cannot fully know what is in another's mind (Fonagy et al., 2007).

The child's acquired reflective function from approximately two years of age enables them to visualize others' beliefs, desires, feelings, attitudes, thoughts and intentions as separate from their own (Fonagy, 2001). In being able to reflect on the mental states of others, children are able to understand others' behaviour and subsequently predict what they may do next (Attwood, 2007) and by understanding the meaning of the behaviour of others, a child can subsequently find meaning in their own experience. Therefore a child's ability to mentalise why they did something and their ability to predict what other people will do contributes to a child's "affect regulation, impulse control, self-monitoring, and the experience of self-agency" (Fonagy, 2001, p. 165). Aspects of mentalisation help facilitate individual social survival in understanding not only other mental states, but also one obtains knowledge of one's own intentions, desires and thoughts and through this

self-awareness, individuals are able to modify the manner in which they present themselves (Fonagy et al., 2007).

Succinctly, a child's ability to mentalise is comprised of both a self reflective and interpersonal component that helps the child distinguish between internal and external reality (Fonagy & Target, 2003). According to Fonagy and Target (2003) communication, interpersonal relatedness and symbolic play with the caregiver are ways in which the child acquires the ability to mentalise as secure play communicates and reflects to the child, through a process of interpersonal relatedness, that there are alternative perspectives outside of the child's mind. When a child is able to recognise and understand mental states where they can conceive that other people have their own thoughts, knowledge, beliefs and feelings then a child may be said to have a Theory of Mind (ToM) or the ability to empathise cognitively (which is discussed below). In order to conceive of the mental states of others, one needs to be able to understand the social cues that portray what the person is feeling or thinking (Attwood, 2007), and is determined largely by the infant's ability to evaluate environmental signals that shape their subjective experience (Fonagy et al., 2000).

2.4.1 Empathy, mentalisation and TOM: The same concept?

The concept of empathy, ToM and mentalisation are used synonymously in the literature. However, empathy refers to the sensitivity to and understanding of the mental states of others but can be understood as referring to two related abilities, "mental perspective taking and vicarious sharing of emotion" (Smith, 2006, p. 3) and can thus be defined as the "ability to understand and share in another's emotional state", both cognitively and emotionally (Cohen & Strayer, 1996, as cited in Dolan & Fulham, 2007, p. 35). The mental perspective taking aspect of empathy is often referred to as cognitive empathy and the vicarious sharing of emotion is understood as emotional empathy. Emotional empathy has been hypothesized as providing the basis for social bonding between parents and children and arose from writings on sympathy (Baron-Cohen & Wheelwright, 2004). It is understood as the response one has within the self when observing another's emotional state and is accompanied by the desire to reduce the distress of the other although this

may not be acted upon (Baron-Cohen & Wheelwright, 2004). In contrast, cognitive empathy can be defined as the ability of an individual to conceive of the internal state of another by putting one's own perspective aside and is used interchangeably in the literature when referring to ToM (Baron-Cohen & Wheelwright, 2004). For the purpose of this research, cognitive empathy, ToM and mentalisation are used interchangeably.

True empathy is seen to integrate both the cognitive and affective components discussed above (Baron-Cohen & Wheelwright, 2004). There have been multiple views about the development of empathy where some have said that cognitive empathy is a precondition for emotional empathy where as others have hypothesized that the two interact to regulate each other (Smith, 2006). Often, emotional and cognitive empathy cannot be disentangled but due to the nature of this research and the frequent understanding that AS and CD are disorders of empathy, both components of emotional and cognitive empathy need to be considered. Smith (2006) hypothesizes that there is an imbalance of the different components in empathy in children with a PDD and in individuals with antisocial tendencies. This will be discussed in greater detail below in relation to attachment and mentalisation with regards to each disorder as attachment has been seen to be involved in the development of emotional empathy and as mentalisation is linked to cognitive empathy.

2.5. AS, ATTACHMENT, MENTALISATION, AND EMPATHY:

There have been numerous studies done that try explaining the causes of PDDs, from the ideas of the 'refrigerator mother' (Bettelheim, 1967) to an increased focus on the biological aspects of the disorder (Hill & Frith, 2003). Studies have shown that the correlation between heritability and autism in twin studies has been the most important finding with regards to trying to explain the causes of autism (Bailey et al., 1995). Additionally, multiple genes and chromosomes have been said to be involved, although this is not conclusive (Maestrini, Paul, Monaco, & Bailey, 2000) Furthermore, non-genetic factors such as viral illnesses either arising before birth or within the first two years of life have also been considered in relation to the causes of autism. However, there

are no definitive causes known although recent research is focusing on the interaction between genetic and environmental factors (Hill & Frith, 2003).

It is worth mentioning that evidence has been provided to support the notion that structural brain abnormalities exist in individuals on the spectrum. A full account of brain dysfunction in autism is beyond the scope of this research and not the topic of debate, but findings that are relevant for the purposes of this research demonstrate that abnormalities in the brains of individuals on the spectrum are evident in the “reduced neuronal cell size and the increased cell packing density in regions of the limbic system known to be critical to emotional and social behaviour” (Hill & Frith, 2003, p. 282) and as such, one may question whether this is as a result of the attachment process or whether this is due to pre-existing neurological deficits.

2.5.1 Attachment and AS

Varying theoretical models of attachment in PDDs have led to differing predictions about the presence and quality of attachment behaviours in children with PDDs. One model emphasized that due to the social impairments characteristic of PDDs, the differentiation of attachments from familiar and unfamiliar people cannot be achieved, suggesting that children with a PDD would not show preference for their caregiver over a stranger (Cohen, Paul, & Volkmar, 1987). This model suggests that due to the global deficit of social impairment, the ability to relate to others is impaired and as such would preclude the formation of secure attachments (Cohen et al., 1987). In contrast, another model suggests that autism is a biological disorder of attention and arousal systems where social interactions result in increased arousal in the child that exceeds their level of tolerance resulting in behavioural inhibition (Dawson & Lewy, 1989). Due to the negative experience of increased arousal, the attachment bond may be disturbed over time but this model suggests that as the mother is more familiar to the child, the child may prefer the mother over a stranger (Rogers, Ozonoff, & Maslin-Cole, 1993).

A third model predicts that in children with a PDD, the capacity for forming secure attachments is likely but that the attachment relationships will develop differently and

more slowly with different behavioural patterns (Baron-Cohen, 1989). This model emphasizes that specific social deficits rather than a global impairment is present in such disorders. Furthermore, the model suggests that the child will experience the earliest levels of biological regulation with the mother and that the infant will begin to construct a sensorimotor schema for the mother, but the later development and construction of the internal working model of self and other is compromised due to difficulties in interpreting emotional cues or internal states of the other, suggesting that the child is aware of another's actions but unable to construct an understanding of them (Baron-Cohen, 1989). Due to cognitive difficulties, the internal working model is more difficult to develop, but if the caregiver is consistent and attuned to the child, the internal working model will develop over time, allowing for a secure attachment to form (Rogers, et al., 1993).

The notion of attachment in AS is controversial and complicated. In the earliest description of this condition, the failure to form emotional connections with other individuals were reported due to the core deficits associated with the disorders (Sadock & Sadock, 2003) and such children were initially described as failing to develop normal attachment behaviour (Rutgers et al., 2004). On the contrary, research has shown that there is evidence to suggest that children with AS demonstrate secure attachments despite social and behavioural impairments (Rogers et al., 1991; 1993; Rutgers, et al., 2004).

Some studies have indicated that there is no relation between attachment security and the severity of a PDD, suggesting that such children do not have an absolute incapacity to form social relationships with others and that PDD's should not be understood as predominantly related to attachment impairments or that such children are unattached to their caregivers (Rogers et al., 1991; 1993). Additionally, studies have found that the majority of subjects with a PDD showed preference and proximity seeking for the mother (Sigman & Mundy, 1989), thus refuting the first model of attachment that indicates that children with a PDD do not form attachments or show preference for their caregivers over strangers. These studies suggested that the attachment construct may be operationalised too narrowly in terms of behaviour in these children where it does not

capture the profound social impairments present in these children, and as such may fail to appreciate the idiosyncratic expression of attachment behaviours in these children (Rogers et al., 1993).

In contrast to the above studies done by Rogers et al. (1991; 1993), more recent research has suggested that the severity of PDDs is associated with more attachment insecurity where the severity of the PDD may determine the nature of the child's attachment to their caregivers (Naber et al., 2007; Rutgers et al., 2004). Additionally, although children with PDDs are capable of forming attachments, research has shown that secure attachments were underrepresented in these children and that disorganised attachment was higher when compared to the normal population but that disorganised attachment was predicted by the child's severity of the PDD (Naber et al., 2007). However, all of these studies indicated that the nature of attachment security and the developmental level of the child are related where lower developmental levels increase the chance for disorganised attachment.

Researchers tried to account for this correlation by hypothesizing that the development of an internal working model in children with a PDD is more cognitively demanding than for normally developing children (Rogers et al., 1991; 1993; Naber et al., 2007). Due to deficits in emotion perception and expression, the child may not have an "adequate affective data base" about the care giver or the ability to understand the caregiver's internal experience to construct their own internal working model and as such these children develop their internal working model based on "behavioural contingencies that the child has remembered or experienced" rather than drawing on the "affective and inter-subjective information" which appears to be unavailable to these children (Rogers et al., 1991, p. 487). These studies suggested that a child with a PDD's developmental level or cognitive ability may influence the rate at which an internal working model is developed, and that lower intellectual capabilities increase the chance for disorganised attachment but that the altered behavioural patterns characteristic of these children does not preclude the development of secure attachment relationships (Naber et al, 2007). Such studies have hypothesized that secure attachment relationships may be developed in

such children but that the attachment relationship is formed through different processes in comparison to normally developing children (Rogers et al., 1991; 1993), thus supporting the third model of attachment in PDDs.

These studies demonstrated that attachment security is present in these children but that the presence of attachment behaviour is not indicative of “normal” attachments per se. Additionally, these studies hypothesized that if a child with a PDD’s attachment process is slower and developmentally linked, observing an insecure attachment in early development is likely but that signs of secure attachment may increase over time depending on whether maternal characteristics help foster attachment development (Rogers et al., 1991; 1993). As children with AS, by definition, do not have a delay in language or cognitive development (APA, 2000), one may hypothesize that these children are capable of forming secure attachments if maternal characteristics warrant such a development, bearing in mind that these children have structurally abnormal limbic systems that may contribute to differential processing of socio-emotional information and thus altered behavioural patterns within the attachment relationship.

To our knowledge, there have only been two studies to date that have assessed disorganised attachment in children with PDDs (Capps, Sigman, & Mundy, 1994; Willemson-Swinkels, Bakersman-Kranenburg, Buitelaar, van IJzendoorn, & van Engeland, 2000) with conflicting results emerging. In the study done by Capps et al. (1994), all children with a PDD in the study appeared to have disorganised attachment relationships, but Willemson-Swinkels and colleagues (2000) reported that disorganised attachment relationships were more often present in children with both a PDD and mental retardation. It has been suggested that the differences in these findings, especially in the study done by Capps and colleagues, may be due to the inclusion of characteristic behaviours associated with PDDs in the attachment classification (Naber et al, 2007) and as such characteristic behaviours of PDDs need to be teased out from attachment behaviour. In the study by Willemson-Swinkels et al. (2000) there was no correlation between the severity of the PDD and disorganised attachment, however it was found that a disorganised attachment is rather understood to be associated with cognitive deficits

such as the presence of mental retardation. However, the study reiterated that disorganised attachment can be assessed in children with a PDD and that a disorganised attachment does not only represent characteristic PDD behaviour (Willemson-Swinkels et al., 2000). Furthermore, disorganised attachment has been related to lower intellectual abilities (Naber et al, 2007; Willemson-Swinkels, et al., 2000) as well as neurodevelopmental vulnerabilities in children with a PDD (Green & Goldwyn, 2002) and one may posit that children with PDDs are also vulnerable to disturbed attachments if maternal characteristics or environmental factors do not foster development of attachment relationships, as any other child may be.

However, recent research indicates a prevalence of secure attachment in children with AS and as such one may posit that the security of the caregiver-child relationship would help facilitate the development of early reflective functioning or affective empathic competence in these children (Diego & Jones, 2007) even if it is somewhat slower in development, but the reverse may also be true.

2.5.2 Mentalisation and AS

According to the Theory of mentalisation, secure attachment provides the building blocks from which mentalisation eventually develops (Fonagy, 2001). Previous research on the ability to mentalise and thus acquire a ToM in AS depict conflicting views in whether or not individuals with AS are able to conceive of the mental states held by the self and by others.

A study done on the brain mechanisms involved in ToM in individuals with AS in contrast to the control group of 'normal' adults illustrated that the individuals with AS displayed less activation of the regions of the brain identified in the attribution of mental states (Happe, Ehlers, Fletcher, Frith, Johansson, Gillberg, Dolan, Frackowiak, & Frith, 1996). Positron emission tomography scans done on adults with AS indicated that the area of the brain in the adults with AS that was activated during the test was comparatively different to the normal volunteers, indicating an abnormal pattern of activation in the brain (Happe et al., 1996). Furthermore, these studies indicate that there

is neurological evidence to support impaired or differing ToM abilities in individuals with AS as they demonstrated poorer performance on ToM stories in comparison to 'normal' volunteers (Happe et al., 1996). Studies have indicated that individuals on the autistic spectrum have a dysfunction in the specific neural substrate for mentalising, however the reason as to why their brain structure is abnormal remains to be identified (Hill & Frith, 2003).

However, some research has suggested intact ToM capabilities in adults with AS who have passed second-order ToM tests which are tasks that require the participant to reason about what one person thinks of another's thoughts (Bowler, 1992; Ozonoff, Pennington, & Rogers, 1991). Although, such research has been criticized for using adult populations in ToM tasks that were developed for 6 year old capabilities suggesting that adults with AS who passed those tests do not in fact have a fully functioning ToM (Baron-Cohen, Jolliffe, Mortimore, & Robertson, 1997). Adults with AS who have been tested using more advanced ToM tasks such as story comprehension showed increased difficulty with mentalising in comparison to matched controls (Happe, 1994). Furthermore, this was supported by research that aimed to test whether adults with AS can infer one's mental state by looking at photographs of the eye region and deciding what the person may be thinking or feeling, where results indicated that adults with AS were significantly impaired on this task (Baron-Cohen et al., 1997). This was further replicated by a study done with children and adolescents with AS which additionally concluded that such individuals were impaired on pure ToM tasks (Kaland, 2000, as cited in Kaland et al., 2002).

Later research on other types of ToM tasks have contributed to evidence suggesting deficits in the ability to mentalise in individuals with AS where the research showed that these individuals struggle to attribute mental states to animated shapes (Abell, Frith, & Happe, 2000); have difficulties with answering questions about social situations that require mentalising abilities (Heavey, Phillips, Baron-Cohen, & Rutter, 2000); and that individuals with AS tend to interpret everyday situations literally (Kaland et al., 2002). Furthermore, some research done on children with AS who were selected for having

passed first and second order ToM tasks indicated that these children with AS evidenced a ToM deficit where their difficulty lay in the utilization of mental state knowledge (Baron-Cohen, O’Riordan, Stone, Jones, & Plaisted, 1999) and as such the above studies provide evidence to suggest that individuals with AS have *subtle* mentalising deficits (Baron-Cohen et al., 1997; Happe, 1994).

However, there has been no single case reported of a child with AS who is able to fully mentalise in standard tests where children of the same age would show the ability to mentalise (Frith & Happe, 1999). Nevertheless, it has been hypothesized that adults with AS have a selective ToM deficit rather than the complete lack thereof (Rutherford, Baron-Cohen, & Wheelwright, 2002) and that children and adolescents with AS, especially if they are more cognitively able, are not quite lacking in the ability to mentalise but that they tend to do it differently in comparison to normally developing individuals (Kaland et al., 2002). Studies have found that individuals with AS process social information in an idiosyncratic manner that may be related to their literal thinking and different cognitive style (Kaland et al., 2002) and as such may have differing mentalising abilities in comparison to other individuals with ‘normally’ developing brains. Additionally research has shown that any ability to pass ToM tasks is somewhat different to putting theory of mind abilities into practice in real life situations, something that any individual with AS has difficulties with (Baron-Cohen et al., 1997) and that adults with AS with an ‘intact’ ToM lack the ability to apply it in social situations due to their marked social impairment and extreme egocentricity (Bowler, 1992) which is related to neurologically based deficits in their ability to mentalise (Hill & Frith, 2003).

Furthermore, recent research has supported the notion that adults with AS evidence an empathizing deficit but when interviews were conducted with the adults to try understanding the lower scores on the empathy questionnaire, it was found that even though the adults with AS had difficulty “judging/explaining/anticipating or interpreting another’s behaviour”, they were concerned about the other person’s feelings (Baron-Cohen & Wheelwright, 2004, p. 169). They evidenced deficits in understanding that their behaviour may be hurtful but once this was pointed out, they demonstrated remorse and

showed desire to have avoided causing pain to another (Baron-Cohen & Wheelwright, 2004). The subtle mind-reading deficits characteristic of AS contribute to the evidence of deficits in empathizing but does not suggest that the individual does not feel concern for the other. Some research has suggested that the inability to respond to emotions in others may be related to anatomical abnormalities of the limbic system, although this is inconclusive as of yet (Hill & Frith, 2003).

Although previous research has shown that individuals with AS have impaired ToM, this does not mean that there is a complete lack of ability to feel for others, especially as there is evidence to suggest occurrence of secure attachment. In accordance with the above research conducted by Baron-Cohen and Wheelwright (2004), Attwood (2007) suggests that individuals with AS have *impaired* empathic abilities where they are able to care deeply about others but due to executive dysfunction they are unable to symbolize or read social cues of mental states to respond accordingly. Research has shown that there is a significant correlation between executive dysfunction and ToM development in these children (Osterling, Dawson, & McPartland, 2001; Hill & Frith, 2003). Although it is a widely accepted belief that individuals with AS may have an impaired intuitive understanding of mental states, some individuals with AS are able to acquire a “conscious theory of mind” to predict and explain behaviour, however despite learning, they still lack the intuitive mentalising ability that other, normally developing individuals do (Hill & Frith, 2003, p. 283). One may hypothesize that in light of the above review on the presence of secure attachments in individuals with AS, that these individuals develop the desire to please the other within the attachment relationship but due to neurological deficits, they do not know how to enact such desires as their mentalising abilities and socio-emotional brain development is impaired.

2.5.3 The question of empathy in AS

Based on the above previous research, one may hypothesize that individuals with AS have impaired cognitive empathy or ToM rather than a lack thereof and thus find it difficult to empathize cognitively with others due to social skill deficits and neurological abnormalities which are characteristic of the symptoms associated with AS. Therefore, in

relation to the research reviewed and theoretical understandings of development, one may hypothesize that generally speaking, individuals with AS are able to empathise emotionally due to attachment but have mentalisation difficulties and therefore struggle to empathise cognitively due to the characteristic deficits of AS and thus their ability to respond appropriately is impaired.

This has been suggested in a theoretical study done by Smith (2006) where he hypothesized that children on the spectrum have a cognitive empathy deficit disorder that consists of lowered cognitive empathy but high levels of emotional empathy. As illustrated above, individuals with AS experience themselves as having and sharing other's emotions but that they lack the skills and understanding of how to express their sense of empathy. Furthermore, Blair (1999) emphasized that these children are able to show vicarious emotional responses to the distress of others and that they possess the emotional component of empathy but lack the ability for cognitive empathy. As such, research reviewed illustrates how children with AS are able to attach and experience emotional empathy despite neurological deficits in mentalising. However, one wonders about children with AS who do not attach securely and whether these children are capable of displaying emotional empathy or not and what this may mean in light of the research under study.

2.6 CD, ATTACHMENT, MENTALISATION AND EMPATHY:

It has been hypothesized that children with CD develop problem behaviours along differing developmental trajectories that try accounting for differing stages of onset and continuity of conduct problems. The significance of early interaction between the environment and the child has been understood to contribute to conduct disordered behaviour (Keller, Spieker, & Gilchrist, 2005). Numerous studies have emphasized the importance of considering multiple risk factors in the development of early problem behaviours, factors such as the characteristics of the child (temperament, intelligence, neuropsychological constructs); characteristics of the parent (mental health); parenting practices (harsh or abusive discipline, warmth, attitudes); the parent-child relationship

(attachment); and family ecology (stress, socioeconomic status, conflict, family structure, support) (Keller et al., 2005).

Greenberg, Speltz, and DeKlyen (1993) proposed a model for the development and persistence of conduct disordered behaviours that include the above mentioned factors but places greater emphasis on the quality of the parent-child relationship, however this model emphasizes that a single risk factor is not sufficient to interrupt development but that the accumulation of such factors may be detrimental to the child (Keller et al., 2005). However, different factors may exert greater influence than others and may be more strongly associated with certain disorders or behaviours (Keller et al., 2005).

2.6.1 Risk Factors: Genetic and Environmental Influences on CD

Studies have shown that CD develops as a result of differing risk factors that depend on the individual and that no single domain is either necessary or adequate in accounting for the development and persistence of conduct disordered symptoms (Greenberg, Speltz, DeKlyen, & Jones, 2001). Research literature on the role of genetic factors in the development of CD is still somewhat inconclusive and is an ongoing debate. There is evidence to suggest that genetic factors play a role in the development of CD in some individuals (Blair, Peschardt, Budhani, Mitchell, & Pine, 2006) where studies have suggested that genetic factors account for approximately 40% of the variability in conduct disordered behaviour (Gelhorn et al., 2005). However, some research has shown that individual symptoms of CD may be differentially heritable where as other symptoms may be environmentally influenced, and as such there is evidence for varied levels of genetic and environmental influences in the development of CD symptoms (Gelhorn et al, 2005).

Additional research on contributors to the development and persistence of conduct problems raises numerous risk factors, especially with regards to environmental factors. Family stressors that have been seen to play a role in the increased rates of CD are factors such as marital conflict, single parenthood, and low income for example, where the prevalence of CD has been seen to be significantly related to socioeconomic factors

(Sadock & Sadock, 2003). Much research has been done on parental psychopathology, where children with CD are more likely to have a parent with a diagnosable disorder in comparison to other clinical samples (Lyons-Ruth, 1996) but the most common finding in research on CD is the relation between ineffectual harsh parental discipline and aggressive behaviours in children (Lyons-Ruth, 1996). However, there has been a recent development in research focusing on the development of conduct problems as a result of temperamental difficulties (Frick & Sheffield Morris, 2004). Research has shown that children with a more difficult temperament are at a higher risk for developing conduct problems (Keenan, Shaw, Delliquadri, Giovannelli, & Walsh, 1998).

Research has shown that factors that interact with insecure attachment contribute to higher levels of problematic behaviours such as difficult child temperament for example (Burgess, Marshall, Rubin, & Fox, 2003). Insecurely attached children with high levels of infant negativity or difficult temperamental characteristics were more likely to engage in conduct disordered behaviour than children who were securely attached (Keller et al., 2005). Furthermore, children who were insecurely attached and exposed to additional risk factors such as high-risk parenting and troubled family domains are more likely to engage in conduct disordered behaviour (Keller et al., 2005). Research has shown that family violence is strongly associated with attachment impairment and that children who are maltreated or exposed to violence are more likely to display disorganised attachment behaviours with impaired social and emotional development (Zeanah et al., 1997). CD is likely to be influenced by multiple genetic and environmental factors, however, of importance to this research is the risk factor of the parent-child relationship with regards to the nature of attachment and the later development of mentalisation abilities, although additional risk factors need to be held in mind when conceptualising CD.

2.6.2 The development of attachment and mentalisation in CD

Attachment history has been observed to either operate as a risk or protective factor in the development of behavioural problems within the context of other risk factors (Greenberg et al., 2001). Numerous studies have provided evidence that insecure attachment is a risk factor for later behavioural problems in children (Phaik Ooi, Ang, Fung, Wong, & Cai,

2006; Shaw, Owens, Vondra, Keenan, & Winslow, 1996). Furthermore, Holland, Moretti, Verlaan and Peterson (1993), suggested that the disruption of the attachment relationship is the core underlying feature of CD. Research has shown that the quality of the parent-child attachment relationship has a significant effect on aggression, levels of social stress and self-esteem and as such the nature of the attachment relationship between parent and child may affect behavioural and emotional outcomes in the child (Phaik Ooi et al., 2006).

The nature of the insecure attachment may influence the development of conduct symptoms in different ways and as such there have been differing views on the predominant attachment classification present in children with CD. Insecure-avoidant attachment behaviour manifests when a child is sufficiently neglected or rejected by their caregiver and as such their internal working models are tinged with anger and mistrust due to unmet emotional needs (Bowlby, 1973). Insecure-disorganised attachment behaviour manifests due to a frightening, abusive parent who the child, in response to their fear, develops a controlling-punitive view towards the caregiver as they get older, which is tainted by anger and the need for control (Keller et al., 2005). Nevertheless, in the literature, both kinds of attachment have been said to lead to aggressive or problematic behaviour (Burgess et al., 2003; Munson, McMahon, & Spieker, 2001; Shaw et al., 1996).

However, earlier research seems to be dominated by the suggestion that children with CD predominantly display signs of insecure-avoidant attachment behaviour but most of these studies were conducted prior to the classification of disorganised status (Keller et al., 2005). Although, a recent study examining disruptive problem behaviours during the preschool period found that children with avoidant attachment patterns were at a higher risk for developing problematic behaviours when compared to other insecure attachment classifications and that disorganised attachment alone does not increase the likelihood of problematic behaviours (Keller et al., 2005). The research concluded that avoidant attachment was most significantly correlated with the probability of problem behaviours but that the likelihood of behavioural problems increased with the accumulation of

multiple risk factors, rather than attachment impairment alone (Keller et al., 2005). However, these findings were accounted for by the suggestion that previous studies done on disorganised attachment in relation to CD was done on children older than 4.5 years, suggesting that the consequences of disorganised attachment may only be apparent later in the preschool period, where as this study tested children younger than this. Another study (Belsky & Fearon, 2002), which had similar findings that avoidant attachment was more predictive of problematic conduct behaviour, had also tested children below the age of 3, suggesting that avoidant attachment behaviours may have earlier manifestations (Keller et al., 2005), although this is inconclusive and somewhat unclear in justification.

In contrast, several studies have found disorganised attachment to predict conduct difficulties (Carlson, 1998; Lyons-Ruth et al., 1993; Munson et al., 2001; Shaw et al., 1996), and some research has shown that children with CD are more often classified as having a disorganised attachment (Green & Goldwyn, 2002; Penzerro & Lein, 1995). In a review of attachment-related studies of early aggression, the author concluded that disorganised attachment behaviours predict aggression in school age children (Lyons-Ruth, 1996). In disorganised attachment, the primary caregiver is unable to represent or mentalise the child's behaviour, emotions and thoughts (Fonagy & Target, 2003), which in turn should influence the child's ability to adequately think in mental state forms, thus questioning whether children with CD develop the capacity to empathise emotionally and acquire a ToM. As the caregiver is not 'attuned' to the child's emotional state the child will be unable to identify himself in the caregiver and instead the 'unattuned', disconnected image of the caregiver is internalized (Fonagy, 2001) This links to the notion that if emotional empathy develops during attachment, conduct disordered children will not have the capacity to empathise emotionally, as they have had an attachment experience that failed to establish a sense of the other as a psychological entity (Fonagy, 2003). As secure attachment isn't evident in these children, regardless of whether it is disorganised or avoidant, the child's early development of reflective functioning would be impaired, thus explaining why these children often appear to be unaffected by others' emotional distress (Fonagy, 2001).

There are contradicting views about whether children with CD have an intact ToM. In relation to mentalisation, research has shown that adults with psychopathic tendencies or adults who engage in antisocial behaviour do not have an impoverished ToM (Blair, 2005; Richell et al., 2003). However, the data has been inconsistent and success at showing ToM impairments has been limited but some studies have argued that difficult pre-schoolers have some impairment in their ToM ability when tested on higher order tasks (Hughes, Dunn, & White, 1998). Furthermore, recent research has indicated that children with conduct problems demonstrate a generalised impairment in mentalising on advanced tests of ToM such as trying to identify emotions by looking at the eye region in photographs (Sharp, 2008).

Additionally, research has shown that children with CD manifest impairment in social skills and insight but that their social impairment is somewhat different to children with a PDD (Happé & Frith, 1996). This study investigated social impairment in terms of ToM deficits in children with CD, finding that these children are able to pass first-order ToM tasks but demonstrate impairments of social insight in real life behaviour (Happé & Frith, 1996). In this study, children with CD most clearly showed their mentalising abilities in the realm of antisocial behaviour, highlighting the possibility that these children are able to understand other's emotions but not share them, positing that these children have an intact but distorted ToM (Happé & Frith, 1996). It has been suggested that these children have a ToM that is used instrumentally without access to empathic understanding (Sutton et al., 1999). This is further supported by evidence that there is dissociation between mentalisation abilities and empathic feeling (Blair et al., 1996).

It has been suggested that children with CD fail to process social information accurately due to poor attachment and often *seem* to have an impoverished ToM as they fail to acknowledge the feelings of others (Sutton et al., 1999). Research has shown that individuals with antisocial tendencies appear to be "socially blinded" as they fail to understand others and tend to be egocentric in their understanding of experiences (Sutton, et al., 1999, p. 118). Therefore some research predicts that children with CD would score lower on ToM tests as they manifest deficits in their social skills and suggest that these

children have less awareness and understanding of social cues from others, although this does not suggest that children with CD have an impaired ToM, rather research has shown that these children may have a *distorted* ToM (Happe & Frith, 1996; Sutton et al., 1999).

These children are therefore capable of understanding how their behaviour may impact on others by imagining the mental states of others (Blair, 2005, Richell et al., 2003), but due to poor attachment, they do not have a secure base from which to enter the world, therefore they have difficulties with caring or affective empathy as they cannot connect emotionally (Dolan & Fulham, 2007). Additionally, disorganised infants are able readers of the other's mind or mental state, but they seem to be poor readers of their own mental states and due to their insecure attachment, the child does not learn how to self-reflect (Fonagy et al., 2000). In light of the literature reviewed on attachment and brain development, Schore (2003) suggested that children with poor attachment histories display empathy disorders, the limited capacity to perceive the emotional states of others and the limited capacity to regulate affect, and it seems that the literature is indicating that children with CD display impairment in all of the above.

2.6.3 The question of empathy in CD

In relation to the literature discussed, it may be hypothesized that the child with CD's impaired attachment affects their capacity to empathise emotionally, and consequently their ToM develops in a 'distorted' way as their reflective function is impaired. This may explain why conduct disordered individuals have the ability to manipulate and charm their way into meeting their own needs without any sense of remorse (Blair, 2005), as they do not have the capacity for affective empathy and they are unable to ascribe intention to the self due to poor self mentalisation. This would suggest that such children have cognitive empathy but due to the lack of emotional empathy, they cannot make the representation of the internal state of others meaningful (Blair, 1999). Furthermore, as their ability to mentalise is instrumental in nature, the literature suggests that these children mentalise in order to get their needs met.

Smith (2006) hypothesized that individuals who manifest antisocial behaviours display signs of what he termed 'emotional empathy deficit disorder' which consists of lowered emotional empathy but higher levels of cognitive empathy. Such individuals are understood to be skilled in the art of manipulation which suggests understanding of other mental states and that although they may be aware of another's emotions and thoughts; they do not share in the emotions of the other (Smith, 2006). However, his understanding was specific to psychopathic individuals who have been understood to be on the extreme end of the spectrum of CD in childhood.

2.7 'AS AND CD': CO-MORBID OR MUTUALLY EXCLUSIVE

There is some evidence to suggest that behavioural difficulties arise in some individuals with AS but very few studies have tried accounting for such manifestations. Anecdotal reports have proposed the possibility of an association between AS and violent behaviour over the past two decades (Chen et al., 2003; Everall & Lecouteur, 1990; Haskins & Silva, 2006; Kohn et al., 1998; Mawson et al., 1985; Palermo, 2004). These studies evidenced the presence of aggression, sexual assaults, thefts, destruction of property and incidents of compulsive fire setting in some individuals diagnosed with AS or in individuals manifesting symptoms characteristic of AS. These anecdotal reports raised important questions into whether these disorders exist co-morbidly or whether they are mutually exclusive constructs which subsequently only a few studies have tried to address.

Studies have suggested that violent and aggressive behaviours in individuals with AS result due to their impairment in ToM and as a result of their narrow, repetitive interests (e.g. Palermo, 2004; Scragg & Shah, 1994). Obsessive, fixated interests coupled with their inability to consider how their behaviour may impact on others and the nature of social consequences as a result of their behaviour have been hypothesized as factors that contribute to the increased risk of engaging in behaviour that may be considered as conduct disorder in children with AS (Haskins & Silva, 2006). However, in contrast other recent research found that the characteristic deficits apparent in AS such as an impoverished ToM and executive dysfunction, do not account for aggressive traits in

some individuals but highlighted the difficulty in understanding why such difficulties then exist (Rogers et al., 2006). Kohn et al. (1998, p. 296) argued that aggressive or violent behaviour in individuals with AS occurs for different reasons in comparison to CD or to 'psychopaths'. They argue that if the ToM deficit is applied in understanding aggression and violence in AS, the prevalence of aggression and violence in AS would be described more frequently in such individuals. There is little conclusive evidence to suggest whether there is a correlation between AS and violence or conduct disorder behaviour but the literature does suggest that aggression is not uncommon in individuals with AS (Haskins & Silva, 2006).

Some research has shown that the difficulties experienced in AS and CD overlap 'superficially' when conducting research on the comparison of these two disorders such as symptoms of irritability, defiance to parents, lying, aggressiveness, and poor attention to name a few but essentially arise for different reasons (Green et al., 2000). Some research has hypothesized that violent and aggressive behaviour in AS may be linked to their deficit in empathy and characteristic social deficits (Scragg & Shah, 1994; Rogers et al., 2006). This suggests that the behavioural difficulties experienced may then be characteristic of the AS diagnosis itself. Due to social impairments children with AS are more susceptible to the development of secondary symptoms similar to children with CD (Green et al., 2000).

However, some research has suggested that behavioural difficulties are not as a result of the AS diagnosis itself, rather co-morbid symptoms result from co-existing psychopathology but are accentuated by deficits prevalent in AS (Palermo, 2004). Recent research found that AS and CD can co-exist, but the disorders are not a part of "a single construct" (Rogers et al., 2006, p. 1796). Essentially, the research suggested that antisocial behaviours in children with AS do not exist as a part of the disorder, rather clinicians should consider such behavioural difficulties as separate from the diagnosis of AS (Rogers et al., 2006). Therefore it has been suggested by one research study that co-morbidity is possible but as two separate constructs (Rogers et al., 2006), but the study was unable to fully account for why some individuals with AS present with antisocial

tendencies and others do not. Essentially this research, which to our knowledge is the only one of its kind to date, suggested that if clinicians are faced with reports about 'nasty' behaviour in children with an autistic spectrum disorder, the clinician should not dismiss the child as manifesting symptoms characteristic of their primary disorder, and that the clinician should intervene immediately (Rogers et al., 2006).

Therefore some research supports the possibility of these two disorders co-occurring as mutually exclusive diagnoses but suggest that the reasons for engaging in conduct disordered behaviour is etiologically different from that of individuals who have a primary diagnosis of CD (Rogers et al., 2006). Conversely, other research suggests that these two disorders are not related, rather the child may be manifesting symptoms that can be termed conduct disordered behaviour specific to the diagnosis of AS rather than the possible diagnosis as CD proper (e.g. Chen et al., 2003; Khon et al., 1998). Green et al. (2000) emphasized that there are no unifying etiological causes for comorbidity and that any person presenting with such symptoms needs to be understood as an individual, where clinicians need to consider unique contributing factors in each case as there is no seemingly definitive explanation for why some individuals may develop a dual diagnosis.

Some research has suggested that further investigation into the possibility of additional diagnoses existing alongside AS is needed (Rogers et al., 2006), in contrast to behavioural difficulties existing as a result of the disorder, as difficulties can be seen in some individuals with AS and not in others (Green et al., 2000). Research suggested that there is such a paucity of both available literature and explanations for psychosocial and behavioural difficulties associated with AS (Palermo, 2004; Rogers et al., 2006). As a result, studies have suggested that clinical practice runs the risk of falling into a cycle of neglecting a serious need in further understanding whether and why behavioural difficulties arise in some individuals with AS, and whether this exists as a result of AS or as a separate diagnostic category (Palermo, 2004).

2.7.1 AS diagnosed as CD: the possibility of misdiagnosis

Assessing psychiatric comorbidity in AS is viewed as a complex issue as other disorders may hinder or obscure the diagnosis of AS or behavioural manifestations may be seen as a result of the AS diagnosis itself (Green et al., 2000). Literature has shown that AS is often misdiagnosed as CD in individuals at presentation, as both disorders manifest externalizing symptoms and behavioural problems (Green et al., 2000). Green et al (2000) compared the social and psychiatric functioning of adolescents with AS to adolescents with CD. This study suggested that the group of adolescents with AS shared a number of superficial symptoms experienced by the group of adolescents with CD where both reported high levels of over activity, conduct symptoms, irritability, impulsivity, temper tantrums, restlessness, poor attention, defiance, aggression, lying and a low threshold for annoyance with 45% having an externalizing disorder (Green et al., 2000). Furthermore, studies have been done on the over representation of AS individuals in prison populations or hospital settings for violent patients where the studies suggest that AS may go unrecognised and that perhaps AS is overlooked in forensic settings in patients manifesting violent behaviour (Scragg & Shah, 1994). Therefore there is some research that suggests that misdiagnosis may occur due to similar behavioural symptoms in both disorders.

2.8 CONCLUSION:

Therefore the literature suggests that children with AS securely attach and thus have emotional empathy but lack the ability to adequately mentalise and therefore lack cognitive empathy. In contrast, children with CD have been understood to have impaired attachments most frequently labelled as disorganised attachment but regardless of the style of attachment, these children manifest insecure attachment behaviours and therefore display impaired emotional empathy. Although they evidence ToM abilities, these abilities are distorted due to poor attachment, thus further impairing their ability to empathise with others as they cannot make it emotionally meaningful.

In relation to the literature reviewed, there is an obvious lack of research into the disorganised attachment of children with AS and the relative implications on behaviour

and empathic development in such children, which raises the question of whether children with disorganised attachment with AS would develop similarly to children with CD in light of the theoretical approaches reviewed. Essentially there seems to be a 'black and white' understanding of the theoretical underpinnings for the development of children with AS and CD as secure and disorganised and thus the outcomes seem somewhat predetermined. Additionally, it raises the question about the possibility of behavioural symptoms occurring in children with secure attachment or whether this is only an occurrence of children who have disorganised attachments.

Essentially there is little literature available about the possibility of dual diagnosis and the existing few studies provide little conclusive evidence to support or dispute a dual diagnosis. In addition, none of the research done highlights clear theoretical understandings for accounting for existing symptoms in some individuals as there seems to be contradicting views on whether symptoms are as a result of the AS diagnosis itself or whether it is possible for these two disorders to co-occur. Most importantly conceptual possibilities in relation to attachment and mentalisation had not been studied in relation to the possibility of making a dual diagnosis of CD and AS in children, which is essentially where this research has positioned itself. The following research questions emerged as a result.

RESEARCH QUESTIONS

1. How do psychodynamically orientated Psychologists and Psychiatrists conceptualise each disorder in relation to attachment theory and mentalisation?
2. What are the opinions of psychodynamically orientated Psychologists and Psychiatrists about the dual diagnosis of CD and AS in children?
3. a) How do psychodynamically orientated Psychologists and Psychiatrists justify their view for the possibility of making a dual diagnosis of CD and AS in children theoretically, in relation to attachment theory and mentalisation?

b) How do psychodynamically orientated Psychologists and Psychiatrists justify their view against the possibility of making a dual diagnosis of CD and AS in children theoretically, in relation to attachment theory and mentalisation?
4. How do these clinicians account for diagnostic and theoretical similarities and differences between AS and CD?
5. What is the likelihood of misdiagnosis rather than dual diagnosis?

CHAPTER 3: METHODS

This research drew upon the clinical opinions of professionals in relation to conceptual understandings and experience of the dual diagnosis of CD and AS and as such qualitative research methods were used. A qualitative paradigm is exploratory and understanding oriented (Creswell, 2005) and was thus selected for this research so as to gain an in-depth account of the participants' opinions in relation to the dual diagnosis of AS and CD. Additionally, qualitative methods allow for the possibility of change and interpretation in a natural setting and can be useful when researching issues about which very little research has been done (Babbie & Mouton, 2001). In this regard, hardly any research in relation to the dual diagnosis of AS and CD has been conducted previously, thus proving relevant with regards to this area of research. Furthermore, this research was informed by the Interpretivist paradigm which acknowledges the importance of understanding human experience (Babbie & Mouton, 2001) and as such allowed for this research to understand the subjective experiences of the clinicians' opinions of the possibility of dual diagnosis of CD and AS in children.

3.1 SAMPLE AND SAMPLING

The sample included eight clinical professionals living in the greater Johannesburg area whose practises involve working with children and adolescents. The sample consisted of four clinical psychologists and four child psychiatrists who have various experience or knowledge in the field of AS and CD. The mean of the Professionals experience was approximately 14 years in clinical work, and two of the child psychiatrists are Professors in their field and as such the sample was chosen so as to draw on experienced clinical opinion. Furthermore, all the participants have been or are currently involved in the training of both Clinical Psychology Master Students and Psychiatric Registrars.

In addition, the professionals selected were psychodynamically orientated or they had knowledge of psychodynamic concepts as the research was considering concepts in relation to attachment theory and the theory of mentalisation. These parameters were seemingly important for the research in question as it is a conceptual investigation that

aimed to draw on professional opinion so as to inform, question and build on understandings that exist in relation to AS and CD and whether a dual diagnosis is possible. Therefore, the clinicians needed to be adequately experienced and knowledgeable in both the disorders and theoretical concepts under study to provide sufficient, appropriate information. Furthermore, professionals who are reputed to work within a psychodynamic framework were targeted for inclusion in the sample so as to provide for greater depth of opinion as opposed to breadth, had professionals from differing orientations been included. The professionals were selected from both private settings and hospital settings so as to have a broader range of participants with various exposure to working with children with AS and CD. Some of the clinicians may have been more experienced in one disorder; however, they have all worked with children with either diagnosis. All the participants in the sample had various experience in both settings but during the course of data collection, four participants were primarily working in a hospital setting and four in a private practice.

The sample was chosen by means of a non-probability sampling strategy which can be defined as a sample that is selected in a non-random manner (Cohen & Manion, 1994) which was applicable for this research as the Professionals were chosen based on certain criteria that was important for the intended research and therefore could not be randomly selected. In addition, this sampling strategy was seemingly appropriate as this research does not intend on generalizing these findings beyond the sample in question. The sample was located using a purposive sampling strategy where the sample was selected based on certain characteristics pertaining to the requirements of the research under study (Silvermann, 2000) as mentioned above.

3.2 PROCEDURE:

In consultation with the researcher's Supervisor, a list of Professionals' names was compiled which included clinical psychologists and psychiatrists in Johannesburg who work with children and adolescents. Emphasis was placed on including professionals who are psychodynamically orientated or who have an interest in the concepts under study that being attachment theory and mentalisation. Furthermore, the list consisted of

professionals who work in diverse settings so as to have a broader range of clinical experience and exposure from which to draw upon.

The Researcher then contacted these Professionals telephonically so as to determine whether they would agree to participate in the study. During each telephone call, the Researcher introduced herself and detailed that she was a Clinical Masters Student from the University of the Witwatersrand. The nature and purpose of the study was explained with specific reference to the title of the research, the aims of the research intended, and the focus of the study being around the concepts of attachment and mentalisation theory. Furthermore, explanation around the nature of participation was detailed where the potential participant was told that involvement would entail participating in a face-to-face interview with the researcher that would last for approximately forty minutes, at a time and place that was convenient for them. All the participants contacted by the researcher agreed to participate in the study and a time and place was organised at their convenience in order to conduct the proposed interview. Seven of the eight participants chose his/her office as the location for the interview, however one participant chose a public setting and as such the interview commenced in an isolated area where no disturbances could arise. Furthermore, the interviews were conducted in a private setting so as to allow for continued confidentiality.

At the time of each interview, information sheets were provided to each participant to read through before the interview commenced (please refer to “appendix A”). Verbal explanation was provided regarding the nature and purpose of the research, allowing for additional questions to be answered beforehand. Consent forms and audio tape consent forms were handed to each participant to read and sign before the interview commenced. The consent form detailed whether the participant agreed to take part in the research and outlined ethical requirements regarding the rights of the participant (please refer to ‘Appendix B’). The audio tape consent form was included with regards to providing consent for the interview to be tape recorded (please refer to ‘Appendix C’). Additionally these forms highlighted that quotes will be used in the research but that confidentiality will be maintained. All participants agreed to their interview being tape recorded and thus

provided consent to participate in the study. Furthermore, the researcher explained to the participants that the interview schedule was structured in such a way that it focuses on each disorder separately, then shifts to questions pertaining to conceptual understandings around the similarities and differences between each disorder and then explores their opinion about the possibility of dual diagnosis.

An individual, face-to-face semi-structured interview was conducted with each participant. This method was used as it is a flexible tool which allows for further exploration and the incorporation of possible emerging issues and information (Babbie & Mouton, 2001). A semi-structured interview schedule was used which was compiled based on questions extracted from the literature reviewed and in relation to the theory that informed this research so as to help focus the interview by choosing certain areas within which the researcher could explore and ask questions that revealed relevant information for the research under study (please refer to 'Appendix D'). The interview schedule consisted of open-ended questions so that the interview process was open to further inquiry if necessary and relevant questions were introduced based on the content of the dialogue elicited during the interview, so as to extract as much information about the participants' conceptual understanding of the dual diagnosis of AS and CD. This method allowed for more freedom in terms of obtaining information that was relevant to the research as it allowed for the encouragement and development of dialogue between the researcher and participant thus allowing for the collection of rich, meaningful data (Cohen & Manion, 1994). However, due to time constraints, some questions were not asked of some participants and as such some of the interviews are more in-depth than others which may be a potential limitation of this research which will be addressed later on in the report. The interviews lasted between forty minutes and an hour and a half, depending on the participants' time constraints and the nature of responses obtained.

The interviews were audio tape recorded by the researcher so as to remain attentive towards the participant and so as to allow the interview process to flow naturally. The interviews were then transcribed verbatim by the researcher alone so as to allow for a full and accurate analysis and to allow for the researcher to become familiar with the data

collected (Babbie & Mouton, 2001). Once the data was transcribed, data analysis commenced (please refer to 'Appendix E' for interview transcripts).

3.3 DATA ANALYSIS

Once the researcher concluded that saturation had occurred, the researcher discontinued the semi-structured interviews. Thematic content analysis was conducted on all eight transcripts so as to analyse the data obtained from the interviews. Thematic content analysis is a logical and consistent method used to organise interview material in relation to the specific research questions posed by this study (Banister, Burman, Parker, Taylor and Tindall, 1994). Thematic content analysis allowed for the researcher to firstly, examine the data gathered in the interviews and secondly, to organize it into themes so as to break the data into more understandable concepts (Neuman, 1994). The researcher then coded the data in relation to the research questions and through the various stages of coding, the researcher identified main themes that helped answer or relate to the research questions. Therefore such an analysis helps to simplify large amounts of data into smaller, understandable themes, "in terms of how a theme relates to the notion of what is being studied, the theme is the means to get at the notion, gives shape to the shapeless, describes the content of the notion, and is always a reduction of a notion" (Van Manen, 1990, p. 88, as cited in Bennett, 1998).

In order to identify the themes, the researcher firstly read and re-read the interview transcripts in order to reduce the interview data and to help generate understanding into the clinicians' opinions and understanding of the conceptualisation of the dual diagnosis of AS and CD, and so as to help the researcher become familiar with the raw data (Boyatzis, 1998). The researcher used the margins of the transcripts to note interesting or possibly significant information, and determined which data or phrases were essential in relation to the nature of the study being conducted. Important quotes and significant information was highlighted, underlined or circled using different colours for each participant (Bennett, 1998). Furthermore, potential themes that arose that related to the concepts under study were noted and colour coded.

Once all the transcripts had been read and reviewed, the researcher compared notes and summaries from each transcript so as to identify themes, patterns, similarities and differences that may have been present (Boyatzis, 1998). Furthermore, once relative potential themes were noted, the researcher mind-mapped the different themes, creating links between important areas of interest and connecting themes so as to decrease the amount of themes that would relate to and encapsulate the constructs under study. Additionally, these procedures were carried out whilst analyzing the data in three stages of ‘coding’ which essentially helped to identify relevant themes. The three types of coding that were conducted on the data collected are open coding, axial coding, and selective coding (Babbie & Mouton, 2001).

Through ‘open coding’, categories were identified by considering sentences or paragraphs so as to reduce large amounts of data into recognizable, logical categories that describe the content and meaning associated with the participants’ responses (Babbie & Mouton, 2001). The second stage of analysis occurred when the researcher conducted ‘axial coding’ where the researcher focused on the examination, evaluation and organization of the initial categories created in the first stage of coding, identifying key concepts and connections that were occurring between the dominant themes in the research (Babbie & Mouton, 2001). This stage of coding allowed the researcher to further create links between certain themes which essentially provided a way in which to relate the themes to the research questions under study. The final stage of coding called ‘selective coding’ occurred when the researcher scanned the data and previous categories, comparing and contrasting themes, so as to further extract themes that contributed to answering the research questions (Babbie & Mouton, 2001).

By sifting through the data gathered from the semi-structured interviews, and by identifying and creating specific themes through the different stages of coding, the researcher gathered appropriate themes that helped answer the research questions posed. Therefore the themes were separated into ‘sub-themes’ and then grouped into broad categories called the ‘main themes’ which were grouped according to the relevant research questions. Relevant quotes were extracted that pertain to the main themes and

sub-themes and situated under the relevant theme to illustrate the clinicians' opinions and conceptual understanding with regards to the dual diagnosis of AS and CD. Each main theme pertains to a specific research question and as such later stages of analysis were guided so as to try answering the research questions under study.

3.4 ETHICAL CONSIDERATIONS

All ethical considerations were fully observed. Permission was sought from and cleared by the University of the Witwatersrand. All ethical requirements stipulated by the University for conducting research were fulfilled. Information sheets detailing the nature and purpose of the research intended and the manner in which data collection would occur was provided to each participant before data collection commenced. Informed written consent to participate and permission for interviews to be tape recorded was obtained from each participant beforehand. Full explanations were offered so that participants understood the purpose of the audio tape fully. Additionally, participants were informed of confidentiality before data collection began. Confidentiality was further ensured as participants were not identified in the final report as they were referred to as 'participant one, two' and so forth, and all identifying data obtained during the interview has been abbreviated, disguised or removed for privacy purposes.

All participants were ensured that participation is voluntary and that they could withdraw at any time, although none of whom did. If participants agreed to participate, it was made clear that they could decline answering any questions they did not want to. If participants decided not to participate, they were assured that choosing not to participate held no negative consequences for that person. Furthermore, participants were informed that there were no direct benefits in participating in the research. Contact details for the researcher and research supervisor were provided in the information sheet and given to the participants in case questions or concerns needed addressing. Access to the audio tapes was restricted to the researcher during transcription as this was done solely by the researcher to further maintain confidentiality. Additionally, the audio tapes were kept in a safe place in the researcher's care so as to further maintain confidentiality and will be destroyed once the research is examined.

CHAPTER 4: RESULTS

The themes which emerged from the interviews conducted with the eight clinical Professionals were categorised into the following broad categories: clinicians' understanding of the conceptualisation of Asperger's Syndrome in relation to attachment theory; clinicians' understanding of the conceptualisation of Conduct Disorder in relation to attachment theory; clinicians' understanding of the conceptualisation of Asperger's Syndrome in relation to mentalisation theory; clinicians' understanding of the conceptualisation of Conduct Disorder in relation to mentalisation theory; clinicians' opinions of diagnostic and theoretical similarities and differences between Asperger's Syndrome and Conduct Disorder; clinicians' opinions regarding the possibility of the dual diagnosis of CD and AS in children; and, clinicians' opinions about the possibility of misdiagnosis. For the sake of accuracy and clarity, each broad theme is divided into a number of sub-themes.

To further add to the need for confidentiality, all references to the participants will be in the feminine. Additionally, any identifying information with regards to references to experiences in clinical settings or institutions has been removed.

4.1 Clinicians' understanding of the conceptualisation of Asperger's syndrome in relation to attachment theory

4.1.1 AS is viewed as unrelated to attachment as it is a neurodevelopmental disorder

All eight participants stated that they do not conceptualise Asperger's Syndrome in relation to attachment theory. All participants justified their opinion by describing AS as a neurodevelopmental disorder and consider theoretical concepts related to attachment as something in which they do not generally think about in relation to the syndrome.

"Asperger's syndrome has nothing to do with attachment theory. It is a neurodevelopmental disorder and that is that." (Participant 4)

“I don’t see attachment difficulties as causing Autism or Asperger’s” (Participant 5)

However, all eight participants detailed how, although they do not relate AS to attachment theory in trying to understand the disorder, that children with AS generally do attach but seem to do so in a different manner due to the characteristics of the syndrome and their brain structure.

“Asperger’s do seem to attach, I mean I think everything is distorted in these children because they have difficulty with incoming perceptual, you know interpreting incoming perceptual stimuli and so everything is confusing for them but attachment is such a very basic thing that they do seem to know who their mother is, you know if there is a good mother” (Participant seven)

“I think it is part of the syndrome rather than related to attachment.” (Participant one)

The participants detailed how children with AS are capable of attaching to a caregiver but that the way in which the child attaches is complicated by the biological basis of the disorder. All participants explained that in their experience, children with AS generally attach securely and that they engage in attachment behaviours although their behaviour is of a different quality. Children with AS may proximity seek and become anxious if their caregiver is absent for example, but their manner of relating is filtered through their characteristic way of functioning.

“I think it is different. I think they are attached but they attach differently. It is odd, it is idiosyncratic, it is a bit eccentric for example they may be very averse to physical affection and actually avoid it but that does not mean they are not securely attached in their own way.” (Participant two)

“So what you do find is that they are distressed when the primary caregiver goes away although they may not seek out in usual ways that a well attached child without Asperger’s might do... they clearly very distressed when these people go away...if they are upset they do want this figure to come and help them but they may not necessarily want this figure to come and hug them but it is still proximity seeking provided you understand that there is this faulty filter that it is going through.” (Participant four)

4.1.2 Attachment is not set in stone; it is on a continuum and depends on the individual

Although all participants stated that children with AS have the capacity to form attachments, participants 3, 4, 5, 7 and 8 additionally acknowledged that children with AS are not precluded from developing attachment difficulties and that if a child with AS is neglected or abused or does not form an attachment, severe difficulties may arise.

“Asperger’s may well be securely attached, they don’t necessarily have attachment problems and they are not unbonded or unattached children either...but they can coexist so if there is a dicey or insecure attachment it could still occur in the presence of an Asperger’s child.” (Participant three)

Participant 7 highlighted that children with more severe neurological impairments and thus who are lower functioning on the spectrum, may develop less secure attachments as a result, however she emphasized that children with AS do have the capacity to attach.

“However it depends on who you are talking about because a severe autistic doesn’t connect with anyone so how do we know if they are attached or not because we don’t have a clue but Asperger’s do seem to attach.” (Participant seven)

4.1.3 Children with AS are vulnerable to difficulties in attachment

Participant 5 and 7 stated that although children with AS seem to attach securely, the attachment process is at a higher risk for impairment and that these children seem to be more vulnerable to the possibility of bad parenting and attachment difficulties due to their inherent difficulties with relating to the world. Participant 5 stated that although children with AS have the capacity to attach, that the attachment process is more complicated and vulnerable with children with AS as these children are less able to respond to their caregiver appropriately due to the biological aspects of the syndrome. Participant 7 stated that children with AS are vulnerable children in a world that is highly confusing for them and that often these children can be vulnerable to ill treatment or bad parenting which is when attachment difficulties arise.

“The Asperger’s children are quite capable of attaching but they are quite vulnerable to bad parenting and then you do get attachment problems or to parenting where the parent isn’t present” (participant 7)

4.2 Clinicians’ understanding of the conceptualisation of conduct disorder in relation to attachment theory

4.2.1 CD is related to impaired attachment but it is on a continuum

All eight participants conceptualise conduct disorder in relation to attachment theory and describe CD as fundamentally related to impaired attachment either due to neglect, abuse, trauma and/or faulty parenting. However, the severity of the attachment impairment depends on the environmental context and as such some children with CD have more disturbed attachments than others thus placing the nature of attachment in CD on a continuum. Participant 4 stated that not all children with CD are unattached but that often their attachment is primitive and pathological in nature. Participant 6 explained that children with CD may have an attachment to a caregiver but that the attachment is impaired in the sense that the child cannot generalise this to other relationships. However, all participants acknowledged the influential role attachment theory plays in understanding CD and that often the attachment is disordered although the severity of

disruption in attachment differs amongst children with CD. In this respect, participant two encapsulates the general view of the participants interviewed:

“I think even if I just look clinically at my practice so many if not all of my clients with that condition have had disrupted, disturbed attachment and their ability to have empathy, their ability to love, their ability to consider the needs and rights of others is predicated upon early experiences with the caregiver, the attachment figure and this just hasn’t happened for those kids.” (Participant two)

“I think they do, some of them don’t have proper attachments at all, they have just never had proper attachments but others do for example if you look at the classification of attachment types, some of them have what we call disorganised attachment. I have seen others who have been insecurely attached who have evidence of separation anxiety as well so I mean I think there is disordered attachment in a clinical way.” (Participant two)

4.2.2 There is a genetic link in one third of individuals with CD

Participant 1, 3, 4, and 6 commented that recent research has shown that CD has a genetic link in some individuals and although there is often the presence of abnormal attachment in other individuals with CD, some children develop CD over time as a result of a genetic predisposition which they accounted for by citing research done on adopted children who had biological fathers with antisocial personality disorder who they did not have contact with prior to adoption.

“So attachment is protective in terms of the development of conduct but I also believe there is a genetic component to conduct so it is going to run” (participant six)

“There also does seem to be some genetic link. So you do find, I mean...I am just thinking of a child I saw who was adopted at birth to a relatively normal family,

whose father was antisocial you know so I think there is a combination”
(Participant one)

However, participant 1, 3 and 4 emphasized that although there may be a genetic predisposition in one third of children with CD, the environment and attachment plays a fundamental role in the development of CD.

“So we know there is a genetic predisposition but a predisposition is a predisposition, we do need enabling things in the environment and that is invariably a punitive, neglectful environment in which attachment is impaired. That is your conduct disordered children.” (Participant four)

4.2.3 There are different kinds of CD

Participant 8 emphasized that she believes there are different kinds of conduct disorder. She emphasized that CD may arise as a result of temperament or as a result of the need to protect oneself and as such the behaviour is seen as a defense. She also mentioned how CD may arise in response to a stressor in one’s environment which would be seen in adolescent CD in comparison to CD that arises as a result of impaired attachment which would manifest earlier on and would be more pervasive.

“I do believe you get two very different kinds of conducts though. You get your conduct that is very temperament where it seems there was a lot of, it’s not like they grew up in a drug addicted family in a dangerous area or whatever but the child still develops it and that is more your temperament but then you get children I think that develop it as a survival tactic, it is defenses. So it is a defense system that starts early on... the onset can be at different times as well, so you know, obviously your much earlier conduct is prognostically quite bad as opposed to someone who starts in adolescence, you know, as a reaction.” (Participant 8)

4.3 Clinicians' understanding of the conceptualisation of Asperger's syndrome in relation to mentalisation theory

4.3.1 Deficient mentalisation in AS due to brain structure

All eight participants conceptualise AS in relation to mentalisation theory and suggest that children with AS have a decreased capacity to mentalise and thus struggle to show empathy. The participants accounted for such a deficit in their ability to mentalise as being related to their brain functioning. Participant 2 emphasized that because of frontal lobe dysfunction in AS, the ability for the normal developmental understanding of others as being separate is impaired.

“I have a good understanding of ToM and I think that for me is fundamental, it is key to understanding the condition...I think it just so happens that the part of the brain that is affected i.e. frontal lobes, I think largely frontal lobe functioning happens to be that which is responsible for the mentalisation” (Participant two)

Participant's 1, 3, 4, 5, 6, 7 and 8 all emphasized the role of cerebral connections, faulty wiring, and brain malfunction that is characteristic of the syndrome as being involved in the impoverished ability for mentalisation in children with AS. The following quote reflects the general view held by the participants:

“I assume it has to do with how their cerebral connections work that in interpreting somebody's face and you know the pathway that goes from that part of the brain to how you then react to that person. All these pathways are faulty so you can develop them but they are not there the way they are in everybody else or they are all misconnected, it is like the wiring is faulty.” (Participant seven)

4.3.2 The ability to mentalise is on a continuum; it depends on IQ and may be acquired

Participant 4 and 5 emphasized that although the ability to mentalise is impaired in children with AS, that the severity of impairment will depend on the child. Participant 4 explained that children with AS are better able to mentalise in concrete situations but

once they need to mentalise in more subtle interactions, they are more severely impaired but that one cannot over generalise understandings of impoverished mentalisation abilities to fit every individual with AS.

“if you take the Asperger’s individual into slightly more subtle interactions, the capacity to consider that the other person has a mind and has thoughts and feelings that might be different from yours, you find that is much more impaired and the Asperger’s person certainly does have severe problems with mentalisation, there is no doubt about it but it would be a mistake to think it is absolute, it is clearly on a continuum. I mean I have had Asperger’s people get the idea that other people will get distressed under certain circumstances”
(Participant four)

Participant 5 highlighted that although there are difficulties in the capacity for mentalisation, the ability to mentalise may increase as a child develops and the ability to mentalise may depend on the child’s IQ. Furthermore, participant 1, 3 and 7 detailed how mentalisation needs to be taught to these children and thus it is something that may be acquired through learning, although with some difficulty.

“I do think they are able to show the ability as they develop but I think it is linked to their IQ...I think the higher the IQ the more capacity they have to learn how to see things from another’s perspective rather than it being more innate.”
(Participant five)

“That is what they have got to learn but they do learn a lot and the more people explain to them the better they get but it takes time and they are still left with a deficit because in everybody else it is innate, in this lot, it is acquired with great difficulty and some can barely do it.” (Participant seven)

4.3.3 Any links between attachment and mentalisation capacity in AS?

Participant 4 highlighted that a child with AS's inability to mentalise has nothing to do with attachment as it is a neurodevelopmental disorder and although mentalisation can be taught, it can never be fully acquired in a person with AS because of their brain functioning whether they are attached or not.

“So what you see is that you can improve their sense of reciprocity up to a point but it is developmentally delayed compared to other people but I don't think there are any Asperger's people who can do mentalisation properly and that's because it is a neurodevelopmental disorder... So what I am saying is there is something wrong in the brain here, forget attachment.” (Participant four)

Additionally, participant 1, 4 and 7 highlighted that mentalisation can be acquired to a certain extent in children with AS but that it is done with great difficulty. In order to improve their sense of reciprocity and thus the ability to mentalise, the child needs to have a basic attachment to learn, otherwise their ability to learn to mentalise will be compromised.

“If you don't have attachment then you are not empathic so you cannot teach it to the one that doesn't have the basic attachment, you can stand on your head.” (Participant seven)

“An Asperger's needs to be attached to empathize but they don't really empathize, they want to empathize but they don't know how to do it, so if you correct them, they modify but they do struggle with empathy” (Participant four)

4.3.4 Children with AS struggle with empathy as they don't know how to use it

All of the participants stated that children with AS have the capacity to attach and that through this they acquire a sense of empathy but that due to the nature of the disorder and the biological complications, although these children have the motivation to please and may have the capacity to have empathy due to secure attachments, they aren't fully able

to understand or show the feeling appropriately and thus are unable to fully empathise. As they are unable to recognise facial expressions and social cues due to executive dysfunction, they have the empathy but don't know how to use it (participant 4, 5, 6, 7).

“I think the Asperger's child, they do have the capacity for it to have some sort of emotional meaning in the sense of desire to please but they struggle to understand what it is the other person is thinking or how they are supposed to respond to it.”
(Participant five)

4.4 Clinicians' understanding of the conceptualisation of conduct disorder in relation to mentalisation theory

4.4.1 Children with CD can mentalise but do not empathise

Participants' 1, 2, 4, 5, 6, and 7 emphasized that children with CD have the ability to mentalise and see others as separate but they understand that these children choose not to.

“I think that they have a clear concept of the idea that others are different and others have their own needs, rights, desires and opinions, I just think they violate them, they choose to disregard them.” (Participant two)

Participant 2, 5, 6, and 7 explained that children with CD have an understanding that others are separate with their own beliefs and feelings but that children with CD choose to disregard those feelings because their own needs take precedence over others. They attribute this understanding to the impaired attachment that is often seen in children with CD where the capacity to think of others has not been developed and as such the notion of reciprocity and the importance of the other is somewhat impaired. Participant 5 emphasized that although the ability to read another's mind as separate is apparent due to their cognitive capabilities, due to impaired attachment, a child with CD has no desire to please the other as they cannot form an emotional connection to the other and thus cannot make their understanding of the other meaningful and as such their behaviour is predicated on meeting their own needs. She explained that due to early attachment difficulties, a child with CD does not have the capacity to form relationships or to

empathize with other people and although they have the capacity to understand another's behaviour or thoughts, they lack the capacity to *respond* to the understanding of the other and thus do not feel or allow the other to influence their behaviour in a meaningful way.

The following encapsulates the general view:

“I think with conduct disorder that the impairment in mentalisation is linked to the fact that they haven't had a space where their needs were met so their capacity to see relationships as being useful and desirable is impaired. They learn to rely on themselves more, they learn that sort of survival of the fittest, that kind of ethic that you need to look after yourself and so I suppose it is linked to the sense of if you are securely attached and you have had a person who is caring for you, you then have the capacity to re-enact that in your relationships with other people the capacity to care for them, take their feelings into consideration where as with a conduct disorder you might be able to understand how somebody else is feeling but because your feelings haven't really been taken into consideration, you lack the capacity to respond to that and the desire to respond to that.”
(Participant five)

Furthermore, Participant 6 emphasized that children with CD cannot appreciate the feelings of others because they do not care about the other and rather than the impairment being related to the lack of knowing the other is separate, the child with CD is impaired in his ability to empathize due to attachment difficulties. Participants' 1, 2, 5, 6 and 7 emphasized that these children lack empathy rather than lack the ability to mentalise.

“a fundamental deficit of conduct disorder is the appreciation of the feelings of others not so much because you don't know that they have feelings but you don't care that they have got feelings” (Participant six)

“I think there is the lack of empathy, it is diminished because they might have the capacity to understand the other person's behaviour or what they are thinking but there is a lack of capacity to feel much about that, to let, to allow another

person's feelings to influence their behaviour and the decisions that they make.”
(Participant five)

Furthermore, participant 7 emphasized that children with CD are capable of mentalising and can sometimes be very skilled at doing so especially with regards to meeting their own needs but that in their capability to mentalise, they do not have the capacity to empathize.

“I think they are quite good at mentalising and can con the hell out of you”
(Participant seven)

“...they just don't care, they don't have the capacity for empathy, they are the ones that actually don't have the capacity at all” (Participant seven)

Participant 4 emphasized that some children with CD can partially mentalise but that they cannot empathize fully. However, she added that these children are able to mimic empathy when they want or need something and although they know what they should do or what is right, they choose to disregard this because they do not care as they are unable to feel an emotional connection to the other due to impaired attachment and as such she explained that children with CD may have the capacity to empathise but choose not to due to deficits in their ability to sympathise. However, Participant 4 pointed out that the mentalisation capacity of children with CD proper is impaired.

“So mentalisation, I think what you will find with conduct disorders is that some of them are sophisticated enough to fake it, certainly get some idea of what the other person is thinking, they sometimes do know what the other person thinks and don't care but really if you have a proper conduct disorder, a full blown one that meets all the diagnostic criteria, their mentalisation functions are impaired with no question, they are hugely impaired.”

“They know what they should do and they choose not to do it because they can mimic and very often mimic and they can pretend to be sweet and little children with conduct disorders when they are being naughty, can pretend to be very sorry because they can avoid getting a hiding so they can all mimic which means they have the capacity for empathy technically in that you can mimic but they don’t have a capacity for sympathy”

However, she added:

“I think that the conduct disorders actually can empathize and choose not to and I think they have got big problems with sympathy but that is because I think empathy can, you can get away with a lot of mimicking behaviours that look like empathy so in a way I think it is a fake empathy if you like.” (Participant four)

4.4.2 Impaired mentalising and impaired empathizing

In contrast, participants’ 3 and 8 emphasized that children with CD have a difficulty with mentalising and empathizing. Participant 3 explained that children with CD have a difficulty with empathizing and mentalising due to attachment difficulties and if their attachment was not disrupted during the critical period of attachment, they may have had the capacity to think of and feel for others. Participant 8 explained that on both an emotional and cognitive level, children with CD have difficulties relating to and feeling for the other and are unable to adequately mentalise.

“Well again there is a great self-absorption and a difficulty with mentalising and a difficulty with empathizing so again that same sort of thing but it is more now not because they can’t or they wouldn’t have been able to possibly, they may have been able to if they hadn’t had their own attachment disrupted somewhere along the line.” (Participant three)

“I think it is a couple of levels I think there is a problem with emotion so affect, there is definitely an issue there so in terms of relating to other people and

empathy. There's the idea of the cognitive side of it so not emotional, how do they understand relationships between people and I think that is impaired as well that the ability to naturally empathize with someone isn't there." (Participant eight)

4.4.3 The ability to manipulate is related to getting their needs met

All eight participants emphasized that a child with CD's ability to manipulate is related to getting their own needs met. The following encapsulates the general view:

"A conduct disordered child is self-centred, is oriented on their own needs and will manipulate to get what they need because they are primary." (Participant six)

Participant 4 and 8 further emphasized that children with CD are able to read social situations and therefore behave in manner that will fulfil their needs. They emphasized that these children learn how to manipulate others as they have learnt how to get what they want from the world and are therefore able to pick up on social cues that will afford them the ability to meet their own needs. As they lack the desire and motivation to please, their needs supersede others.

"they can read social situations accurately but they lack the motivation to perform in social situations in the way expected so for example if you don't have a sense of empathy and you don't really have a need to please people because you are not really attached and you don't form bonds, you don't see the point of doing certain things... but they are only motivated to be reciprocal and to play ball if there is self interest." (Participant four)

Participant 1, 5 and 7 attributed the ability to manipulate as being related to their ability to mentalise so children with CD are able to read another's mind to get their own needs met, but as they lack empathy they cannot make mentalising meaningful for the other, rather it is used for self-gratification.

“I think that it is very linked to mentalisation because they do have the capacity to read another person’s mind but they lack the empathy to make that meaningful in terms of relationships so I think manipulation is based on getting your own needs met. You manipulate somebody, you find the best possible way you can to get your needs met and there’s a sort of a lack of concern for the feelings of the other or the impact of your behaviour...that your behaviour has on the other.”
(Participant five)

Participant 2 explained that children with CD engage in manipulative behaviour as a means for self-gratification due to attachment difficulties as their sense of reciprocity and the importance of the other has not developed.

“I think drawing on attachment theory, the importance of the reciprocity of the relationship, the importance of the other hasn’t been properly developed from the critical periods of early attachment and so again the way they think, the way they operate is purely for self gratification” (Participant two)

4.4.4 The emotional connection to the other is impaired: the problem is with sympathy

Participants 1, 2, 4, 5, 7, 8 explained that due to the impact of impaired attachment, children with CD do not develop empathy fully which is predicated upon the early experiences with the caregiver and as such are unable to consider the needs and rights of others and as such further impairs their ability to empathise. Participant 4 and 7 elaborated that children with CD have not been exposed to a caregiver who shows and treats the child with empathy and as such the child doesn’t develop such a capacity. They explained that due to the lack of attachment their ability to sympathise (or to empathise emotionally) is compromised. Participant 2 and 4 explained that in children with CD their ability to feel emotionally connected to another is impaired which is related to the nature of their early attachment experience.

“If you abuse or neglect a child sufficiently and disrupt the attachment sufficiently you will disrupt their capacity to form attachment and we know that... Now that is your capacity to, at the end of the day, filters your capacity to contain yourself, how you express yourself and ultimately the basic building blocks you need for things like empathy. So what happens if you don’t actually show or treat a child with empathy is that they don’t develop it and they develop high rates of rage and then what happens is they end up being horrible psychopaths.” (Participant four)

However, participant 4 and 7 emphasized that as a result of impaired attachment the child with CD cannot sympathize or emotionally connect to others but that they seem to be able to fake empathy and mimic behaviour so as to get their needs met.

“The conduct disorder person is impaired in a different way...he has lost the capacity to care about anyone at all...I mean what has happened is something that has destroyed them but it is an environmental failure...links between affection and empathy and responsiveness are not going to be formed” (Participant seven)

4.5 Clinicians’ opinions of diagnostic and theoretical similarities and differences between Asperger’s syndrome and conduct disorder

4.5.1 Superficial diagnostic and conceptual similarities between AS and CD as the underlying mechanisms are different

Six of the participants interviewed stated that on the surface there seem to be some similarities between the two disorders such as the lack of empathy, possible aggression, lack of reciprocity in relationships and a disregard for social rules for example. However, all six of them emphasized that although the behaviours that may manifest in each disorder seem to be similar, they are superficial in nature. The following quotes encapsulate the general view: (Participants 1-6)

“I would say the only similarity is the lack of empathy and the other thing that I think sometimes confuses one clinically is that they often both have rages and act them out and they can be quite destructive...but that’s only a superficial, you know, when you start teasing it out you can see there is quite a wide difference in the way those operate.” (Participant one)

“I think because they are superficially perceived by some to be people who don’t relate well, or people who don’t form reciprocal relationships or people who don’t attach properly because some people have some superficial, preconceived ideas and they might confuse them but it is nonsense they are not the same thing.” (Participant four)

Even diagnostically, the participants highlighted similarities in egocentricity, social development and empathic difficulties but even though the behaviour may be similar, the reason, motivation and intention for the behaviour is different and essentially although they may be equated because of common behaviours, the two disorders are fundamentally different, conceptually and diagnostically.

“I think that the way that it presents may be quite similar, so they may do things but the underlying mechanisms for why are different, so they both might do things that are potentially damaging to others or are aggressive or violent but the underlying mechanisms might be different in that the Asperger’s as individuals might not always understand the concept of why what they are doing is wrong and isn’t socially acceptable where as conduct disordered individuals often do know exactly what is right and wrong and how society would need them to behave but they don’t act in accordance with knowing that.”(Participant three)

Participant 7 did not specify any similarities, however she pointed out that the two disorders are completely different and cannot be equated as similar, rather they are two separate disorders and although the symptomatology may overlap, the symptoms arise for different reasons.

“Well conceptually they are two different conditions with different origins and different outcomes.” (Participant seven)

Participant 2, 3 and 5 acknowledged a possible similarity in the deficits in mentalisation between the two disorders but stated that although they both have deficits, the degree of impairment and the underlying mechanism for the impairment is different. The difference rather lies in the conceptualisation of the deficit where it is understood as being acquired in CD due to attachment difficulties versus innate in AS due to biological difficulties.

“maybe more to do with the mentalising where it is harder for both of them to put themselves in another’s shoes and picture what effects their behaviour is going to have on others so in that respect ya.” (Participant three)

“maybe in terms of mentalisation now that you ask me the question, there could be but again I see a distinction between the two because I see in Asperger’s a biologically driven deficit in mentalisation whereas in conduct more of an acquired problem related to early attachment” (Participant two)

However, despite superficial diagnostic and conceptual similarities of both being self-centred and ‘lacking’ in empathy, participants 1-6 emphasized that the major difference between the two disorders is that one is a disorder of attachment or environmental failure (CD) and the other is a neurodevelopmental disorder (AS) which makes the two disorders completely different in trying to understand them. CD is understood to be a dysfunction in attachment that leads to the inability to care/connect wholly with others thus choosing their own needs over others whereas AS, although generally attached they are self-centred and seem unempathetic because of brain dysfunction and thus cannot relate appropriately.

“I think you can take things out that are common but I really believe that they are fundamentally different. If you look at these, if you spend time with Asperger’s

kids and you spend time with conducts, except that you dealing with attachment which is going to connect them but fundamentally it is not even coming from the same route, no” (Participant six)

“[CD]...are not impaired in the same way as the Asperger’s; the one has got a biological miswiring, the other one hasn’t. The one is a biologically damaged brain and the other one isn’t. So the normal brain will learn how to get what you want from people because he can pick up your cues and he can read what you want and he knows what you respond to and he can put that information together and he knows what will work. The Asperger’s child is much more straight forward, he can only give you his point of view and if you love him you accommodate him and then he wants to please you and he will try and understand and a lot of them want to relate to people, they just don’t know how but the conduct disorder person is impaired in a different way but he has lost the capacity to care about anyone at all.” (Participant seven)

4.6 Clinicians’ opinions regarding the possibility of the dual diagnosis of AS and CD in children

4.6.1 Views in support of dual diagnosing AS and CD in relation to attachment and mentalisation theory

Four of the participants (4, 5, 7 and 8) interviewed support the possibility of dual diagnosing AS and CD. All four participants justified their opinion by explaining that if a child with AS has an impaired attachment, a dysfunctional family history, or have been exposed to neglect or abuse; the child may develop a co-morbid diagnosis of CD. However, all four participants maintained that the disorders are separate pathologies, i.e. that they are mutually exclusive; but that if a child’s attachment is disrupted, conduct disordered features may develop in the child as a result which would constitute a separate but dual diagnosis with AS, i.e. a co-morbid diagnosis of CD.

“I think they can be co-morbid, I do think so, but they are different, you can get co-morbidity but they are different” (Participant five)

“They can be co-morbid, absolutely. They are mutually exclusive, they are two separate disorders and as in everything in psychology and psychiatry, they can be co-morbid.” (Participant four)

Participant 7 pointed out that if a dual diagnosis is made, the conduct disorder in a child with AS would have the same source as a diagnosis of conduct disorder proper where a dual diagnosis would occur as a result of either an attachment impairment, bad parenting, abuse or neglect and as such children with AS are vulnerable to CD if they are ill treated as is any other child who's maltreated or if their attachment is impaired. Participant 7 also pointed out that it may not necessarily be related to attachment impairment but if a child is treated with little empathy and as they have decreased coping mechanisms in a confusing world, the child with AS will be more vulnerable to developing CD.

“Asperger's are quite vulnerable to developing conduct disorder if they ill treated because they have so little ways of coping with what is happening to them. It is not necessarily attachment, it might be abuse” (Participant seven)

“If you get a conduct disordered Asperger's; it is the same source as an ordinary conduct disorder. It is abuse or neglect or loss of figure, parent figure you know there is an attachment problem, a problem with parenting or whoever the child would have been attached to so in that way the cause of the conduct disorder in the Asperger's is the same.” (Participant seven)

However, participant 5 explained that the child with AS's capacity for attachment is at risk and if a child with AS does not have an attachment and has a pathological relationship with their caregiver, their capacity for understanding and their capacity for concern is further impaired possibly resulting in co-morbid behavioural difficulties that may be conduct disordered.

“I think when there isn’t an attachment I think you will start getting more behavioural problems although you are likely to have behavioural problems for different reasons I think when the attachment is impaired you start getting more severe behaviour problems in an Asperger’s child.” (Participant five)

Participant 4 detailed that for a dual diagnosis of AS and CD, the child would have to have an impaired attachment and a dysfunctional family history and as such conceptualises the dual diagnosis of AS and CD as related to attachment.

“If you take an Asperger’s and you maltreat them and you disrupt their attachment, you will get an Asperger’s with conduct disorder features” (Participant four)

With regards to mentalisation, participant 4 explained that the inability to recognise social cues due to brain dysfunction in AS coupled with the lack of motivation and desire to please due to the lack of attachment, the child with AS and CD’s ability to mentalise is highly impaired. Due to the attachment difficulties, their ability to want to learn and please others as well as their filtering capacity for what is appropriate deteriorates.

“In terms of mentalisation, I think the motivation, I think they both have impaired mentalisation but in different ways, the problem with the Asperger’s is they have very few common sense social cues and if you take away their motivation to try and belong and adapt and adjust because they are attached and want to fit in, if that is taken away because they have been maltreated, they develop that lack of motivation you get in conduct disorder, then you end up with somebody who won’t mentalise at all and that is somebody who doesn’t see the point of fitting with society and you end up with somebody who is extremely difficult to modify and somebody that doesn’t fit into society and somebody you can’t control” (Participant four)

Participant 8 emphasized the role of the environment in the possibility of dual diagnosis where if a child with AS was exposed to an environment that was not conducive to facilitating an attachment or if a child was exposed to a stressful environment, the child may develop behavioural difficulties as a result.

“I think there are overlaps and you would have to be very careful in the diagnosis but ya the idea that there is an impairment in mentalisation, if ya...I would say a child with Asperger’s grew up in a dodgy area there is quite a good chance that the child would be diagnosed with conduct...I think that you can get a child who let’s say attaches to the mom in a sense, it is not wonderful but it is there, and the conduct is more a reaction to the environment so let’s say mom is not all that available and life is quite difficult for this child with Asperger’s anyway and then ya let’s say the conduct appears out of more a peer relationship so the early attachment is there but it is not protected enough.”(Participant eight)

However, all four participants maintained that an impaired attachment in a child with AS does not necessarily predict a diagnosis of CD, rather it makes them vulnerable to additional difficulties, one being the co-morbidity of CD.

“If a child has an impaired attachment, they might develop withdrawal or anxiety or depression, they might develop something else, they don’t necessarily develop conduct disorder. They don’t necessarily develop conduct disorder at all, some of them are just very withdrawn and very sad and some just don’t develop optimally you know they have this tall potential which is never realised.” (Participant seven)

However, the participants emphasized that a child with a dual diagnosis is one which harbours much aggression and rage with little motivation to modify their behaviour. Participants 4, 5 and 7 emphasized that a child with a dual diagnosis is very difficult to work with as a result.

“If you get an Asperger’s child who’s got a conduct disorder on top of it, it is a very worrying child because their capacity for understanding is very impaired”
(Participant five)

4.6.2 Views against the possibility of a dual diagnosis of AS and CD

In contrast, the remaining four participants disagreed with the possibility of dual diagnosing AS and CD (participant’s 1, 2, 3 and 6). The main theme with regards to the opposing view of dual diagnosis is that each participant viewed the two disorders as mutually exclusive disorders that cannot be co-morbid due to the biological role in AS and the nature of etiology in each disorder. Although participant 6 does not believe there is such a thing as a mutually exclusive disorder, she did not support the possibility of such a co-morbidity.

“I have seen Asperger’s with a lot of other comorbidity but never with conduct and I don’t see, I just think it is extremely unlikely.” (Participant six)

All four participants justified their opinion by regarding behavioural difficulties that may be present in a child with AS as being related to the disorder itself. Although similarities exist, all four participants view such similarities as superficial as the underlying mechanisms for the behaviour is different. They further accounted for their opinions by emphasizing that each disorder has a different etiology and although CD and AS may have similar symptoms, they arise for different reasons and thus clinicians need to look beneath the surface to clarify what is causing the behaviour.

“They are different etiologically and although they may have similar symptoms, it’s for different reasons and, you know, that is what needs to be teased out.”
(Participant one)

Participant 3 stated that if CD was to be diagnosed, AS would be the cause for the behaviour and therefore symptoms would essentially be characteristic of AS rather than the result of co-existing pathology.

“I would still conceptualise it [behavioural difficulties] as part of the Asperger’s syndrome, that being the hierarchy for me” (participant three)

Participant 2 emphasized that children with AS do not have the biological capacity to understand others in the way children with CD do and that a behavioural disorder or character disorder such as CD cannot be adequately accounted for in children with AS as the intention and mechanisms involved are not there.

“I think I would come back to the biological basis of Asperger’s disorder and their actual capacity, their actual biological capacity for understanding and appreciating the otherness of people, the needs, desires, opinions, viewpoints of other people just isn’t there. Now it isn’t there and I don’t think you can implicate a character disorder which is essentially what conduct disorder is and taken further antisocial personality disorder, I don’t think you can implicate that in somebody who doesn’t have the wiring” (Participant two)

4.6.3 Conflict with diagnostic training

Participants 1, 2 and 3 additionally viewed AS and CD as mutually exclusive disorders. While participant 1 attributed this understanding to the difference in empathic functioning in children with AS in comparison to children with CD, participant 2 and 3 attributed their understanding to diagnostic rules in relation to comorbidly diagnosing AS with a disruptive behaviour disorder.

“that may be a function of our training really but even other disruptive behaviour disorders such as ADHD strictly speaking are not allowed to be comorbidly diagnosed with Asperger’s, so no I would see them as being exclusive” (Participant two)

Participant 3 seemed ambivalent about her opinion on the possibility of dual diagnosis. Although she swayed more towards the opinion that dual diagnosis is unlikely, she

justified her view in relation to the diagnostic criteria set forth by the DSM-IV-TR. She explained that although AS and CD may overlap in terms of symptomatology, the classification systems do not allow for such an overlap and as such a dual diagnosis would not be possible.

“I suppose you could say with conduct features, ‘Asperger’s syndrome with conduct disordered features’ although I am pretty sure in DSM-IV it says they are mutually exclusive. It is a tricky one for me because it is not allowed according to the classification systems we use but...I would say no [to a dual diagnosis].”
(Participant three)

4.7 Clinicians’ opinions about the possibility of misdiagnosis AS as CD

Seven of the participants interviewed believe that the misdiagnosis of AS as CD is possible. Participant’s 1, 2, 3 and 6 explained that they think the possibility is quite high due to the superficial similarities between the two disorders and if the clinician does not tease out the underlying motivation for the behaviour, a misdiagnosis may occur. These participants acknowledged that behaviour seen in children with AS may be construed as conduct disordered if the child is manifesting signs of aggression for example and if one overlooks or does not consider the symptoms, patterns of behaviour, social skills and family history, misdiagnosis is likely.

“Superficially the behaviours of an Asperger’s child can look very antisocial or sociopathic. They come across as egocentric; they disregard other’s opinion, other’s rights; they don’t seem to care about others; they seem to have empathy but I think that’s a superficial appearance and you need to look a little deeper and look at the actual capacity to relate.” (Participant two)

Participant 6 emphasized that often clinicians consider the behavioural aspects and diagnostic criteria and although a child may ‘fit’ the diagnostic criteria, if clinicians do not consider the underlying mechanisms driving the behaviour, mistakes can be made.

“I think there is a chance that it could be misdiagnosed if you looked at the person purely on a behavioural scale. If your diagnostic parameter, if that’s the way you did it, you could make the wrong diagnosis because you could diagnose any condition on criteria but the essence of these diagnoses is not on criteria, it is on the complex as it fits into the person and particularly with Asperger’s.”
(Participant six)

Participant 7 agreed that a misdiagnosis is possible and emphasized that such a possibility occurs not due to diagnostic confusion but rather as a result of the lack of awareness with regards to Asperger’s syndrome and that often clinicians miss the features of AS especially if the individual is higher functioning.

“It can be quite difficult to pick up Asperger’s because people get so fixated on the behaviour that they don’t see the Asperger’s especially on the spectrum if you at the high functioning end where you more sort of right up there, people don’t get the idea that the disability is present so they don’t actually understand that you have got Asperger’s...Misdiagnosis occurs because of a lack of awareness but the condition is present, but they don’t know the condition” (participant seven)

Participant 5 and 8 suggested that in settings where clinicians aren’t often exposed to AS, the likelihood of considering a diagnosis of AS is poor. Participant 5 explained that in the hospital setting she works in, AS is not often seen and led to her thinking that perhaps she should recheck previously made CD diagnoses in case the clinicians overlooked the possibility of AS. However, participant 5 emphasized that although misdiagnosis is likely to occur in certain settings, the possibility of misdiagnosing AS as CD is unlikely if clinicians know each disorder and they are aware as to the characteristic symptoms.

In contrast to the other seven participants, participant 4 disagreed with the possibility of a misdiagnosis, arguing that in the clinical setting if one has seen a child with AS and a child with CD, that it is unlikely that one would confuse the two.

CHAPTER 5: DISCUSSION, LIMITATIONS AND RECOMMENDATIONS

5.1 DISCUSSION

The aim of this research was to investigate psychodynamically orientated Psychologists and Psychiatrists opinions on the possibility of the dual diagnosis of AS and CD in children by considering how these clinicians conceptualise each disorder in terms of attachment theory (Bowlby) and mentalisation (Fonagy). A further aim was to investigate whether the clinicians believe an overlap can or cannot exist diagnostically and/or theoretically between these disorders. The research aimed to explore how these clinicians justified their opinions with regard to the possibility of dual diagnosis and to explore the clinicians' opinions with regards to the likelihood of misdiagnosing AS as CD.

The results showed that there were mixed opinions with regards to the possibility of dual diagnosing AS and CD in children. However, one needs to understand how these clinicians conceptualise each disorder beforehand.

5.1.1 Conceptualising AS and CD in relation to attachment and mentalisation

Attachment theory is one of the most influential theories in relation to children's social and emotional development and additionally provides one of the most useful frameworks for understanding risk and protective factors in development (Bowlby, 1973). Research has shown that children who are securely attached have a significantly better ability to understand emotion, suggesting that the feelings experienced in the dyadic relationship contribute to the development of early empathy (Fonagy et al., 2007) or emotional empathy. Furthermore, the attachment relationship plays a fundamental role in brain development with regards to affect regulation, mentalisation capabilities, and the ability to empathise with others (Fonagy et al., 2007).

With regards to AS, the results indicate that clinicians generally do not conceptualise AS in relation to attachment theory as they tend to be influenced by the neurodevelopmental understanding of the disorder. However, there was consensus with regards to their

understanding that these children have the capacity to attach securely although they may do so in a different way in comparison to normally developing children. Clinicians understand that children with AS manifest attachment behaviours but that the attachment behaviours are of a different quality, accounting for this difference in behaviour as being related to biological aspects of the disorder. Furthermore, the clinicians emphasized that these children tend to become distressed when their caregiver leaves, suggesting that these children show preference for attachment figures. The clinicians' opinions support the literature reviewed with regards to Baron-Cohen's suggestion that children with AS are able to attach but do so differently due to specific social deficits that are characteristic of the disorder (Baron-Cohen, 1989).

This model predicts that children with AS are capable of attaching and as such will experience early biological regulation within the attachment relationship but that due to specific social deficits, the later development of an internal working model is somewhat compromised due to difficulties in interpreting the internal state of the other. The literature reviewed suggested that these children become aware of others' actions but are unable to understand them, not because of poor attachments but due to brain abnormalities that impair such functioning that requires one to interpret social cues for example (Rogers et al., 1993). However the model also posits that if the caregiver is available and attuned to the child, the internal working model may develop over time, allowing for a secure attachment to form, although the attachment would not be indicative of a 'normal' attachment per se (Rogers et al., 1991; 1993). As such one may posit that the clinicians are in agreement with this model as they suggested that a secure attachment is apparent in these children but due to brain abnormalities, they process the information within the dyadic relationship differently which alters their behaviour within the attachment relationship.

However, the clinicians' emphasized that children with AS are not precluded from attachment difficulties and if these children are exposed to the risk factors that contribute to impaired attachment, the likelihood of an insecure attachment increases. Furthermore, due to brain abnormalities some of the clinicians believe that these children are more

vulnerable to attachment difficulties as they are less able to respond to their caregivers, which may affect the caregiver's availability to respond to the child. The clinicians suggested that due to their brain functioning, the manner in which the child's brain processes the attachment relationship is somewhat different to other children and exposes the child to possible attachment difficulties but that if an available caregiver is present to help facilitate an attachment bond that these children generally do attach securely. However, some clinicians acknowledged that the severity of the disorder may influence the nature of the attachment which is in agreement with previous research (Naber et al., 2007). This raises the question of whether some children on the spectrum are unable to form secure attachments due to severe neurological deficits and what the outcome may be for such children.

Essentially, the clinicians pointed out that these children attach differently but nevertheless they do seem to attach and perhaps, in accordance with previous research (Rogers et al., 1993), attachment security needs to be assessed differently in these children, making room for the appreciation of the idiosyncratic behaviours manifested by these children within the attachment relationship in order to better understand their way of relating.

In relation to the clinicians' perceptions that children with AS are capable of attaching, one may hypothesize that based on attachment theory that these children would have the capacity to develop mentalisation skills, as attachment is considered to provide the building blocks from which one learns to interpret behaviour related to both the self and the other in terms of mental states (Fonagy, 2001). However, the results show that the clinicians' understand that children with AS have a decreased capacity to mentalise due to brain dysfunction, regardless of whether they are attached or not. Although some participants attributed the deficit to frontal lobe dysfunction, none were able to account for why their brain functioning is impaired, which is something yet to be identified in these children and in the literature (Hill & Frith, 2003).

Furthermore, the clinicians explained that the ability to learn how to mentalise may develop over time but the clinicians agreed that these children may never acquire a fully functioning theory of mind as they are unable to pick up on subtle interactions. This suggests that these children, despite acquisition, continue to have selective mentalising deficits, which is in accordance with the literature that suggested that children with AS are able to acquire a 'conscious ToM' although they are still lacking in intuition (Hill and Frith, 2003). The clinicians explained that these children have the desire to learn and are motivated as a result of their secure attachment and as such may acquire the ability to mentalise over time as they want to know the other and do the right thing but due to their brain functioning, they tend to mentalise differently to other children, without the apparent flexibility and intuitive understanding that comes so naturally to normally developing children.

However, the clinicians explained that these children struggle with empathy, although they have the capacity to feel for others they cannot understand or show the feeling appropriately. They understand that these children seem to have difficulties with empathy where although they have the feeling, the impairment lies in the difficulty of knowing how to respond to it. This is in accordance with the literature reviewed which illustrated that although individuals with AS have difficulties mentalising, they are still concerned about another person's feelings (Baron-Cohen & Wheelwright, 2004). As such, one may suggest from the clinicians' conceptualisation of children with AS in relation to attachment and mentalisation theory, that children with AS have acquired the ability to feel concern for another through the attachment relationship which is the dyad within which emotional empathy is said to develop but that due to brain abnormalities, the ability to mentalise is somewhat impaired. Despite attachment security, these children seem to have mentalising difficulties and although they seem to have emotional empathy they have poor cognitive empathy which is in accordance with Smith (2006) who suggested that children on the spectrum have a 'cognitive empathy deficit disorder'. As such it seems as though the clinicians were agreeing with past literature that suggests that children with AS have and share other's emotions due to secure attachments but that they lack the skills and understanding of how to express their sense of empathy due to

neurological deficits in mentalisation. In contrast though, the findings suggest that the clinicians understand CD inversely.

The clinicians conceptualise CD as developing somewhat differently in relation to concepts such as attachment and mentalisation. Previous research has shown that an impaired attachment is a risk factor for later behavioural problems in children (Phaik Ooi et al., 2006; Shaw et al., 1996). Clinicians understand that attachment theory is fundamental to their understanding of CD and consider additional risk factors within the environment as contributing to impaired attachment within these children. The clinicians view attachment security as a protective factor against CD, however risk factors such as abuse, neglect, trauma, stressors, temperament and bad parenting may impair the attachment but also contribute to differing forms of CD and as such different behavioural manifestations may arise at different times for different reasons. Essentially, the clinicians view CD on a continuum in relation to both the nature of attachment impairment, and to the symptoms that different individuals manifest with regards to severity. This is in agreement with the literature reviewed that suggested that differing factors that interact with an insecure attachment contribute to higher levels of problematic behaviours (Burgess et al., 2003) and with the diagnostic criteria set forth by the DSM-IV-TR which specifies different onsets and suggests differing etiologies (APA, 2000).

However, the clinicians emphasized that children with CD have an impaired, pathological attachment but that not all children with CD are necessarily unattached, although there is acknowledgement that children with CD show disordered attachment in a clinical manner and as such the nature of the attachment in a child with CD is generally impaired. This concurs with Holland et al., (1993) who suggested that attachment impairment is the underlying feature in CD. For example, the clinicians emphasized that some children with CD are able to form attachments with a caregiver but that the attachment is abnormal in the sense that the child cannot generalise their behaviour into later relationships, and as such one may posit that the clinicians were emphasizing that these children haven't internalised a working model that is wholly secure and as such their attachment is impaired on some level; and perhaps one may posit based on the clinicians' opinions that

differing insecure attachments will influence the development of conduct symptoms in different ways. However the clinicians' opinions are in harmony with the literature (Burgess et al., 2003; Fagot & Kavanagh, 1990; Munson et al., 2001; Shaw et al., 1996) where regardless of the attachment style, the attachment is impaired on some level within a CD child resulting in problematic behaviour, although the clinicians did not specify as to what attachment behaviour is most commonly manifested in these children (i.e. avoidant vs. disorganised?).

However, the clinicians emphasized that in addition to the conceptualisation of CD in relation to attachment, that multiple factors may play a role in the development and understanding of CD in a child. Research has suggested that one cannot fully understand CD in children in relation to one specific risk factor; rather multiple factors need to be taken into consideration (Greenberg et al., 2001). The clinicians emphasized that the environmental context may influence the severity of the attachment impairment but that one needs to consider the role of heritability in some children with CD as research has shown that some children with CD may manifest antisocial behaviour as a result of a genetic predisposition (Blair et al., 2006). However, the clinicians do not understand such children to have inherited a 'conduct disordered' gene, rather highlighting that despite heritability, the role of the environment and possible attachment impairment are fundamental factors in understanding CD in both children with or without a genetic predisposition. This was not the view of all the clinicians, which further highlights that the role of heritability in CD is an ongoing debate.

Essentially, the clinicians' views correspond to the model put forth by Greenberg, Speltz and DeKlyen (1993) that emphasizes the role and quality of the parent-child relationship as being one of the major factors in the development and persistence of CD symptoms in children. It seems as though the clinicians place immense value on the role of attachment and the parent-child relationship in the development and understanding of CD, conceptualising the attachment relationship as somewhat impaired in these children and as such one questions whether the clinicians conceptualise these children as being

capable of developing a ToM if they do not have the adequate building blocks from which to do so.

In line with the literature, there were contradicting views amongst the clinicians with regards to whether children with CD are able to mentalise. A number of the clinicians understand that children with CD have the capacity to mentalise and understand that people are separate from them with their own feelings but they believe children with CD choose to disregard that understanding as their own needs take precedence over others. The clinicians account for this lack of concern as being related to attachment impairment as the child has not had the experience of a caring relationship from which they learn to re-enact the care in other relationships later on. Essentially, they understand that a child with CD has not had their feelings taken into consideration within the parent-child relationship and as such they do not learn to take another's feelings into consideration but have had to learn to understand the other in order to force the meeting of their needs, signifying that the clinicians were possibly suggesting that children with CD have a distorted ToM. Children with an insecure attachment, more specifically disorganised infants, are able readers of the other's mind or mental state, but they seem to be poor readers of their own mental states and due to their insecure attachment, the child does not learn how to self-reflect (Fonagy et al., 2000). Furthermore, the clinicians explained that these children have little desire to please the other unless it is to meet their own needs, where the clinicians' opinions rested on the notion that these children are unable to make an emotional connection with the other and therefore they are unable to make their ability to mentalise emotionally meaningful.

Previous research has shown that children with CD are able to pass ToM tasks mostly related to antisocial behaviour highlighting that these children are able to understand other's emotions but do not share them (Happe & Frith, 1996) and that perhaps these children are able to mentalise in order to meet their own needs, rather than using mentalising skills to facilitate the development of relationships and as such one wonders whether this is then the ability to fully mentalize; selectively mentalize; or perhaps the ability is somewhat distorted for their own needs. Previous research is aligned with the

clinicians' opinions with regards to the ability to mentalise for instrumental use and as such that their mentalisation abilities are intact but their empathic abilities are lacking, demonstrating that these clinicians also view mentalisation abilities as dissociated from empathic feeling (Blair et al., 1996) and that children with CD's ability to mentalise is somewhat distorted (Happé & Frith, 1996).

The clinicians understand that these children are able to understand that others are separate and can mentalise to get their needs met, hence their ability to manipulate; but do not know how to respond to that understanding of others being separate as they have an impairment in their ability for empathy. Essentially, the clinicians highlighted that these children are able to mentalise as they can mimic empathy when they need to and as such they are able to read another's mind in order to understand how they will react but that these children do not emotionally connect to others due to impaired attachment and thus cannot truly empathise as the problem lies with sympathy. As such one may hypothesize that the clinicians are suggesting that a child with CD's cognitive empathy is developed to an extent but their emotional empathy is not. This is in line with literature reviewed which suggested that children with CD have an 'emotional empathy deficit disorder' where they are able to cognitively empathise (i.e. mentalise) to an extent but that they have decreased levels of emotional empathy and thus cannot vicariously share in emotions with another (Smith, 2006), however in the literature, this description was attributed to an understanding of psychopathic behaviour which leaves one questioning whether children with less severe conduct disordered behaviour may show less distortions in ToM and the ability to empathise.

In contrast, some clinicians conceptualise that children with CD have an impaired ToM due to attachment difficulties and that they do not have the capacity to think of and feel for others, thus highlighting that both their cognitive and emotional empathic abilities are damaged which is in line with some research showing that children with CD have impaired ToM abilities (Sharp, 2008). However, all the clinicians understand that these children are able to manipulate others to meet their own needs and as such one may hypothesize that these children are able to mentalise to a point further enhancing the likelihood of a

distorted rather than an impaired ToM. In relation to the literature reviewed, one may posit that the discrepancy in the clinicians understanding of the conceptualisation of CD in relation to mentalisation theory may be related to the possibility that the clinicians' are referring to different severities in CD where children who have a severely impaired attachment are more likely to disregard others rights more than those who are less impaired.

Perhaps, in line with Baron-Cohen and Wheelwright (2004), the true ability to mentalise is based on the true ability to empathise and as such the ability for both emotional and cognitive empathy is necessary to have a fully functioning ToM. As such one may hypothesize that these children, either with CD or AS, have an impairment in the ability to mentalise as to fully understand another's feelings is comprised of both vicarious understanding and the ability to reflect on the others internal state whilst putting one's own perspective aside. Therefore the findings suggest that the clinicians understand that children with AS are understood to have an impairment in ToM and thus cognitive empathy and it seems that the clinicians understanding with regards to ToM in CD is that these children are impaired in the ability to respond to the other or take the other into consideration and as such have a distortion in some aspect of their ability to mentalise as their ability to empathise emotionally is impaired.

However, some of the clinicians hadn't thought of CD in relation to mentalisation, rather considering it a fundamental concept in relation to AS. In a similar regard, all of the clinicians stated that they generally do not conceptualise AS in relation to attachment theory but see it as a fundamental concept in which to better understand CD. Regardless, the clinicians were able to provide their opinion on conceptualising each disorder in relation to the theoretical concepts and acknowledged during the interviews that perhaps as they haven't thought of such concepts in relation to each disorder; it may be something to consider when trying to understand such children.

The manners in which the clinicians conceptualise each disorder in relation to attachment and mentalisation theory are somewhat similar, despite slight contradicting views. The

clinicians' understandings place CD and AS on opposite ends where children with CD are primarily impaired in attachment security and that children with AS are primarily impaired in mentalisation abilities, and as such both seem to be lacking in an aspect of true empathy. As such, the discussion will now turn to the clinicians' understanding of theoretical and diagnostic similarities between AS and CD and whether they believe a dual diagnosis is possible or not.

5.1.2 The debate of whether dual diagnosis of AS and CD is possible

Although the clinicians acknowledged several similarities between the disorders with regards to diagnostic symptoms, the clinicians emphasized that the similarities are superficial in nature as the underlying mechanisms for the behaviour are different. The clinicians highlighted that although similarities exist with regards to empathic dysfunction; possible aggression; lack of reciprocity; impaired social development; egocentric ways of relating; and a disregard for social rules; that the motivation, intention and reason for such behaviours differ dramatically between the two disorders. They suggest that there are common behaviours that may manifest and as such the symptoms may seem to overlap, but the disorders are unequivocally different and cannot be considered as part of a single construct, agreeing with recent research that found that the two disorders overlap but cannot be considered to be the same disorder (Rogers et al., 2006).

In highlighting similarities between the disorders, the clinicians highlighted that due to the superficial nature of these similarities, the possibility of misdiagnosing AS as CD is likely, which agrees with past literature that emphasizes that due to externalizing symptoms and behavioural problems that seem similar, misdiagnosis occurs (Green et al., 2000). Due to lack of awareness, rather than diagnostic confusion, clinicians who are not aware as to the characteristic symptoms associated with each disorder may make the mistake of confusing the two disorders if they do not consider the underlying mechanisms and motivation for the behaviour, however if the clinician is familiar with both disorders, the clinicians emphasized that the likelihood of misdiagnosis is low. Essentially, lack of exposure to such disorders may create an oversight in diagnosis.

In comparing the disorders as separate constructs, both theoretically and diagnostically, the clinicians emphasized that the two disorders can be mistaken to be similar constructs but that the symptoms overlap superficially and cannot be equated due to different intentions and underlying mechanisms. Furthermore, with regards to mentalisation, clinicians only liken the two as similar as there are apparent deficits but argue that the reasons for impairment in both empathy and mentalisation are apparent for different reasons, where CD deficits are due to impaired attachment and deficits in AS are due to brain dysfunction. For example, the child with AS may look similar to a child with CD but the child with AS doesn't understand what they are doing is wrong where as a child with CD does, but doesn't care and as such one may hypothesize that the clinicians were suggesting the deficits are different as children with AS may manifest behavioural difficulties as a result of mentalisation impairment, whereas children with CD behave in such a manner as a result of attachment impairment. The clinicians emphasized that CD and AS cannot be the same construct as AS is a neurodevelopmental disorder and symptoms arise as a result of the characteristic deficits that are a part of the disorder where as CD is a disorder that arises as a result of factors within one's environment. Thus one is innate where as the other is acquired. However, recent research indicated that conduct disordered behaviour that is present in an individual on the spectrum cannot be explained by severity of the PDD or to core deficits in mentalisation as the frequency of conduct behaviour would increase in children with AS (Rogers et al., 2006) and as such leaves one questioning how or why some children manifest such behaviours and others do not.

Thus the clinicians are emphasizing that the disorders are not similar in etiology or manifestation and thus are not a single construct. However the question that is raised with regards to these findings is that if one was to have a child with a diagnosis of AS in an environment that consists of risk factors that would enhance the likelihood of an additional disorder, what the possibility for a dual diagnosis may be or what the outcome would be for the child with AS?

The findings suggest that there are differing views with regards to the possibility of dual diagnosing AS and CD in children and as such highlights the early nature of this debate. Four of the clinicians agreed with such a possibility, justifying their opinion by explaining that children with AS are not precluded from developing co-morbid pathology. The clinicians explained that if a child with AS is exposed to additional risk factors so often described as a part of the development and persistence of symptoms seen in CD, the likelihood is that the child with AS may too develop additional behavioural problems. The clinicians emphasized that children with AS, if exposed to an environment that is not conducive to the development of a secure attachment in addition to possible risk factors such as neglect, abuse, dysfunctional families or bad parenting, a child with AS may develop symptoms that may warrant a dual diagnosis of CD. As such the clinicians explained that if a child with AS is dually diagnosed with CD, that the origin of the CD would be similar to the development of CD proper in other children, that being the presence of an impaired attachment and environmental risk factors.

Furthermore, the clinicians emphasized that although a dual diagnosis is possible, that the disorders would not be part of a single construct as they are mutually exclusive disorders that can co-occur in the same individual but that the disorders would occur as a result of differing etiologies. Essentially, the clinicians are suggesting that although co-morbidity is possible, that AS would arise as a neurodevelopmental disorder and that CD would arise in a child with AS if the child's attachment was severely impaired, and as such the development of the two disorders in one child would follow different etiological paths. Furthermore, the clinicians understand that CD would not be due to the characteristic difficulties associated with AS and would thus arise as a result of additional factors such as impaired attachment which is line with the limited research in the field that suggested that antisocial tendencies in a child on the spectrum would not arise as a result of the core deficits present in AS (Rogers et al., 2006). This accounts for the question as to why some children with AS manifest behavioural difficulties however, the clinicians' suggested that one cannot predict that a child with AS who has an attachment impairment will subsequently develop CD, rather CD may be one of the many behavioural outcomes in such a child. Thus one may hypothesize that a concept such as attachment may be

adequate in explaining the development of behavioural difficulties in a child, but that it may not be the only influencing factor in a dual diagnosis.

Thus the findings indicate that some clinicians suggest that the possibility of the dual diagnosis of AS and CD in children may arise if environmental factors and/or an impaired attachment are added to the already present neurodevelopmental deficits present in a child with AS, further impairing the child's capacity for understanding. The clinicians explained that such a child is difficult to control as the child would have not only a disrupted attachment but impaired mentalisation abilities too and as such would not have the capacity for either emotional or cognitive empathy. As a child with a diagnosis of AS is generally understood by clinicians as having the capacity for a secure attachment and thus the development of early emotional empathy and the desire to please, if CD was dually diagnosed, it was suggested that the development of early empathy would be diminished and the child would be lacking in the motivation to do the right thing, thus making management and intervention with such children that much harder and less successful.

Succinctly, the clinicians conceptualise a dual diagnosis as possibly related to attachment impairment, resulting in an impairment in both the child's ability for emotional empathy in addition to deficits in cognitive empathy/ToM/mentalisation which would then be further impaired. Neurodevelopmental deficits that are already present that contribute to mentalisation difficulties in a child with AS coupled with impaired attachment and thus deficits in emotional empathy results in a child that has not experienced a relationship within which concern for the other or the desire to please or learn has developed, resulting in a child with no motivation. Thus, if the attachment relationship of a child with AS is disrupted or if the child is exposed to the same risk factors associated with the cause of CD then a child with AS may develop similar behavioural difficulties.

As such one questions whether such a child would have the capacity to engage in similar behaviours of a child with CD proper especially as children with AS have neurodevelopmental deficits that contribute to mentalisation difficulties that are more

impaired than that of children with a mutually exclusive diagnosis of CD. Children with CD have been understood to be able to mentalise to a point so as to get their needs met and if a child with a dual diagnosis of CD and AS has already present deficits in mentalisation due to the characteristic difficulties associated with AS, would this child be able to read the mind of the other to meet their own needs? As such one questions whether a child with a dual diagnosis of AS and CD would manifest conduct behaviours that are qualitatively different to a child with CD proper. This is not clear in the findings and future research would need to try accounting for whether children with a dual diagnosis of CD and AS have the capacity to engage in behaviour that is similar to children with CD proper, bearing in mind the already present neurodevelopmental difficulties.

In contrast, the remaining four clinicians believe that a child with AS does not have the biological capacity to engage in behaviour that would be considered conduct disordered as they would not have the ability to understand the other in the same way that children with CD do. Four of the clinicians do not believe that a dual diagnosis of CD and AS is possible as the disorders are mutually exclusive with different etiologies and that any overlap highlights only superficial similarities between the disorders. In their experience, the behavioural difficulties that may be considered conduct disordered would arise as a part of AS and not as a result of a separate diagnosis of CD, and as such they believe AS would be the cause for the behaviour, suggesting that aggressive behaviours arise as a result of the characteristics deficits in AS which is in line with some previous research done on AS and CD (Haskins & Silva, 2006).

However, this again highlights the question of why some children with AS do not develop additional behavioural difficulties if behavioural difficulties are understood to be characteristically related to AS. The clinicians did not justify their opinions in relation to theoretical concepts such as attachment and mentalisation, rather some of the clinicians, who were against such a possibility, highlighted that diagnostic training forbids such a diagnosis being made and despite some theoretical overlaps between mentalisation

deficits, the deficits arise for different reasons that would preclude such a diagnosis from occurring.

In making sense of the clinicians' opinions against such a possibility, perhaps they were saying that if difficulties arise in a child with AS, that the reasons for the difficulties would be invariably different to difficulties that arise in children with CD which is in accordance with previous research that suggested that aggressive behaviour in AS occurs for different reasons in comparison to CD (Kohn et al., 1998). The clinicians who do not believe that a child could receive a dual diagnosis highlighted an important aspect to think about in children with AS, that being that these children do not have the biological capacity or 'wiring' to engage in behaviour that would be considered similar to behaviour in children with CD, possibly suggesting that if a child with AS engaged in aggressive or violent behaviour, the behaviour may be qualitatively different to other children with CD proper. Therefore if a dual diagnosis is possible, in the same way that attachment classifications need to be 'altered' to consider the characteristic deficits and idiosyncratic expression of children with AS to understand their attachment behaviour (Rogers et al., 1993), perhaps the classification or diagnosis of CD is operationalised too narrowly to fully encapsulate the profound social, emotional and perhaps behavioural impairments that may manifest in these children and too needs to be adjusted to fully comprehend and account for the behavioural difficulties that may be present in some children with AS.

It is interesting to consider that the clinicians who were mostly in agreement with the possibility of dual diagnosis were clinical psychologists where as the professionals who were against such a possibility were mostly psychiatrists. While this is not statistically significant, one may account for this discrepancy in opinions by considering that the psychiatrists adhere to diagnostic systems more strictly which is characteristic of their training where as the psychologists drew more on psychodynamic understanding rather than diagnostic understanding to justify their opinions. As such it appears that the differing opinions have resulted due to differing diagnostic and theoretical understandings. Furthermore, the clinicians who disagreed with such a diagnosis disclosed that in their experience they had not encountered such a possibility where as

three of the clinicians who were in agreement with the possibility of dual diagnosis had treated such children before and are currently working predominantly in hospital settings raising many questions such as the influence of experience and contextual settings; adherence to training and theoretical frameworks; and paradigmatic shifts; and whether such factors influence the opinions of clinicians with regards to dual diagnosing CD and AS.

Furthermore, the clinicians who were in agreement with such a possibility, emphasized that they have seen such children in clinical settings in South Africa which calls forth the importance of further understanding the possibility of such a dual diagnosis so as to help aid accurate diagnosis, intervention, treatment and management of such children.

Importantly, if such a possibility is feasible, questions are raised into the conceptualisations around these disorders, asking why some clinicians do not consider this a possibility if other clinicians have seen and tried to treat such children in their practice. Some of the clinicians had not seen such a possibility in their experience but during the interviews, the importance of this research was highlighted as some clinicians questioned whether they should rethink previous diagnoses made where they hadn't considered such a possibility before, perhaps having overlooked or misdiagnosed when a dual diagnosis may have been more feasible.

5.2 LIMITATIONS

To our knowledge, this is the first study of its type; however some limitations should be noted. Firstly, the data for the research was collected by means of a semi-structured interview conducted by the researcher. In retrospect, a structured interview may have been more beneficial if a specific set of questions were posed to each participant and may have averted the present limitation of this study, namely that due to time restraints, some pertinent questions were not asked of every participant and as such some participants provided more in-depth accounts of their experience and their opinions than other clinicians. Subsequently, the researcher needed to sift through both limited and broad answers provided by the clinicians in order to extract relevant data, which could more accurately have been obtained. In addition, some clinicians experienced the questions as

to broad and perhaps the interview schedule could have been constructed more specifically, without biasing the data obtained. However, the research interview schedule was constructed in such a manner so as to not bias the data obtained and thus allowed for broader questions so as to try obtaining a wider scope of understandings.

With regards to bias, a further limitation of this research is that the researcher worked alone in both the collection and analysis of the data obtained. Whilst every effort was taken to construct an interview schedule and analysis procedure that was free from bias through reflective examination of each process, without triangulation and a more collaborative style that occurs when more than one researcher is involved in collecting and analysing the data, inherent subjectivity may be unavoidable in both the analysis of the literature and the collection and analysis of the data obtained.

Furthermore, an additional limitation is the small sample size drawn for the purposes of this research. Whilst the sample size of eight professionals was adequate for this level of research, a more valid and reliable account of the views held by clinical professionals working with children with AS and CD in a clinical setting in South Africa, necessitates a larger sample size. Additionally, the sample was chosen by means of a non-probability sampling strategy, however this allowed for more in-depth investigation from relevant professionals within the field.

5.3 IMPLICATIONS & RECOMMENDATIONS FOR FUTURE RESEARCH

As research in relation to dual diagnosing AS and CD is relatively new in the field and little conclusive evidence is known, this research cannot do justice to the topic at hand. Much research is needed with regards to such a possibility especially as the clinicians evidenced that some children with AS are manifesting and presenting with signs of conduct disorder behaviour. This research highlights clinicians' opinions with regards to such a possibility in relation to concepts such as attachment and mentalisation and has indicated that some clinicians are working with such children and relate the possibility of dual diagnosis to impaired attachment, although additional factors may be influential. As such it seems that if a dual diagnosis was possible, research needs to focus on how to

identify and manage such children, especially as children with AS are understood to manifest behavioural difficulties somewhat differently to normally developing children, bearing in mind concepts such as attachment and mentalisation and the ramifications of impairment in this regard. However, this research has highlighted that some clinicians do not foresee such a possibility and as such future research may consider what influences clinicians opinions with regards to dual diagnosis as this research highlighted questions around differences in training and theoretical frameworks; experience and contextual settings; and paradigmatic shifts and how these factors may influence the clinicians understanding.

It was discussed that the professionals highlighted that both impaired attachment and environmental factors may contribute to the development of a dual diagnosis of CD in children with AS. Future research should consider additional risk factors and possible alternate theoretical understandings that may contribute to the development of such a dual diagnosis. By drawing on a larger sample of clinicians, the debate between whether a dual diagnosis of AS and CD is possible may be clarified further. By considering multiple contributing factors, clarity around etiology and persistence of behavioural problems may help with diagnosis, intervention and treatment in a group of seemingly vulnerable children.

Additionally, future research may pertain to broadening the focus from AS to different disorders on the autistic spectrum as the severity of the PDD may contribute to impaired attachment. As such, research may focus on the possibility of dual diagnosis in children with a more 'severe' PDD.

Furthermore, this research highlights that if a dual diagnosis is possible whether such children manifest a qualitatively different kind of CD and whether classification systems need to broaden or alter understandings to try accounting for such behavioural difficulties that are separate from characteristic behaviours seen as a result of AS itself. Perhaps future research needs to focus on if and how the behaviour may be different and whether a separate altered understanding of CD is feasible.

CHAPTER 6: CONCLUSION

The research has shown that clinicians tend to understand AS from a neurodevelopmental perspective but despite brain abnormalities that these children still have the capacity to attach, which contributes to the development of emotional empathy and thus their ability to feel and share in emotion. However, these clinicians understand that children with AS are not precluded from developing attachment difficulties especially due to innate deficits and vulnerabilities. Furthermore, due to neurodevelopmental deficits these children are understood as unable to wholly understand and respond to the other, and as such demonstrate mentalisation difficulties. In contrast, the clinicians understand that CD is fundamentally linked to attachment difficulties thus impairing their capacity for emotional empathy and the ability to feel concern for the other. Although there were contradicting views with regards to mentalisation capacity, the clinicians understand that children with CD are able to mentalize to a point in order to get their needs met and perhaps are suggesting that as they cannot empathise emotionally due to impaired attachment, that their ability to truly mentalize is distorted.

In summary, the clinicians were asked to conceptualise each disorder in relation to attachment and mentalisation theory, viewing each concept as fundamental to their understanding of the disorders, although the clinicians more often associate attachment theory with CD and mentalisation theory with AS. However, in relation to the theoretical concepts under study with regards to each disorder separately, the clinicians understood impairment inversely with regards to each disorder, where CD is related to impaired attachment and AS to impaired mentalisation. In addition, the results indicate that the clinicians understand that children with AS are able to empathise emotionally but lack the ability for cognitive empathy where as children with CD are able to empathise cognitively (to a point) but lack the ability for emotional empathy, however, it may be hypothesized that the clinicians view each disorder as lacking in an aspect of true empathy.

However, these conceptualisations raised the question about the child who lacks both emotional empathy and cognitive empathy or the child with both an impaired attachment and deficits in mentalisation. Both the literature and the clinicians' opinions with regards to the conceptualisation of each disorder provide an almost black and white understanding, although the clinicians' acknowledged that such conceptualisations are not set in stone for all children with either CD or AS. This research placed itself in the grey area of this understanding, wondering if concepts such as attachment and mentalisation could account for the limited recent research indicating that some children with AS manifest behavioural symptoms that seem antisocial and how such concepts could help clinicians account for or dispute the possibility of dual diagnosing CD in children with AS.

The debate of whether a dual diagnosis of CD in a child with AS is possible is somewhat inconclusive but this research indicates that the importance of understanding such a possibility is vital to understanding children with AS who manifest severe behavioural difficulties and violation of social norms or other's rights. The clinicians emphasized that there are only superficial diagnostic or theoretical overlaps indicating that AS and CD are not a part of a single construct, but that if a dual diagnosis was to be made, the disorders would exist together as a result of contributing risk factors such as impaired attachment and environmental risks in combination with already present neurodevelopmental deficits. The clinicians who were in agreement with such a possibility acknowledged that the two disorders are not a part of the same construct and have differing etiologies which concurs with the clinicians who disagreed with such a possibility, however the clinicians in agreement were acknowledging that children with AS are not precluded from developing additional behavioural difficulties especially if risk factors come into play that are often associated with the development and persistence of conduct disordered behaviour in other children.

However, some clinicians believe that a child with AS would not have the biological capacity to engage in conduct disordered behaviour as they wouldn't be able to understand that their behaviour may be wrong. Furthermore, some clinicians are wary of

such a possibility due to diagnostic parameters and training that precludes such diagnoses from occurring together. Essentially this research has highlighted that the possibility of dual diagnosing CD and AS in a child is understood by some clinicians to be likely if a child's attachment is impaired or if the child is exposed to an environment that would disrupt the attachment further, however that if the child with AS does not have the biological 'wiring' to engage in behaviour that children with CD manifest, whether a child with a dual diagnosis of CD and AS would manifest a qualitatively different kind of CD. However, the opinions between the different clinicians highlight that the possibility of dual diagnosing AS and CD is controversial and yet to be conclusive but that an understanding of the possibility of dual diagnosis is linked to attachment which further impacts on mentalisation abilities, resulting in a child who lacks motivation or desire to learn, making treatment that much more difficult. Much research is needed with regards to such a possibility especially as the clinicians evidenced that some children with AS are manifesting and presenting with signs of conduct disordered behaviour and if clinicians are encountering such children, further exploration is imperative in refining our understanding and knowledge with regards to such a possibility.

This research is the first study that reflects on clinicians' opinions with regards to the possibility of dual diagnosis and considers possible explanations from a theoretical understanding as to why some children with AS develop severe behavioural manifestations, which previous research has not considered before. Furthermore, it is the first study, to our knowledge, that considers the clinical opinions of professionals working with children with CD and AS and by drawing on both their opinions and experiences, what the likelihood of diagnosis may be. Essentially, this research has added to the accumulation of knowledge in a very under-researched area both within the South African and International context. Even if additional research disputes the possibility of a dual diagnosis, the theoretical and clinical depths explored in attempting to clarify the similarities and/or differences will only help to clarify and deepen our understanding of CD and AS respectively.

REFERENCE LIST:

- Abell, F., Frith, U., & Happe', F. (2000). Do triangles play tricks? Attribution of mental states to animated shapes in normal and abnormal development. *Cognitive Development, 15*, 1–16.
- Ainsworth, M.D.S., Blehar, M.C., Waters, E., & Wall, S. (1978). Patterns of attachment. Hillsdale, N.J: Lawrence Erlbaum.
- Allen, J.P., Land, D.J., Liebman, S.E., Bell, K., & Jodl, K.M. (1997). Maternal attachment organization as a predictor of mother-adolescent interactions and adolescent attachment organization. Paper presented at the biennial meeting of the Society for Research in Child Development, Washington DC.
- American Psychiatric Association (2000). *Diagnostic and Statistical Manual of Mental Disorders*, 4th revised text edition (DSM-IV-TR). Washington, DC: American Psychological Association.
- Attwood, T. (2007). *The Complete Guide to Asperger's Syndrome*. London: Jessica Kingsley Publishers.
- Babbie, E. & Mouton, J. (2005). *The Practice of Social Research*. Cape Town: Oxford University Press.
- Bailey, A., Le Couteur, A., Gottesman, I., Bolton, P., Simonoff, E., Yuzda, E., & Rutter, A. (1995). Autism as a strongly genetic disorder: evidence from a British twin study. *Psychological Medicine, 25*, 63-77.
- Banister, P., Burman, E., Parker, I., Taylor, M., & Tindall, C. (1994). *Qualitative Methods in Psychology: A Research Guide*. Buckingham: Open University Press.

- Baron-Cohen, S. (1989). Are autistic children “behaviorists”? An examination of their mental-physical and appearance-reality distinctions. *Journal of Autism and Developmental Disorders*, 19, 579-600.
- Baron-Cohen, S., Jolliffe, T., Mortimore, M., & Robertson, R. (1997). Another advanced test of Theory of Mind: evidence from very high functioning adults with Autism or Asperger syndrome. *Journal of Child Psychology and Psychiatry*. 38, 813 -822.
- Baron-Cohen, S., Leslie, A.M., & Frith, U. (1985). Does the autistic child have a “theory of mind”? *Cognition*, 21. 37-46.
- Baron-Cohen, S., O'Riordan, M., Stone, V., Jones, R., & Plaisted, K. (1999). Recognition of Faux Pas by Normally Developing Children and Children with Asperger Syndrome or High-Functioning Autism. *Journal of Autism and Developmental Disorders*, 29, 407-418
- Baron-Cohen, S. & Wheelwright, S. (2004). The empathy quotient: An investigation of adults with aspergers syndrome or high functioning autism, and normal sex differences. *Journal of Autism and Developmental Disorders*. 34, 163-175.
- Belsky, J., & Fearon, R.M.P. (2002). Infant–mother attachment security, contextual risk, and early development: A moderational analysis. *Development and Psychopathology*, 14, 293–310.
- Bennett, C.M. (1998). *Method and Practice*. Accessed on the World Wide Web from: http://www.hotkey.net.au/~carolineb/chapter_three.htm
- Bettelheim, B. (1967). *The empty fortress: infantile autism and the birth of the self*. New York: The Free Press.

- Blair, R.J.R. (1999). Psychophysiological responsiveness to the distress of others in children with autism. *Personality and Individual Differences*, 26, 477-485.
- Blair, R.J.R. (2005). Responding to the emotions of others: Dissociating forms of empathy through the study of typical and psychiatric populations. *Consciousness and Cognition*, 14, 698 – 718.
- Blair, R.J.R., Monson, J., & Frederickson, N. (2001). Moral reasoning and conduct problems in children with emotional and behavioural difficulties. *Personality and Individual Differences*, 31, 799-811.
- Blair, R.J.R., Peschardt, K.S., Budhani, S., Mitchell, D.G.V., & Pine, D.S. (2006). The development of psychopathy. *Journal of Child Psychology and Psychiatry*, 47, 262-275
- Blair, R.J.R., Sellars, C., Strickland, I., Clark, F., Williams, A.O., Smith, M., & Jones, L. (1996). Theory of mind in the psychopath. *Journal of Forensic Psychiatry*, 7, 15-25.
- Boyatzis, R.E. (1998). *Transforming Qualitative Information: Thematic Analysis and Code Development*. California: Sage Publications.
- Bowlby, J. (1973). *Attachment and Loss. Vol 2: Separation: Anxiety and anger*. New York: Basic Books.
- Bowlby, J. (1979). *The Making and Breaking of Affectional Bonds*. Tavistock: London
- Bowler, D.M. (1992) Theory of Mind in Asperger Syndrome. *Journal of Child Psychology and Psychiatry*, 33, 877-893.

- Burgess, K. B., Marshall, P. J., Rubin, K. H., & Fox, N. A. (2003). Infant attachment and temperament as predictors of subsequent externalizing problems and cardiac physiology. *Journal of Child Psychology and Psychiatry*, 44, 819–831.
- Capps, L., Sigman, M., & Mundy, P. (1994). Attachment Security in Children with Autism. *Development and Psychopathology*, 6, 249–261.
- Carlson, E. A. (1998). A prospective longitudinal study of attachment disorganization/disorientation. *Child Development*, 69, 1107–1128.
- Chen, P.S., Chen, S.J., Yang, Y.K., Yeh, T.L., Chen, C.C., & Lo, H.Y. (2003). Asperger's Disorder: A case report of repeated stealing and the collecting behaviours of an adolescent patient. *Acta Psychiatrica Scandinavica*, 107, 73 -75.
- Cohen, L. & Manion, L. (1994). *Research Methods in Education* (4th ed.). New York: Routledge.
- Cohen, D.J., Paul, R. & Volkmar, F.R. (1987). Issues in the classification of pervasive developmental disorders and associated conditions. In D.J. Cohen., A.M. Donnellan & R. Paul (Eds.), *Handbook of Autism and Pervasive Developmental Disorders*. New York: Wiley & Sons.
- Connor, M.J. (2004). Autism and Attachment. *Autism: Current Issues*, 33.
- Creswell, J.W. (2005). *Educational Research : Planning, Conducting, and evaluating Quantitative and Qualitative Research* (2nd ed). New Jersey : Pearson.
- Dawson, G. & Lewy, A. (1989). Arousal, attention, and the socio-emotional impairments of individuals with autism. In G. Dawson (Eds.), *Autism: Nature, Diagnosis, & Treatment*. New York: Guilford Press.

- Diego, M.A. & Jones, N.A. (2007). Neonatal antecedents for empathy. *In* T. Farrow & P. Woodruff (Eds.). *Empathy in Mental Illness* (pp. 145 – 167).USA: Cambridge University Press.
- Dolan, M., & Fulham, R. (2007). Empathy, antisocial behaviour and personality pathology. *In* T. Farrow & P. Woodruff (Eds.). *Empathy in Mental Illness* (pp. 33 – 48).USA: Cambridge University Press.
- Everall, I.P. & Lecouteur, A. (1990). Firesetting in an adolescent boy with Asperger's syndrome. *British Journal of Psychiatry*. 156, 430-433.
- Fonagy, P. (2001). *Attachment Theory and Psychoanalysis*. New York: Other Press.
- Fonagy, P. (2003). Towards a developmental understanding of violence. *British Journal of Psychiatry*, 183. 190-192.
- Fonagy, P., & Target, M. (2003). *Psychoanalytic Theories: Perspectives from Developmental Psychopathology*. London: Whurr Publishers Ltd
- Fonagy, P., Gergely, G., & Target, M. (2007). The parent-infant dyad and the construction of the subjective self. *Journal of Child Psychology and Psychiatry*. 48. 288-328.
- Fonagy, P., Target, M., & Gergely, G. (2000). Attachment and Borderline Personality Disorder: A theory and some evidence. *The Psychiatric Clinics of North America*, 23. 103-122.
- Frick, P.J. & Sheffield Morris, A. (2004). Temperament and developmental pathways to conduct problems. *Journal of Clinical Child and Adolescent Psychology*, 33, 54-68.

- Frith, U. (1991). [Translation of Die 'Autistischen Psychopathen' im Kindesalter]. In *Autism and Asperger Syndrome* (U. Frith, ed.), pp. 37 -92. Cambridge University Press: Cambridge
- Frith, U., & Happe', F. (1999). Theory of mind and selfconsciousness: What is it to be autistic? *Mind and Language*, 14, 1–22.
- Gadow, K.D., DeVincent, C.J., Pomeroy, J., & Azizian, A. (2004). Psychiatric symptoms in preschool children with PDD and clinic and comparison samples. *Journal of Autism and Developmental Disorders*, 34. 379-393.
- Gelhorn, H.L., Stallings, M.C., Young, S.E., Corley, R.P., Hyun Rhee, S., & Hewitt, J.K. (2005). Genetic and environmental influences on conduct disorder: symptom, domain and full-scale analyses. *Journal of Child Psychology and Psychiatry*, 46, 580-591.
- Gericke, R. (2006). Working with a child's envy in the transference. *Journal of Child and Adolescent Mental Health*, 18, 73 – 78.
- Gillberg, C. & Billstedt, E. (2000). Autism and Asperger's Syndrome: coexistence with other clinical disorders. *Acta Psychiatr Scand*, 102. 321-330.
- Green, J., Gilchrist, A., Burton, D., & Cox, A. (2000). Social and Psychiatric Functioning in Adolescents with Asperger Syndrome Compared with Conduct Disorder. *Journal of Autism and Developmental Disorders*, 30. 279-293.
- Green, J. & Goldwyn, R. (2002). Annotation: Attachment Disorganisation and psychopathology: new findings in attachment research and their potential implications for developmental psychopathology in childhood. *Journal of Child Psychology and Psychiatry*, 4. 835-846.

- Greenberg, M. T., Speltz, M. L., & DeKlyen, M. (1993). The role of attachment in the early development of disruptive behavior problems. *Development and Psychopathology*, 5, 191–213
- Greenberg, M. T., Speltz, M. L., & DeKlyen, M., & Jones, K. (2001). Correlates of clinic referral for early conduct problems: Variable- and person-oriented approaches. *Development and Psychopathology*, 13, 255–276
- Gutstein, S.E. & Whitney, T. (2002). Asperger Syndrome and the Development of Social Competence. *Focus Autism Other Dev Disabilities*. 17. 161-172.
- Happé, F. (1994). An advanced test of theory of mind: Understanding of story characters' thoughts and feelings by able autistic, mentally handicapped, and normal children and adults. *Journal of Autism and Developmental Disorders*, 24, 129-154.
- Happe, F., Ehlers, S., Fletcher, P., Frith, U., Johansson, M., Gillberg, C., Dolan, R., Frackowiak, R., & Frith, C. (1996). 'Theory of Mind' in the brain. Evidence from a PET scan study of Asperger syndrome. *NeuroReport*, 8, 197-201
- Happe, F., & Frith, U. (1996). Theory of mind and social impairment in children with conduct disorder. *British Journal of Developmental Psychology*. 14, 385 -398.
- Haskins, B.G & Silva, J.A. (2006). Asperger's disorder and criminal behaviour: Forensic-psychiatric considerations. *The Journal of the American Academy of Psychiatry and the Law*, 34, 374-384.
- Heavey, L., Phillips, W., Baron-Cohen, S., & Rutter, M. (2000). The awkward moment test: A naturalistic measure of social understanding in autism. *Journal of Autism and Developmental Disorders*, 30, 225–236.

- Hill, E.L. & Frith, U. (2003). Understanding autism: insights from mind and brain. *Philosophical Transactions: Biological Sciences*, 358, 281-289.
- Holland, R., Moretti, M.M., Verlaan, V., & Peterson, S. (1993). Attachment and conduct disorder: the response program. *Canadian Journal of Psychiatry*, 38, 420-431.
- Hughes, D.A. (1999). Adopting children with attachment problems. *Child Welfare*, 78, 541-560.
- Hughes, C., Dunn, J., & White, A. (1998). Trick or Treat? Uneven understanding of mind and emotion and executive dysfunction in “hard to manage” preschoolers. *Journal of Child Psychology and Psychiatry*, 39, 981-984.
- Kaland, N., Moller-Nielsen, A., Callesen, K., Lykke Mortensen, E., Gottlieb, D., & Smith, L. (2002). A new ‘advanced’ test of theory of mind: evidence from children and adolescents with Asperger syndrome. *Journal of Child Psychology and Psychiatry*, 43, 517-528.
- Kazdin, A.E. (1995). *Conduct disorders in Childhood and Adolescence* (2nd ed). California: Sage.
- Keenan, K., Shaw, D., Delliquadri, E., Giovannelli, J., & Walsh, B. (1998). Evidence for the continuity of early problem behaviours: Application of a developmental model. *Journal of Abnormal Child Psychology*, 26, 441-452.
- Keiley, M.K. (2002). Attachment and affect regulation: A framework for family treatment of conduct disorder. *Family Process*, 41, 477-493.
- Keller, T.E., Spieker, S.J., & Gilchrist, L. (2005). Patterns of risk and trajectories of preschool problem behaviours: A person-oriented analysis of attachment in context. *Development and Psychopathology*, 17, 349-384.

- Kohn, Y., Fahum, T., Ratzoni, G., & Apter, A. (1998). Aggression and sexual offense in Asperger's syndrome. *The Israel Journal of Psychiatry and Related Sciences*, 35, 293-300
- Krol, N., Morton, J., & De Bruyn, E. (2004). Theories of conduct disorder: a causal modeling analysis. *Journal of Child Psychology and Psychiatry*, 45, 727-742.
- Lyons-Ruth, K. (1996). Attachment relationships among children with aggressive behavior problems: The role of disorganised early attachment patterns. *Journal of Consulting and Clinical Psychology*, 64, 64-73.
- Lyons-Ruth, K., Alpern, L., & Repacholi, B. (1993). Disorganised infant attachment classification & maternal psychosocial problems as predictors of hostile-aggressive behaviour in the preschool classroom. *Child Development*, 64, 572-585.
- Macintosh, K.E. & Dissanayake, C. (2004). Annotation: the similarities and differences between autistic disorder and Asperger's disorder: a review of the empirical evidence. *Journal of Child Psychology and Psychiatry*, 45, 421-434.
- Maestrini, E., Paul, A., Monaco, A.P., & Bailey, A. (2000). Identifying autism susceptibility genes. *Neuron*, 28, 19-24.
- Main, M., & Solomon, J. (1986). Discovery of an insecure-disorganised/disoriented attachment pattern. In T.B. Brazelton & M.W. Yogman (Eds), *Affective development in infancy* (pp. 95-124). Norwood, NJ: Ablex.
- Mawson, D., Grounds, A., & Tantam, D. (1985). Violence and Asperger's syndrome: a case study. *British Journal of Psychiatry*, 147, 566-569.

- Mayes, T.A. (2003). Persons with autism and criminal justice: core concepts and leading cases. *Journal of Positive Behaviour Interventions*, 5, 92-100.
- Munson, J. A., McMahon, R. J., & Spieker, S. J. (2001). Structure and variability in the developmental trajectory of children's externalizing problems: Impact of infant attachment, maternal depressive symptomatology, and child sex. *Development and Psychopathology*, 13, 277-296.
- Naber, F.B.A., Swinkels, S.H.N., Buitelaar, J.K., Bakersmans-Kranenburg, M.J., IJzendoorn, M.H., Dietz, C., van Daalen, E., & van Engeland, H. (2007). Attachment in toddlers with autism and other developmental disorders. *Journal of Autism and Developmental Disorders*, 37, 1123-1138.
- Nakash-Eisikovits, O., Dutra, L., & Westen, D. (2002). Relationship between attachment patterns and personality pathology in adolescents. *Journal of the American Academy of Child and Adolescent Psychiatry*, 41, 1111-1121.
- Neuman, W.L. (1994). *Social Research Methods: Quantitative and Qualitative Approaches*. (2nd Ed). Boston: Allyn & Bacon.
- Ontai, L.L., & Thompson, R.A. (2002). Patterns of attachment and maternal discourse effects on children's emotion understanding from 3 to 5 years of age. *Social Development*, 11, 433-450.
- Osterling, J., Dawson, G., & McPartland, J. (2001). Autism. In C.E. Walker & M.C. Roberts. (Eds.) *Handbook of Clinical Child Psychology* (3rd ed). (pp 432-452). Canada: John Wiley & Sons, Inc.
- Ozonoff, S, Pennington, B, & Rogers, S, (1991) Executive function deficits in high functioning autistic children: relationship to theory of mind. *Journal of Child Psychology and Psychiatry*, 32, 1081-1106.

- Palermo, M. T. (2004). Pervasive developmental disorders, psychiatric commorbidities, and the law. *International Journal of Offender Therapy and Comparative Criminology*, 48, 40–48.
- Penzerro, R.M. & Lein, L. (1995). Burning their bridges: disordered attachment and foster care discharge. *Child Welfare*, 74.
- Phaik Ooi, Y., Ang, R.P., Fung, D.S.S., Wong, G., & Cai, Y. (2006). The Impact of Parent–Child Attachment on Aggression, Social Stress and Self-Esteem. *School Psychology International*, 27, 552-566.
- Pipp, S., Easterbrooks, M.A., & Harmon, R.J. (1992). The relation between attachment and knowledge of self and mother in one to three-year-old infants. *Child Development*, 63, 738-750.
- Raikes, H.A., & Thompson, R.A. (2006). Family emotional climate, attachment security, and young children’s emotion knowledge in a high-risk sample. *British Journal of Developmental Psychology*, 24, 89–104.
- Richell, R.A., Mitchell, D.G.V., Newman, C., Leonard, A., Baron-Cohen, S., & Blair, R.J.R. (2003). Theory of Mind and psychopathy: can psychopathic individuals read the ‘language of the eyes?’ *Neuropsychologica*. 41, 523-526.
- Rogers, S.J., Ozonoff, S., & Maslin-Cole, C. (1991). A Comparative Study of Attachment behaviour in young children with Autism or Other Psychiatric Disorders. *Journal of the American Academy of Child and Adolescent Psychiatry*, 30, 483 – 488.
- Rogers, S.J., Ozonoff, S., & Maslin-Cole, C. (1993). Developmental aspects of attachment behaviour in young children with pervasive developmental disorders. *Journal of the American Academy of Child and Adolescent Psychiatry*, 32, 1274 - 1282.

- Rogers, J., Viding, E., Blair, R.J., Frith, U., & Happe, F. (2006). Autism spectrum disorder and psychopathy: shared cognitive underpinnings or double hit? *Psychological Medicine*, 36, 1789-1798.
- Rutgers, A.H., Bakermans-Kranenburg, M.J., van IJzendoorn, M.H., & van Berckelaer-Onnes, I.A. (2004). Autism and attachment: a meta-analytic review. *Journal of Child Psychology and Psychiatry*, 45, 1123-1134.
- Rutherford, MD., Baron-Cohen, S., & Wheelwright, S. (2002). Reading the mind in the voice: a study with normal adults and adults with Asperger syndrome and high functioning autism. *Journal of Autism and Developmental Disorders*, 32, 189-194.
- Sadock, B.J., & Sadock, V.A. (2003). *Kaplan & Sadock's Synopsis of Psychiatry* (9th ed.) USA: Lippincott Williams & Wilkins.
- Schore, A. (2003). *Affect Regulation and the Repair of the self*. New York: Norton.
- Scragg, P. & Shah, A. (1994). Prevalence of Asperger's syndrome in a secure hospital. *British Journal of Psychiatry*. 165, 679-682.
- Senior, L. (2002). Attachment Theory. In D. Hook, J. Watts & K. Cockcroft (Eds.), *Developmental Psychology* (pp. 247 – 246). Cape Town : UCT Press.
- Sharp, C. (2008). Theory of Mind and conduct problems in children: Deficits in reading the “emotions of the eyes”. *Cognition & Emotion*, 22 (6), 1149-1158
- Shaw, D. S., Owens, E. B., Vondra, J. I., Keenan, K., & Winslow, E. B. (1996). Early risk factors and pathways in the development of early disruptive behavior problems. *Development and Psychopathology*, 8, 679–700.

- Sigman, M. & Mundy, P. (1989). Social attachments in autistic children. *Journal of the American Academy of Child and Adolescent Psychiatry*, 28, 74-81.
- Silvermann, D. (2000). *Doing Qualitative Research: A Practical Handbook*. London: SAGE Publications.
- Smith, A. (2006). Cognitive empathy and emotional empathy in human behaviour and evolution. *The Psychological Record*, 56, 3-21.
- Smyke, A.T., Dumitrescu, A., & Zeanah, C.H. (2002). Attachment disturbances in young children: the continuum of caretaking casualty. *Journal of the American Academy of Child and Adolescent Psychiatry*, 41, 972-982
- Squires, N. (2008, May). Autistic teen guilty of global cyber-crime. *The Citizen*.
- Sutton, J., Smith, P.K., & Swettenham, J. (1999). Bullying and the 'Theory of Mind': A critique of the 'social skills deficit' view of anti-social behaviour. *Social Development*, 8, 117-127.
- Thompson, R.A. (2000). The legacy of early attachments. *Child Development*, 71, 145-152.
- Tonge, B.J., Brereton, A.V., Gray, K.M., & Einfeld, S.L. (1999). Behavioural and emotional disturbance in high-functioning autism and Asperger syndrome. *Autism*, 3, 117-130
- Willemsen-Swinkels, S. H. N., Bakermans-Kranenburg, M. J., Buitelaar, J. K., van IJzendoorn, M. H., & van Engeland, H. (2000). Insecure and disorganised attachment in children with a pervasive developmental disorder: Relationship with social interaction and heart rate. *Journal of Child Psychology and Psychiatry and Allied Disciplines*, 41, 759-767.

World Health Organization. (1994). *10th Revision of the International Statistical Classification of Diseases and Related Health Problems (ICD-10)*. Geneva: Author.

Zeanah, C.H., Boris, N.W., & Larrieu, J.A. (1997). Infant development and developmental risk: A review of the past 10 years. *Journal of the American Academy of Child and Adolescent Psychiatry*, 36, 165 – 178.

APPENDIX A:

PARTICIPANT INFORMATION SHEET:



Good day,

My name is Andrea Jamieson and I am conducting research for the partial fulfillment of my Clinical Psychology Masters degree at the University of the Witwatersrand. The focus of my study is to investigate psychodynamically orientated Psychologists and Psychiatrists' opinions on the possibility of the dual diagnosis of conduct disorder (CD) and Asperger's syndrome (AS) in children. The research aims to consider how these clinicians conceptualize each disorder and whether they believe an overlap can or cannot exist. The research is primarily interested in considering how these clinicians understand each disorder in terms of attachment theory and mentalization.

I would like to invite you to participate in this study if you are a psychodynamically orientated clinical Professional, either in Psychiatry or Clinical Psychology with at least five years of professional experience in working with children with Asperger's syndrome and conduct disorder.

If you are interested in participating in this study you will be required to participate in an interview with me for approximately one hour at a time and place that is convenient for you. Participation is voluntary, and no person will be disadvantaged or advantaged in any way for choosing to participate or not in the study. All of your responses will be kept confidential, and no identifying information will be included in the research report. You will not be required to provide any information or personal details that may identify who you are. The interviews will be audio taped so as to collect data that can accurately portray your responses and so that direct quotes can be used in the research report to support the findings. To assure you, even though audio tapes and quotes will be used, confidentiality will still be protected. The interview tapes will not be heard by any other person but by me at any time. Interview transcripts will only be processed by me and my supervisor, who will, in addition, maintain confidentiality. In addition, the audio tapes will be kept in the researcher's care in a safe location with restricted access and will be destroyed once the research has been examined. You may refuse to answer any questions you would prefer not to and you may choose to withdraw from the study at any point. Once the research has been completed and if you are interested in the results, feedback can be provided at a time and place that is convenient for you.

If you choose to participate in this study please fill in your details on the forms below and sign the attached forms that are necessary for participation and for the interviews to be taped. The attached forms state that you agree to participate voluntarily in the study and that you understand the nature and purpose of the research intended. In addition, if you agree to participate and thus agree to be audio taped, please sign the attached consent form that states that you give permission to be recorded.

It would be greatly appreciated if you decide to participate and assist me in this research. There are no direct benefits for participating in this research but this research may help refine current understandings of these two disorders. To assure you there are no known risks associated with participating in this study.

If you have any concerns or questions please feel free to either contact me telephonically on 082 572 8040 or via email jamiesona@gmail.com or my supervisor, Ms. Renate Gericke on (011) 717 4503 at the University of the Witwatersrand, Psychology Department or via email renate.gericke@wits.ac.za

Kind regards

Andrea Jamieson

APPENDIX B:

INFORMED CONSENT FORM:



I, _____, provide consent to be interviewed by Andrea Jamieson for her conceptual investigation of psychodynamically orientated psychologists and psychiatrists' opinions of the possibility of making a dual diagnosis of conduct disorder and Asperger's syndrome in children in relation to attachment theory and the theory of mentalization, and I understand:

- the nature and purpose of this study
- participation in this interview is voluntary
- that I may refuse to answer any questions I would prefer not to
- I may withdraw from the study at anytime
- That no negative consequences will arise if I decide to withdraw or if I decline participation
- No identifying information will be included in the research report, and my responses will remain confidential
- Direct quotes may be used, but in addition, that my identity will be protected as no identifying information will be used
- That there are no direct benefits to participating in this study
- That there are no known risks associated with this study

Signed: _____

Date: _____

APPENDIX C:

AUDIO TAPE CONSENT FORM:



I, _____, consent to my interview being tape recorded with Andrea Jamieson for her conceptual investigation of psychodynamically orientated psychologists and psychiatrists' opinions of the possibility of making a dual diagnosis of conduct disorder and Asperger's syndrome in children in relation to attachment theory and mentalization, and I understand that:

- Access to the tapes will be restricted to the researcher, Andrea Jamieson.
- The tapes and transcripts will only be processed and transcribed by the researcher, Andrea Jamieson and her supervisor, Renate Gericke.
- No identifying information will be included in the transcripts or the research report
- Direct quotes may be used, but in addition, that my identity will be protected as no identifying information will be used
- The tapes will be stored safely in a location with restricted access
- All tape recordings will be destroyed after the research has been examined

Signed: _____

Date: _____

APPENDIX D:

TENTATIVE INTERVIEW SCHEDULE:

This is a semi-structured interview schedule. Selected questions were asked based on the responses from the participants.

General:

What experience do you have in the field of conduct disorder (CD) and Asperger's syndrome (AS)?

What kind of clinical setting do you work in?

When you refer to a child, what 'age group' are you referring to and why?

What theoretical explanations do you draw on to understand children with AS and CD?

How accustomed are you to drawing on attachment theory and the theory of mentalization?

- In relation to children with AS and CD?
- If alternate theory:
 - o Can you elaborate on this understanding?
 - o How does this theory help you understand these children?

Asperger's Syndrome:

How do you understand AS in terms of attachment theory?

How do AS children evidence attachment when, and if it is present?

- In your experience when, if so, does attachment develop in these children?
- Do these children seem to attach to people?

How do you understand AS in terms of mentalization?

How do AS children evidence the ability to mentalize, when and if this ability is present?

- If clinicians feel these children don't mentalize:
 - o How do you understand their impoverished ability to mentalize theoretically speaking?
- If clinicians feel these children can mentalize:
 - o How do you understand their ability to mentalize, theoretically speaking?

Conduct Disorder:

How do you understand CD in terms of attachment theory?

How do CD children evidence attachment when, and if it is present?

- In your experience when, if so, does attachment develop in these children?
- Do these children seem to attach to people?

How do you understand CD in terms of mentalization?

How do CD children evidence the ability to mentalize, when and if this ability is present?

- If clinicians feel these children don't mentalize:
 - o How do you understand their impoverished ability to mentalize, theoretically speaking?
- If clinicians feel these children can mentalize:
 - o How do you understand their ability to mentalize, theoretically speaking?
- In relation to attachment theory and mentalization, how do you understand a CD child's ability to manipulate?

Similarities and Differences:

In your opinion, are there any similarities between AS and CD?

What, in your opinion, are the conceptual similarities between these two disorders?

- In relation to attachment?
- In relation to mentalization abilities?

What, in your opinion, are the diagnostic similarities between these two disorders?

In your opinion, are there any differences between AS and CD?

What, in your opinion, are the conceptual differences between these two disorders?

- In relation to attachment?
- In relation to mentalization abilities?

What, in your opinion, are the diagnostic differences between these two disorders?

Dual Diagnosis:

In your opinion are AS and CD mutually exclusive disorders or can they be co-morbid?

- Why?
- In your opinion, when behavioural difficulties are present in individuals with AS, would one consider such symptoms as characteristic of the disorder or possibly existing as a result of comorbid pathology? Please explain.

Given your understanding and experience, is a dual diagnosis of AS and CD possible?

- Theoretically, how would you justify your opinion?
 - o In relation to attachment?
 - o In relation to mentalization?
- If dual diagnosis is possible:
 - o Does an overlap occur diagnostically and/or theoretically? How?
 - o How would this child evidence attachment when, and if present?

- How would this child evidence mentalization abilities when, and if present?
- What contributes to a dual diagnosis in some individuals?
- Is a dual diagnosis adequately explained using theoretical concepts such as attachment theory and the theory of mentalization?
 - What else could account for such a diagnosis?
 - Any influencing factors?

What is the possibility of misdiagnosing AS as CD?

- If so, why do you think this happens?

Can you elaborate on whether or not each of the disorders are able to empathise or sympathize?

APPENDIX E:

RESEARCH INTERVIEW TRANSCRIPTS

Research Interview Participant 1:

Professional: Psychologist

General:

What experience do you have in the field of Conduct Disorder (CD) and Asperger's Syndrome (AS)?

I have come across...because I have had a few kids in my practice so I have come across both...and at the moment I have two Asperger's children in my practice more so than conduct disorder because Conduct disorder I tend to work more with the parents.

What kind of clinical setting do you work in?

Private practice.

When you refer to a child, what 'age group' are you referring to and why?

I work across the board but I generally only see children for therapy from five or six but often I get referred much younger children as well and I go up to, well the literature says twenty-four is the end of adolescence, so I have got a very broad range of patients. I have got adolescents, kids and adults.

What theoretical explanations do you draw on to understand children with AS and CD?

Well it is interesting because I think with Asperger's I tend to think about it much more as an inherited disorder whereas with Conduct disorder, although there does seem to be some sort of genetic links it seems to be more related to the environment.

How accustomed are you to drawing on attachment theory and the theory of mentalization?

I think in general it does inform the way I work and see things.

- **In relation to children with AS and CD?**
- I haven't really thought of it so much, as I said in Asperger's, because of seeing it more as inherited. You know often one will see a child with Asperger's where the father is Asperger's and the mother is the primary caretaker so I wouldn't really see it so much as related to attachment.
- **If alternate theory:**
 - o **Can you elaborate on this understanding?**
 - Well I would see Asperger's in terms of genetics
 - o **How does this theory help you understand these children?**
 - Well I suppose just realizing that, you know, that often it is more really a management problem than trying to work on the relationship. Well I don't know really because one does work on the relationship with children with Asperger's... I think that I see...that is quite a difficult question...you know I

think because of the way I work with the kids is much more around teaching them how to socialize and how to fit in the world rather than being about some kind of shift psychically for them.

Asperger's Syndrome:

How do you understand AS in terms of attachment theory?

I don't really but if I think of a particular child who has got an Asperger's mother, you know an Asperger's child with an Asperger's mother and an Asperger's granny, and the mother...I suppose the child didn't learn, didn't really attach to the mother in a normal way although the mother breastfed for a year so but I don't know whether I would connect it necessarily. I would really just see it as an inherited condition.

How do AS children evidence attachment when, and if it is present?

Their way of relating is idiosyncratic but it is different from an unbonded child and I think that is another distinction that one needs to draw. You know there are certain children that don't have Asperger's but just don't attach and they are different from Asperger's children who don't attach. I think it is part of the syndrome rather than related to attachment.

- **In your experience when, if so, does attachment develop in these children?**

It is a different kind of attachment, it is very hard to answer that but I do think they relate in a totally different way and so one is not looking at the same kind of attachment that normal children have. They do seem to want to have attachments; they just don't seem able to have them.

- **Do these children seem to attach to people?**

It is very difficult to understand that from a child's perspective but the one child I see is very keen to have a relationship but just doesn't know how. So I do think they do attach in a way but they don't know the rules of relating or attaching. One child said to me recently 'I really want to have friends', he said 'I can make friends, but I can't keep friends' so you know there is a desire for it even though they don't have the rules for it or they don't know how to do it.

How do you understand AS in terms of mentalization? (Ability to distinguish their own beliefs from somebody else's)

Very hard to say, I wouldn't know how to answer that... I think they can be taught to mentalize but they don't inherently have that ability, so you can teach them that when somebody is frowning they are cross but they won't pick it up themselves. So I do think so but it is something that one has to...they have to be drilled in how to do it. It is often instructed.

How do AS children evidence the ability to mentalize, when and if this ability is present?

It develops but much later on through drills and learning.

- **If clinicians feel these children don't mentalize:**

- o **How do you understand their impoverished ability to mentalize theoretically speaking?**

I wouldn't know how to answer that, I really wouldn't especially because if you think about it, it is just some genetic, some inherited condition that you are born like that, where your brain is structured in a particular way so I wouldn't know how else to describe it.

- **If clinicians feel these children can mentalize:**
 - o **How do you understand their ability to mentalize, theoretically speaking?**
(Not applicable and already answered, so didn't ask)

Conduct Disorder:

How do you understand CD in terms of attachment theory?

Well I do think conduct disorder is related often to impaired attachment or abuse of some sort that impairs attachment but having said that there also does seem to be some genetic link. So you do find, I mean...I am just thinking of a child I saw at TMI who was adopted at birth to a relatively normal family, whose father was antisocial you know so I think there is a combination, there wasn't impaired attachment but this child starting acting out. So I do think there is much more of a link there, you know one can look at the histories and see if there was a lack or the child doesn't develop empathy often due to what goes on in the early years.

What kind of attachment style would you generally say develops in these children?

I don't know if I would be specific about it, I think it might vary.

How do CD children evidence attachment when, and if it is present?

They do seem to form attachments...I think there is a sort of split that takes place...so they can be attached but I think that their, it often is split into, you know where it is seen very much in black and white certainly for people they attach to and seem connected to but others they don't, but it is a very difficult question, I don't know if they are or do...I don't think they necessarily are completely unbonded children, it depends on the severity of what has happened.

- **In your experience when, if so, does attachment develop in these children?**
It is hard to say
- **Do these children seem to attach to people?**
- Yes

How do you understand CD in terms of mentalization?

You mean as in empathy or lack of empathy? I think conduct disordered children have the ability to be empathic to others but choose not to be where as Asperger's don't have the ability, always to have empathy. I think there is sort of, often you have a sense of a sort of entitlement and you have a rage and those get acted out.

How do CD children evidence the ability to mentalize, when and if this ability is present?

They do have the ability but they choose not to.

- **If clinicians feel these children don't mentalize:**

- **How do you understand their impoverished ability to mentalize, theoretically speaking?**
Possibly because of their rage
- **If clinicians feel these children can mentalize:**
 - **How do you understand their ability to mentalize, theoretically speaking?**
(*Not applicable, so didn't ask*)
- **In relation to attachment theory and mentalization, how do you understand a CD child's ability to manipulate?**
Well because they are able to empathize so they can put themselves into the other person's situation and therefore they can manipulate them but they often quite good at it.

Similarities and Differences:

In your opinion, are there any similarities between AS and CD?

I would say the only similarity is the lack of empathy and the other thing that I think sometimes confuses one clinically is that they often both have rages and act them out and they can be quite destructive...but that's only a superficial, you know, when you start teasing it out you can see there is quite a wide difference in the way those operate.

What, in your opinion, are the conceptual similarities between these two disorders?

- **In relation to attachment?**
- **In relation to mentalization abilities?**

I think it is that they often act as if, with a lack of empathy. In terms of behaviour but in terms of conceptualization I don't think they are so similar, I think they are different in that one comes from or could be related to a lack or impaired attachment where as the other...I don't know it is quite tricky. I haven't really thought of it so theoretically. Let's go on and see if it comes up.

What, in your opinion, are the diagnostic similarities between these two disorders?

Well I think what I said you often get the acting out, the rage you get the lack of empathy and you know for example this one Asperger's child will just lash out at his sister, she will just walk past and he will hit her...and you know that sort of thing...and that is the sort of thing a conduct disordered child could do. So I think that acting out of rage is probably a similarity but when you tease it out though the mechanism is very different. An Asperger's child can have a rage and break things in the moment or can just hit somebody but there isn't the feeling or the sense 'this is going to really hurt someone and I am going to get them back', there is no revenge motive to it usually. Usually it is quite an impulsive act. However, conduct disorder comes from the space of revenge and a wish to hurt the other people and there is an understanding that their behaviour can hurt somebody else where as Asperger's can act out without the understanding that it is going to hurt somebody.

In your opinion, are there any differences between AS and CD?

Ya I think that I wouldn't equate them because I think that the intentions...some of the behaviours might be similar but the intention is different.

What, in your opinion, are the conceptual differences between these two disorders?

- **In relation to attachment?**

Well I think what we have said before that Asperger's do have the capacity to attach but don't have the capacity to attach in a normal way but conduct disorders can attach and I think that would be the difference.

- **In relation to mentalization abilities?**

Also what I think we have already covered but that they are very different, you know, what I think we were saying about the one having empathy but choosing not to behave in a way that takes that into account.

What, in your opinion, are the diagnostic differences between these two disorders?

Look I think often it is quite hard to tease out initially and one's got to bring in a whole lot of, one's got to look at the whole picture...but often the child expresses surprise when they find out that something or when a behaviour is wrong with an Asperger's. You know if they tie up the cat they haven't really thought out, they have just tied up the cat they didn't realize what they were doing whereas with a conduct disordered child they often are acting up, they are very aware that it is a cruel act, they just don't care about it so it's about trying to find out, trying to see where the child is coming from and that's quite complicated sometimes...the behaviour is often different with Asperger's; the quality of the behaviour is different. You know it does come from...I find often that with Asperger's they find change very difficult and certainly throws them totally off course and with some children, they act that out which isn't quite conduct disordered behaviour but there are certain factors that contribute to behavioural problems in Asperger's children. Just thinking about the couple of kids that I see...they will be perfect, their behaviour will be perfect at school, there is not any kind of acting out at school as long as the structure remains the same, they will be fine. At home they may act out, because it is not a structured enough environment and any change will throw them but with a conduct disordered child you often get the feeling that it is a raging child who any excuse will set them off but Asperger's children, they are not like that, it is much more about when the equilibrium gets upset then they shout.

Dual Diagnosis:

In your opinion are AS and CD mutually exclusive disorders or can they be comorbid? Why?

No I think they are mutually exclusive because I think the Asperger's child cannot empathize and conduct disorder, you need to understand or you need to be able to have the empathy in order to act out the rage so I do think they are mutually exclusive.

In your opinion, when behavioural difficulties are present in individuals with AS, would one consider such symptoms as characteristic of the disorder or possibly existing as a result of comorbid pathology? Please explain.

Yes, I think it is possible to have additional pathology you know anxiety, depression...there are certain things that could be co-morbid but generally behavioural difficulties could be as a result of the syndrome itself.

Given your understanding and experience, is a dual diagnosis of AS and CD possible?

No

- **Theoretically, how would you justify your opinion?**
 - o **In relation to attachment?**
 - o **In relation to mentalization?**

I think that Asperger's...I think it is what we have covered already. They are different etiologically and although they may have similar symptoms, it's for different reasons and, you know, that is what needs to be teased out.
- ***{If dual diagnosis is possible: (Not applicable so didn't ask)}***
 - o ***How would this child evidence attachment when, and if present?***
 - o ***How would this child evidence mentalization abilities when, and if present?***
 - o ***What contributes to a dual diagnosis in some individuals?***
 - o ***Is a dual diagnosis adequately explained using theoretical concepts such as attachment theory and the theory of mentalization?***
 - ***What else could account for such a diagnosis?***
 - ***Any influencing factors?}***

What is the possibility of misdiagnosing AS as CD?

- **If so, why do you think this happens?**

Look, I think it is possible because you get the rages and the lack of empathy so I think it is something that comes into one's head as a clinician initially but there are often clues that, you know, I think one has to be alert for the other symptoms of Asperger's.

Can you elaborate on whether or not each of the disorders are able to empathize or sympathize?

Look I mean Asperger's children struggle with that and they can go through the motions but they don't always have the feeling and I think that, from what I have seen, conduct disordered children they are very sensitive to their own hurts but not necessarily so in others. So I think in both cases there is an impaired ability but it is different in both.

Research Interview Participant 2:

Professional: Psychiatrist

General:

What experience do you have in the field of Conduct Disorder (CD) and Asperger's Syndrome (AS)?

Well probably in terms of time I have had about maybe ten years of experience, a few years of that being through the government clinics, and then the balance, say the last seven years or so being in private practice.

What kind of clinical setting do you work in?

In private practice...in my own practice and I see private patients, medical aid patients.

Are you psychodynamic in orientation? If no, what modality do you tend to work from?

Not really, no. Probably more of a cognitive behavioural framework but I do have an interest in attachment theory and some interest in object relations theory as well but I am not Freudian if that puts any perspective on it but I do have quite a strong leaning towards attachment theory.

When you refer to a child, what 'age group' are you referring to and why?

I am actually referring to anyone under the age of 25 which is a somewhat arbitrary cut-off but the reason is that most young adults in their early twenties are still dependent on their parents financially and still living with their parents and so for those practical reasons, in my practice, that is my age cut-off.

What theoretical explanations do you draw on to understand children with AS and CD?

Well look I suppose you would have to separate that out between two conditions because in my understanding you have to look at different theoretical underpinnings so possibly to deal with Asperger's first I see that as very much a biological or neurobiological condition so it is a brain disorder, it is a wiring problem and it effects parts of the brain that are involved in interpersonal development, social development...so yes for me that is very biological. When it comes to conduct disorder...that is a different matter. Again I think that often there is a biological driver there and there certainly are genetic correlations but I would then start talking about attachment theory very strongly.

How accustomed are you to drawing on attachment theory and the theory of mentalization?

- **In relation to children with AS and CD?**

Well yes, very, very accustomed, certainly with conduct disorder.

Mentalization in particular would be pervasive developmental disorders like Asperger's and attachment would be what really informs my understanding of conduct disorder largely.

- ***{If alternate theory: (Not applicable)}***

- o ***Can you elaborate on this understanding?***

- *How does this theory help you understand these children?}*

Asperger's Syndrome:

How do you understand AS in terms of attachment theory?

I don't. I mean I think these children attach differently but I think that is because of their brains.

How do AS children evidence attachment when, and if it is present?

I think it is different. I think they are attached but they attach differently. It is odd, it is idiosyncratic, it is a bit eccentric for example they may be very averse to physical affection and actually avoid it but that does not mean they are not securely attached in their own way.

- **In your experience when, if so, does attachment develop in these children?**
Hard to say, it develops, just differently.
- **Do these children seem to attach to people?**
Yes.

How do you understand AS in terms of mentalization?

Well I think for me I have to kind of hinge that, I don't know if I am entirely correct, on Theory of Mind because I think I have a good understanding about ToM and I think that for me is fundamental, it is key to understanding the condition. It is key because these kids don't have the normal developmental understanding, if you like, of other people having separate views, ideas, opinions, experiences, to theirs. So the idea that another person, the other, has a separate view, a separate experience to their own, is just deficient. For me that is how I understand deficient mentalization.

How do AS children evidence the ability to mentalize, when and if this ability is present?

- **If clinicians feel these children don't mentalize:**
 - **How do you understand their impoverished ability to mentalize theoretically speaking?**
Again I think it is a biological problem I think it just so happens that the part of the brain that is affected i.e. frontal lobes, I think largely frontal lobe functioning happens to be that which is responsible for the mentalization and ToM.

Conduct Disorder:

How do you understand CD in terms of attachment theory?

I think even if I just look clinically at my practice so many if not all of my clients with that condition have had disrupted, disturbed attachment and their ability to have empathy, their ability to love, their ability to consider the needs and rights of others is predicated upon early experiences with the caregiver, the attachment figure and this just hasn't happened for those kids.

How do CD children evidence attachment when, and if it is present?

I think they do, some of them don't have proper attachments at all, they have just never had proper attachments but others do for example if you look at the classification of attachment types, some of them have what we call disorganized attachment. I have seen others who have been insecurely attached who have evidence of separation anxiety as well so I mean I think there is disordered attachment in a clinical way.

- **Do these children seem to attach to people?**

I think it depends, I think we dealing with a condition that is probably not one size fits all and I think they probably are, some of them are. So ya it probably depends on the child.

How do you understand CD in terms of mentalization?

I don't know if I ever thought of the two together to be honest with you. I mean I think ToM doesn't really apply or I have never thought of it as applying to conduct disorder in the same way it applies to Asperger's disorder but maybe it does in some kind of way...but I think that they have a clear concept of the idea that others are different and others have their own needs, rights, desires and opinions, I just think they violate them, they choose to disregard them. So ya I can't really say I have ever considered those two concepts together.

So how do you understand their need to disregard and violate other's rights or that impoverished ability to think of others?

I think from very young...their egocentricity is such that they only consider their own needs. It is not that they don't have the capacity to consider somebody else's needs but their own needs or wants or desires just override anyone else's so I think it's more of egocentricity. In other words the capacity could be there but it has just never been developed and they are just egocentric.

{How do CD children evidence the ability to mentalize, when and if this ability is present? (Didn't ask as he hadn't thought of the concepts together so rather asked the above)}

- *If clinicians feel these children don't mentalize:*

- o *How do you understand their impoverished ability to mentalize, theoretically speaking?*

- *If clinicians feel these children can mentalize:*

- o *How do you understand their ability to mentalize, theoretically speaking?}*

In relation to attachment theory and mentalization, how do you understand a CD child's ability to manipulate?

Well clearly they do manipulate but all children can manipulate. I think drawing on attachment theory, the importance of the reciprocity of the relationship, the importance of the other hasn't been properly developed from the critical periods of early attachment and so again the way they think, the way they operate is purely for self gratification. So yes I draw on it more in terms of attachment theory.

Similarities and Differences:

In your opinion, are there any similarities between AS and CD?

Yes there are certainly...even if it's just superficially.

What, in your opinion, are the conceptual similarities between these two disorders?

- **In relation to attachment?**
- **In relation to mentalization abilities?**

I wouldn't say in terms of attachment because I don't see Asperger's as being a problem of attachment but maybe in terms of mentalization now that you ask me the question, there could be but again I see a distinction between the two because I see in Asperger's a biologically driven deficit in mentalization whereas in conduct more of an acquired problem related to early attachment which again has biological ramifications in terms of brain development after birth and I suppose that can lead to problems around mentalization in conduct disorder so maybe more on the mentalization than the attachment side.

What, in your opinion, are the diagnostic similarities between these two disorders?

I think the only one that you can really make an argument for in terms of if you look at the triad of impairments in Asperger's would be in terms of the social development which I think is the first of the triad of impairments where kids with Asperger's are relatively socially isolated, don't have good social skills, and do come across as being very egocentric, so along the social development aspects there may be some similarities. In terms of the actual behaviours, a lot of the Asperger's kids can present with very antisocial behaviours but I think it is driven differently, for different reasons for it, so I have never really felt that there is a strong overlap between the two conditions, I must say.

In your opinion, are there any differences between AS and CD?

Yes I think so.

What, in your opinion, are the conceptual differences between these two disorders?

- **In relation to attachment?**
- **In relation to mentalization abilities?**

Well conceptually I think, in terms of attachment, conduct disorder is much more a disorder of attachment than Asperger's disorder. I don't see it (AS) as an attachment disorder like I say I think they attach differently and there can be complications to their attachment which is driven by a biological role. In terms of mentalization, I think there are or can certainly be similarities between the two disorders but I think that in Asperger's disorder, again it is a biological problem which is just there and in conduct disorder it is more an acquired problem in mentalization but again I don't think their mentalization is as deficient as it is in AS.

Dual Diagnosis:

In your opinion are AS and CD mutually exclusive disorders or can they be comorbid? Why?

Well that is the crux of the matter isn't it? I see them as being mutually exclusive I must say and maybe that is incorrect but I do see them as being mutually exclusive as one is biological really.

In your opinion, when behavioural difficulties are present in individuals with AS, would one consider such symptoms as characteristic of the disorder or possibly existing as a result of comorbid pathology? Please explain.

I would pretty much see them as being characteristic of the disorder I mean, you know well that may be a function of our training really but even other disruptive behaviour disorders such as ADHD strictly speaking are not allowed to be comorbidly diagnosed with Asperger's, so no I would see them as being exclusive.

Given your understanding and experience, is a dual diagnosis of AS and CD possible?

I don't think it is possible but I am happy to be proved wrong, but maybe one needs to think about that, but no.

- **Theoretically, how would you justify your opinion?**

- o **In relation to attachment?**
- o **In relation to mentalization?**

That they are separate and clear cut and I think I would come back to the biological basis of Asperger's disorder and their actual capacity, their actual biological capacity for understanding and appreciating the otherness of people, the needs, desires, opinions, viewpoints of other people just isn't there. Now it isn't there and I don't think you can implicate a character disorder which is essentially what conduct disorder is and taken further antisocial personality disorder, I don't think you can implicate that in somebody who doesn't have the wiring where as in conduct disorder it is more acquired, it is more related to early attachment experiences and character development, if you believe in character development, and therefore you can make such a diagnosis with it's own implications on the persons character and personality.

- ***{If dual diagnosis is possible: (Not applicable, so didn't ask)}***

- o ***Does an overlap occur diagnostically and/or theoretically? How?***
- o ***How would this child evidence attachment when, and if present?***
- o ***How would this child evidence mentalization abilities when, and if present?***
- o ***What contributes to a dual diagnosis in some individuals?***
- o ***Is a dual diagnosis adequately explained using theoretical concepts such as attachment theory and the theory of mentalization?***
 - ***What else could account for such a diagnosis?***
 - ***Any influencing factors?***

What is the possibility of misdiagnosing AS as CD?

- If so, why do you think this happens?

Now that I accept...and in fact I think I have seen it happen where a child has been diagnosed or misdiagnosed conduct disorder when in fact they have Asperger's disorder because superficially the behaviours of an Asperger's child can look very antisocial or sociopathic. They come across as egocentric; they disregard other's opinion, other's rights; they don't seem to care about others; they seem to have empathy but I think that's a superficial appearance and you need to look a little deeper and look at the actual capacity to relate. However I think that happens often and I think from other research done there is evidence that in prison populations, Asperger's is over represented. So that tells a bit of a story. The question is should they be criminally responsible or is it a mitigating factor?

Can you elaborate on whether or not each of the disorders are able to empathize or sympathize?

I think they probably both can but for various reasons don't, in both conditions, probably for slightly different reasons. Again, conduct disorder I would say it is because of problems with early attachment and in Asperger's disorder more because of biological happenings of the disorder. So I would say in terms of the actual ability to do it, the capacity to do it, I would say Asperger's would be worse off.

Research Interview Participant 3:

Professional: Psychiatrist

General:

What experience do you have in the field of Conduct Disorder (CD) and Asperger's Syndrome (AS)?

I do have experience with both having seen conduct disordered children and children with Asperger's and also little bit of theoretical background as well on the possibility of the two coexisting.

What kind of clinical setting do you work in?

Well now in a private psychiatric setting where it is predominantly I would say diagnostic and medical model type of psychiatry but before this I would say it was a lot more of intervention than it is now.

Are you psychodynamic in orientation? If no, what modality do you tend to work from?

No I definitely do have a psychodynamic grounding to the way that I think but obviously in the medical model way of dealing with things now, it is not really probably that much coming to the fore.

When you refer to a child, what 'age group' are you referring to and why?

Well, a 'child' right from birth I suppose to eighteen although it is quite nebulous, the cut off point. I differentiate between a child and adolescent though.

What theoretical explanations do you draw on to understand children with AS and CD?

Well I think to start with Asperger's I would probably draw primarily on a medical model that it is a pervasive developmental disorder which has specific deficits in specific areas. In terms of conduct disorder, there obviously is also some biological components to it but there is also a large environmental component to its development.

How accustomed are you to drawing on attachment theory and the theory of mentalization?

- **In relation to children with AS and CD?**
- Ya I am accustomed to it in general, but more so probably with conduct disorder than with Asperger's.
- **If alternate theory:**
- Ya the medical model for Asperger's.
 - o **How does this theory help you understand these children?**
 - o Well it is seen as a biological disorder so in relation to that I suppose it is very helpful

Asperger's Syndrome:

How do you understand AS in terms of attachment theory?

I don't know that I really do to be honest because...well let's put it this way...Asperger's may well be securely attached, they don't necessarily have attachment problems and they are not unbonded or unattached children either...but they can coexist so if there is a dicey or insecure attachment it could still occur in the presence of an Asperger's child.

How do AS children evidence attachment when, and if it is present?

Well it depends on how high functioning you are talking about. I definitely think they can have the full range of attachment subtypes depending on their attachment histories.

- **In your experience when, if so, does attachment develop in these children?**
- Chronologically speaking that is a hard question but I would say that mothers may feel from early on that maybe attachment is more difficult from their side but children with Asperger's would still show the normal attachment sort of patterns that other children would show in terms of stranger anxiety and separation anxiety and that kind of thing so I don't know if it's that different, it might be that it's just not that obvious and it might not show its self as obviously as it does in children without Asperger's.
- **Do these children seem to attach to people?**
- Yes

How do you understand AS in terms of mentalization?

Well Asperger's children would have quite a lot of difficulty in mentalizing or being able to show empathy for other people's emotions, they don't have a strong theory of mind. That is one of the deficits in the pervasive developmental disorders so it would sometimes be difficult for them to be able to either mentalize what somebody else was feeling and sometimes also to imagine what they might feel or what they might have felt before so difficulty with mentalizing.

How do AS children evidence the ability to mentalize, when and if this ability is present?

- **If clinicians feel these children don't mentalize:**
 - o **How do you understand their impoverished ability to mentalize theoretically speaking?**
 - o Well again I would come back to that theory of mind that they don't have a good ToM where they can empathize with or imagine what another person might be thinking so I think it would be along that sort of line, ToM. I understand it as a part of the disorder.
- ***{If clinicians feel these children can mentalize:***
 - o ***How do you understand their ability to mentalize, theoretically speaking?}***

Conduct Disorder:

How do you understand CD in terms of attachment theory?

Here the conduct disordered child often has a history of attachment problems either completely unbonded or with severe or disorganized attachment patterns and often there is a lot of trauma and a lot of disrupted attachment that has occurred in early life which then leads on to attachment problems and conduct disordered behaviour.

How do CD children evidence attachment when, and if it is present?

It is often either not present if they are unbonded or if it is, it is often disorganized where they show...unusual ways of showing it so they either are completely...uh they might be aloof or they might have a melt down in relation to an attachment figure when it is difficult to kind of tie in why that happened. There is a word for it and I cannot think of it right now um...I can't think of it but basically an unusual, a bizarre way of showing attachment, they often do show bizarre ways.

- **In your experience when, if so, does attachment develop in these children?**
- In a sense most of them I would say have impaired attachments and I mean if it does develop it might be around needs being met rather than a reciprocity as such and there certainly is not that need to please or...it is more about having their own needs met and it is quite a self orientated attachment need as such.
- **Do these children seem to attach to people?**
- Again in a kind of a narcissistic way they do but it's usually disordered and it's usually about having needs met rather than meeting other people's needs and having reciprocity again but I think, ya I suppose abnormal attachment rather than a secure back-and-forth sort of attachment would occur.

How do you understand CD in terms of mentalization?

Well again there is a great self-absorption and a difficulty with mentalizing and a difficulty with empathizing so again that same sort of thing but it is more now not because they can't or they wouldn't have been able to possibly, they may have been able to if they hadn't had their own attachment disrupted somewhere along the line.

How do CD children evidence the ability to mentalize, when and if this ability is present?

- **If clinicians feel these children don't mentalize:**
 - o **How do you understand their impoverished ability to mentalize, theoretically speaking?**
 - o *(Look above – linked to attachment)*
- ***{If clinicians feel these children can mentalize:***
 - o ***How do you understand their ability to mentalize, theoretically speaking?***
- **In relation to attachment theory and mentalization, how do you understand a CD child's ability to manipulate?**

Well there is less of that need to please, there is less of that need to be acceptable and to conform so if it is about meeting own needs there is a lack of empathy around what meeting own needs might mean for other people so they may be

quite manipulative in terms of that without giving due thought to the other person's feelings or considerations.

Similarities and Differences:

In your opinion, are there any similarities between AS and CD?

There are in terms of that conscience but I think that the way that it presents may be quite similar so they may do things but the underlying mechanisms for why are different so they both might do things that are potentially damaging to others or are aggressive or violent but the underlying mechanisms might be different in that the Asperger's as individuals might not always understand the concept of why what they are doing is wrong and isn't socially acceptable where as conduct disordered individuals often do know exactly what is right and wrong and how society would need them to behave but they don't act in accordance with knowing that.

What, in your opinion, are the conceptual similarities between these two disorders?

- **In relation to attachment?**
- **In relation to mentalization abilities?**

I don't know but I suppose they are in terms of being able to empathize with other people and being able to, but I suppose that's not really attachment theory is it? So maybe more to do with the mentalizing where it is harder for both of them to put themselves in another's shoes and picture what effects their behaviour is going to have on others so in that respect ya. I mean I think there could be similarities, I don't think having Asperger's syndrome precludes you from having a conduct disorder with being unattached as such.

What, in your opinion, are the diagnostic similarities between these two disorders?

I suppose at a surface level maybe, if you don't unpack them in terms of that decreased capacity for empathy; possibly a decrease in conscience at a sort of practical level...ya maybe those two in terms of conscience and understanding effects of behaviour.

In your opinion, are there any differences between AS and CD?

I think there are.

What, in your opinion, are the conceptual differences between these two disorders?

That the one is biological and the other is more environmental really.

- **In relation to attachment?**
- **In relation to mentalization abilities?**

In conduct disorder attachment is often impaired and it is kind of an underpinning of the condition where as in Asperger's syndrome, attachment is often ok and secure and not a problem.

What, in your opinion, are the diagnostic differences between these two disorders?

Well I think one is a pervasive developmental disorder which means it has probably been there from birth and will continue to be there in whatever form it is going forward where as conduct disorder is obviously a behaviour disorder which has a different set of outcomes too and it is a disruptive behaviour disorder which may go on to be a personality disorder later in life and again going on. I think the level of insight is

sometimes different, I think conduct disorders can be insightful too but there is definitely a...I can't really conceptualize it right off the cuff but basically people with Asperger's seem to have this disorder that prevents them from having insight or from kind of changing behaviour and it is more a fixed, inflexible, rigid behaviour where as with conduct disorder there is often a sense that the person with the disorder actually has a much clearer idea of their effects of their behaviour and an insight into what is right and wrong but still doesn't conform to what is socially acceptable.

Dual Diagnosis:

In your opinion are AS and CD mutually exclusive disorders or can they be comorbid? Why?

I don't think they are mutually exclusive but certainly I don't know that you would say, if a person had...it's a tricky one but if a person had a conduct disorder and Asperger's disorder, you would probably put Asperger's as the cause of the conduct disorder if you see what I mean. So in a sense I think they are mutually exclusive according to DSM-IV but in terms of symptomatology I don't know that they really are.

In your opinion, when behavioural difficulties are present in individuals with AS, would one consider such symptoms as characteristic of the disorder or possibly existing as a result of comorbid pathology? Please explain.

I would still conceptualize it as part of the Asperger's syndrome, that being the hierarchy for me.

Given your understanding and experience, is a dual diagnosis of AS and CD possible?

Yes because I suppose conduct disorder is a descriptive thing where if you look at DSM-IV where if you have a certain constellation of symptoms...so if you are deceitful and aggressive and whatever, you can fulfill the criteria for conduct disorder at a purely symptomatic level so I suppose you could say with conduct features, 'Asperger's syndrome with conduct disordered features' although I am pretty sure in DSM-IV it says they are mutually exclusive. It is a tricky one for me because it is not allowed according to the classification systems we use but...I would say no. You see I think the conduct disorder diagnosis we all use in the DSM-IV is a very descriptive one, it has nothing to do with etiology, it has nothing to do with attachment, there are two different sections. There is Reactive Attachment Disorder and there's Conduct disorder and they are not even connected so it is very descriptive and many children would fill, if you just took it at face value there are many individuals who would fulfill the criteria for conduct disorder but unless you look below that and see why it is, you know, some children steal because they are emotionally deprived but it doesn't make them conduct disordered, so no.

- **Theoretically, how would you justify your opinion?**

- o **In relation to attachment?**
- o **In relation to mentalization?**

I suppose what I have already said really.

- **If dual diagnosis is possible:**

- o **How would this child evidence attachment when, and if present?**

- I suppose that it would be about, depending on their developmental age, reassurance seeking and safety seeking with parents, love and kindness and showing that to the person that they are attached to but depending on age you would see it and certainly recognizing the differences between attachment figures and non-attachment figures and showing appropriate and being able to be soothed appropriately and having a normal reaction to separations and reunions and that kind of thing really, but a child with a dual diagnosis may show impairment with all of this but it is difficult to know.
- **How would this child evidence mentalization abilities when, and if present?**
- That is a difficult question but I suppose by being unable to show empathy and to imagine what another person in a relationship with them was feeling and acting in accordance with it.
- **What contributes to a dual diagnosis in some individuals?**
- I suppose it is mainly descriptive of behaviour so behaviour problems that would be the main one being just a descriptive thing. Obviously family history and genetics especially with Asperger's as well as in conduct disorder particularly in the male line so if there was a very strong family history of both and then the child had had very disruptive early years with lots of psychosocial factors, those would be factors too.

What is the possibility of misdiagnosing AS as CD?

- **If so, why do you think this happens?**

I think that is probably quite high. That is high if you miss the underlying Aspergian features as such the behaviour may look very disinhibited or aggressive or conscienceless so I think that is high and that probably does happen.

Can you elaborate on whether or not each of the disorders are able to empathize or sympathize?

Certainly conduct disorders can experience anxiety and depression as can Asperger's and certainly if they are badly treated they can feel like they have been badly treated and feel bad so in terms of sympathizing with themselves I think that is probably where they would be best rather than empathizing with other people and I suppose it is linked to guilt as well, guilt about actions maybe if they do maybe if a conduct disordered individual does something that really hurts an attachment figure they might be able to or if they see an attachment figure feeling bad they might be able to sort of sympathize...I don't know, I don't know. In Asperger's, I think if it interests them and if they are able to understand they may be able to and maybe if they are taught, they may be able to empathize for example in Asperger's children, you may need to teach them that if you hit someone, this is how they feel, if you grab someone, this is how they might feel and a lot of work would need to be done to teach them. As it isn't innate for individual's with Asperger's and is linked to their executive dysfunction and ToM where if they can't recognize facial expressions or social cues or different emotions in people then it is very difficult for them to empathize with them.

Research Interview Participant 4:

Professional: Psychologist

General:

What experience do you have in the field of Conduct Disorder (CD) and Asperger's Syndrome (AS)?

Well I have been assessing them for about twenty four years.

What kind of clinical setting do you work in?

Outpatient, child psychiatry outpatient

When you refer to a child, what 'age group' are you referring to and why?

The unit here looks at anything that is under eighteen and the reason for that is we see children that are school going. Now it has happened that sometimes somebody is nineteen and in Matric and we will still see them but we consider the children who are going to school, have different issues than people who work, that is the whole idea. So legally the definition is different, children are under twelve and adolescents are between twelve and eighteen but this clinic sees things under eighteen.

What theoretical explanations do you draw on to understand children with AS and CD?

They have different theoretical paths. Asperger's is more a developmental disorder, it has got nothing to do with bad parenting or anything like that, it is neurodevelopmental and the causes of Asperger's, nobody really knows the exact cause, we know there are many paths. One is that it is genetic, there are very clear genetic loadings but there is also a group that seems to have a metabolic set of disorders and they are the group that responds to the diet but only ten percent of Asperger's respond to the diet so it is a small group. There is however some research suggesting that they may have had or the mother may have had some weird virus in the first trimester. So there are multiple causes but they are neurodevelopmental, in other words we are looking at a neurological cause with Asperger's and Autism...and Conduct Disorder, we do know that one third have a genetic predisposition but there isn't an antisocial gene, that is rubbish, what we mean by a genetic predisposition is that in about one third of them there is a parent that has antisocial traits and you can't argue that the conduct disordered child has been influenced by the antisocial father in terms of social contact because the studies that have been done have been done when the father has actually been incarcerated. So they've only looked at these children who have grown up completely without the father present but the father is an antisocial in prison and these children still had a high rate of becoming antisocial. They have also done studies where they have compared monozygotic and dizygotic twins and shown that there is a portion of conduct disorders that follow that pattern that we get with monozygotic, so we know there is a genetic predisposition but a predisposition is a predisposition, we do need enabling things in the environment and that is invariably a punitive, neglectful environment in which attachment is impaired. That is your conduct disordered children.

How accustomed are you to drawing on attachment theory and the theory of mentalization?

- **In relation to children with AS and CD?**
 - Very accustomed to it, we use that here all the time
 - **If alternate theory:**
 - o **Can you elaborate on this understanding?**
 - o **How does this theory help you understand these children?**
- (Not applicable, so didn't ask)*

Asperger's Syndrome:

How do you understand AS in terms of attachment theory?

Asperger's syndrome has nothing to do with attachment theory. It is a neurodevelopmental disorder and that is that. Then you get children with Asperger's who are neglected or abused and then develop attachment disorders as a comorbid diagnosis just as you get Asperger's children who are attached to their parents but because you have got very serious problems particularly with the prefrontal cortex with, and you probably know with Theory of mind, if you look at the capacity for coherence and the executive functions, what then happens is the way in which the child is attached has to filter through that kind of brain dysfunction so they don't look like other children in the way they attach etc but if you meet an attached child with Asperger's and a non-attached child with Asperger's, you immediately see the difference. Children with Asperger's who are attached do not have conduct disorder features, children with Asperger's who have been abused and neglected do have conduct features and you can see it very clearly when you compare them.

How do AS children evidence attachment when, and if it is present?

Well it is interesting because attachment is usually assessed by developmentally. So if it is preschool, or school going or so on but usually it starts by looking at the proximity to the primary attachment figures so you look at how they behave. Little children will run to their mothers they won't run away from them, if they are distressed they want to go to them and so on. One of the difficulties with Asperger's children is that they very often don't seem to show proximity seeking behaviour because they have a different way of relating, their eye contact is different, they don't necessarily like touch, they may be tactile defensive and all those things but of course they needn't be. We do get very affectionate Asperger's coming into the unit but they inappropriately affectionate, you know they will still sit on their mother's lap when they are thirteen and they haven't quite caught on you know that you don't do that. So what you do find is that they are distressed when the primary caregiver goes away although they may not seek out in usual ways that a well attached child without Asperger's might do, so they will still have proximity seeking but it is slightly different, they do get distressed when the parent is not around and it is true that the parent plays the role of being mediator to the environment, helps them adapt to change, helps them predict what is going to happen next, warns them that tomorrow they are going to be going on a different route and not to school and one can argue in that sense you know the mother's function, let's say it is the mother for example, they clearly very distressed when these people go away and they are upset about it and they don't really want, if they are upset they do want this figure to come and help them

but they may not necessarily want this figure to come and hug them but it is still proximity seeking provided you understand that there is this faulty filter that it is going through.

- **In your experience when, if so, does attachment develop in these children?**

Proximity seeking goes developmentally with your milestones so if the Asperger's IQ is normal and I am assuming you are talking about normal IQ Asperger's because if they weren't normal IQ we wouldn't be calling them Asperger's then they should be called low functioning autism but if the IQ is normal then that follows the same streak but it's got the same faults but it is very difficult with Asperger's because it is more common for the autistic children to be tactile defensive and not to have gaze but where as Asperger's children are not always tactile defensive, some are and some aren't, they tend to be clumsy and they tend to have very good gaze although they will stare at you a little bit too long without you blinking at me now, occasional blinking and I might talk to you and look away and look back at you, they might sit like this for the whole interview and you start getting unnerved because the eye contact is a bit intense and it is not right but it is there, if I sat like this the whole time you would get unnerved. So they are not as tactile defensive as the other lot so they will still seek relationships and friendships, they will seek them but in very inappropriate ways because they tend to be wholly egocentric, they have no sense of reciprocity and that is where it falls down. You have the sense that this person is just very selfish and they want their own way all the time so they lose their friends but they get hugely distressed if they get separated from their attachment figures. So it does develop in these children it is just seen very differently.

- **Do these children seem to attach to people?**

Yes they do

How do you understand AS in terms of mentalization?

Well that is interesting because mentalization its self is really Peter Fonagy's big thing in many ways he pinched his ideas from Baron-Cohen who actually was talking about mentalization in a slightly different way and he was talking about it in a more concrete way in that we are talking about the person's capacity to see the other person's point of view in quite a literal sense and that all started with the Sally-Ann experiments which you must know and so Baron-Cohen made all the Sally-Ann experiments. Now what is interesting is the high functioning Asperger's pass the Sally-Ann experiments if their mental age is over four. Ok so if they are three year olds they are not going to pass. If their mental age is over four they pass the Sally-Ann experiments so the Sally-Ann experiments that Baron-Cohen brought into play were clearly on more of the concrete side but if you take the Asperger's individual into slightly more subtle interactions, the capacity to consider that the other person has a mind and has thoughts and feelings that might be different from yours, you find that is much more impaired and the Asperger's person certainly does have severe problems with mentalization, there is no doubt about it but it would be a mistake to think it is absolute, it is clearly on a continuum. I mean I have had Asperger's people get the idea that other people will get distressed under certain circumstances so let us say for example the Asperger's person thinks you are distressed because your mother died but they don't entertain the idea that you might have hated

your mother and couldn't care that she died, you see that would be the flexibility they wouldn't be able to show. So they would be able to go, some of them would be able to go with some very stereotypical ideas but the more subtle nuances of mentalization, there is no way they can do that.

How do AS children evidence the ability to mentalize, when and if this ability is present?

- **If clinicians feel these children don't mentalize:**
 - o **How do you understand their impoverished ability to mentalize theoretically speaking?**

It develops later because one of the things you do when you do therapy with an Asperger's is basically what I call 'teaching them manners and socialization' and you basically play a game with the child and you say 'now you actually have to give me a turn now, that is how it works, you see when you have friends you have to have turns' and you explain it in that way and then they say 'oh right, now you have a turn', you have to tell them, they can't intuit that. So what you see is that you can improve their sense of reciprocity up to a point but it is developmentally delayed compared to other people but I don't think there are any Asperger's people who can do mentalization properly and that's because it is a neurodevelopmental disorder. There are certain functions in the brain that aren't there. There is very interesting research coming out by somebody called Ickbart, I had never heard of him before but anyway he arrived here, he is from the States, and he arrived on our door step and said please can he come and do, come to our ward round and what have you and the reason why we had never heard of him is because he was actually a neurologist who was an ex-South African, left twenty years ago and came back to see his Granny die or something and...which is the norm but then comes here and asked to go on the ward round, he is an expert on Autism, which it turned out he was and they had been doing a whole lot of PET scans and finding out that, it is very interesting, that in the brains of the Autist's and some of the Asperger's because obviously you are using a broad diagnostic category there is a whole section of white matter that is not growing in the brain, so there is a whole...you see when you have an adolescent brain you get your myelinization that has to develop, and this is not developing in them so we do know there is something very wrong with the cells, they are not differentiating as they should so it is very interesting. So what I am saying is there is something wrong in the brain here, forget attachment.

- ***{If clinicians feel these children can mentalize:***
 - o ***How do you understand their ability to mentalize, theoretically speaking?***

(Answered above so didn't ask)

Conduct Disorder:

How do you understand CD in terms of attachment theory?

CD, you have a genetic predisposition but I mean I think there are children without a genetic predisposition. If you abuse or neglect a child sufficiently and disrupt the attachment sufficiently you will disrupt their capacity to form attachment and we know that. We know that if we look at the brains of children who have been physically abused, that they have faulty neurotransmitters which you probably do know, if you look at the

work of somebody like Daniel Schore is the best, and what happens with children who have been abused...well they did studies with squirrel monkeys, took them away from their mothers for a day and showed that their cortisol levels and neurotransmitters were raised. Put them back with their mothers, they went down; took them away again...if you repeatedly take the squirrel monkey away from his mommy over a week, eventually those cortisol levels stay high forever...they don't come back to normal again. So we know that is happening in human beings. So if you stress and neglect and abuse a human child sufficiently, you will get altered neurotransmitters which all affect the limbic system so what happens is the self regulating system doesn't work properly. Now that is your capacity to, at the end of the day, filters your capacity to contain yourself, how you express yourself and ultimately the basic building blocks you need for things like empathy. So what happens if you don't actually show or treat a child with empathy is that they don't develop it and they develop high rates of rage and then what happens is they end up being horrible psychopaths.

How do CD children evidence attachment when, and if it is present?

You do get anxious attachments among them, they not all totally unattached and I am sure you know of Charles Zeanah. He is the new guy in research on attachment and he has been around a long time and he is on the DSM-V committee for Reactive Attachment Disorder, so he is looking at what the criteria should be and he has already suggested five different sub-categories as opposed to the DSM-IV's two which is 'inhibited/disinhibited' and he has got one which he says there is a 'non-attached' and then he has got 'anxious attachment' and 'aggressive attachment' and the 'role reversal block', ok the only reason I am raising it is to say that you will find conduct disorders that show separation anxiety and they won't go to school and they won't leave their mommy's etc but when they are with their mommy's and they are very happy they still cut up the rabbit. So it is a sort of attachment but it is a very pathological attachment and we wouldn't consider it a healthy attachment but it would be an anxious attachment and it would be very impaired. So conduct disorders aren't necessarily all completely unattached, they may be ambivalent...they may have different kinds but if you look on a continuum it's quite primitive but they can still have different styles but they are usually completely unbonded or unattached but I am just saying to you that sometimes they are not, sometimes they have some bits of attachment but different styles.

- **Do these children seem to attach to people?**
- Yes there are some who do

How do you understand CD in terms of mentalization?

That is quite interesting...Christopher Gillberg, who has written, he is Swedish, and he is a big deal in looking at Asperger's and Autism you have probably come across him and kind of the big names are Baron-Cohen, Tony Attwood. Christopher Gillberg doesn't believe that conduct disorders have a lack of empathy. He says they have a lack of sympathy and actually he is right because a conduct disorder, like any psychopath, can fake a feeling. They know what is right. They know what they should do and they choose not to do it because they can mimic and very often mimic and they can pretend to be sweet and little children with conduct disorders when they are being naughty, can pretend to be very sorry because they can avoid getting a hiding so they can all mimic which

means they have the capacity for empathy technically in that you can mimic but they don't have a capacity for sympathy and if they don't really feel any feeling for you...and he has gone on, he has had this issue about this sympathy and he is not wrong but he is not big enough in the field of conduct disorder to have had an impact so there have been some quite interesting studies looking at pretty much like the mentalization studies done by Baron-Cohen, the Sally-Ann studies, there are a whole range of them, and they did them with high-functioning Asperger's and they did them with conduct disorders and the high-functioning Asperger's passed them all and the conduct disorders failed them all which is very interesting. So interestingly, the high-functioning Asperger's passed the mentalization studies, they managed to get them done...we are talking children from 8 to 12 but in fact the conduct disorders failed them and that was very shattering because nobody expected them to do that. So mentalization...I think what you will find with conduct disorders is that some of them are sophisticated enough to fake it, certainly get some idea of what the other person is thinking, they sometimes do know what the other person thinks and don't care but really if you have a proper conduct disorder, a full blown one that meets all the diagnostic criteria, their mentalization functions are impaired with no question, they are hugely impaired. In the study they accounted for the conduct disordered failures by saying that they lacked empathy, and the Asperger's children, although they had problems with reciprocity, still had empathy in that the Asperger's children wanted to do the right thing and wanted to make friends and wanted to be concerned but they didn't know how, they didn't have the tools as to how but they had the motivation and the wish. Conduct disordered children on the other hand didn't give a hoot.

How do CD children evidence the ability to mentalize, when and if this ability is present?

- **If clinicians feel these children don't mentalize:**
 - o **How do you understand their impoverished ability to mentalize, theoretically speaking?**

Well that would be related to the neglect and abuse, dysfunctional families and their impaired attachment.

- ***{If clinicians feel these children can mentalize:***
 - o ***How do you understand their ability to mentalize, theoretically speaking?}***
 - o

In relation to attachment theory and mentalization, how do you understand a CD child's ability to manipulate?

Conduct disorders can read situations quite well, they can see what is required, they can see that they are expected to do their homework and if they aren't going to do their homework they can see they better come up with a good reason to get out of it so they can read social situations accurately but they lack the motivation to perform in social situations in the way expected so for example if you don't have a sense of empathy and you don't really have a need to please people because you are not really attached and you don't form bonds, you don't see the point of doing certain things. Children do things to please adults and get approval so they go to school and they get nice report cards, they please their parents, they are forming a sense of responsibility through approval and if

you withhold approval it is a very terrible punishment which is why you don't have to smack children, you just have to withhold approval and you will mortify them but it doesn't work with a conduct disorder because if you don't approve of what they do, they don't give a shit, you know they don't care and they are rude to the teacher and they don't care if they don't please the teacher etc but should you have something they want, 'I want a new playstation mommy' and mommy says 'no, no, no playstation for you, you haven't done your homework', they can do the homework, they will now be motivated by their self interest to do the homework till they get the playstation, then they stop doing the homework. So they can perceive social interactions quite well but they are only motivated to be reciprocal and to play ball if there is self interest. That is where it goes wrong however, I have already said to you that they can't mentalize very well at the end of the day, they can sustain that in short term limited superficial ways but put them in a marriage, a relationship, they cannot sustain faked interest in a long term way, they can't do it because they really don't have a sense of what the other person needs and they have no motivation to find out. What for? So it is mentalization and attachment that plays a role.

Similarities and Differences:

In your opinion, are there any similarities between AS and CD?

No. They are two different animals

What, in your opinion, are the conceptual similarities between these two disorders?

- **In relation to attachment?**
- **In relation to mentalization abilities?**

I don't think there are any similarities at all. One is a disorder of attachment and usually some genetic predisposition and functional neglect and abuse, and the other one is a neurodevelopmental disorder. I think because they are superficially perceived by some to be people who don't relate well, or people who don't form reciprocal relationships or people who don't attach properly because some people have some superficial, preconceived ideas and they might confuse them but it is nonsense they are not the same thing.

What, in your opinion, are the diagnostic similarities between these two disorders?

No, none at all but you see people might disagree because a popular feeling is that most people will tell you that Asperger's is an incapacity to relate, that is what they will tell you and it is not true, it is an incapacity to relate appropriately. They do relate, just in a weird way you see but you need to know them very well and that is where you are going to find you are going to get contradictory information in your research because it is going to depend on how well people know them and if you speak to people who know them well, they are going to tell you they are not the same. If you speak to people who don't know them very well they are going to say 'oh yes they are very similar'. Often in the research they are lumped together as 'empathic disorders' and that is because research is done by researchers and clinical work is done by clinicians and the clinicians are too busy to do the research and the research is done on clinical work, so they talk rubbish. You know there is that gap always and you will find it with...there is lots of research saying 'how do you tell the difference between a child who is bipolar and a child who is ADHD'

because they are both hyperactive and they are both...it is such rubbish, if you have sat in a clinic and you have seen the two, you will know that you will never confuse them ever. There are piles of research saying if you compare this variable with that variable because they are playing with numbers and concepts but the minute you have the person in the room, you will never make that mistake and it is the same problem, researchers are looking at constructs but I am not knocking researchers, we need them, but they don't have the clinical feel and what happens is they do say they are disorders of empathy and they are not. Asperger's will want to empathize but won't know how to show it, where as with a psychopath they won't want to empathize and can't. So you will say to the Asperger's 'look you are being rude now because I am tired and I need to rest', 'ah I am sorry I didn't realize' which is a very different response to a psychopath who will say 'don't give me cheek woman' and then hit the wife for saying it, you see. Interesting... An Asperger's needs to be attached to empathize but they don't really empathize, they want to empathize but they don't know how to do it, so if you correct them, they modify but they do struggle with empathy but it is a completely different animal. I am not talking about an unbonded one; an unbonded one is unbonded and do not attach and battle to empathize.

In your opinion, are there any differences between AS and CD?

Yes, they are different animals.

What, in your opinion, are the conceptual differences between these two disorders?

- **In relation to attachment?**
- **In relation to mentalization abilities?**

The primary difference is a neurodevelopmental difference, the one's brain doesn't work properly and that manifests in other kinds of complications and difficulties but you can get...you can't say the primary difference between an Asperger's and a conduct disorder is their attachment because you get unattached Asperger's just as you get unattached conduct disorders, so that cannot be a differentiating construct. The same will apply with mentalization and you will get impaired mentalization in both so you can't use them as a discriminating variable. The primary difference is the one is a neurodevelopmental disorder; the one's brain construction is different.

What, in your opinion, are the diagnostic differences between these two disorders?

They are completely different animals; that is what is going on. The fact is you can get an Asperger's who is not attached just as you can a conduct disorder but of course by definition conduct disorders have an attachment impairment but you can get Asperger's who are attached or not attached and they will then have the kinds of problems that people who are unattached have.

Dual Diagnosis:

In your opinion are AS and CD mutually exclusive disorders or can they be co-morbid? Why?

They can be co-morbid, absolutely. They are mutually exclusive, they are two separate disorders and as in everything in psychology and psychiatry, they can be co-morbid.

In your opinion, when behavioural difficulties are present in individuals with AS, would one consider such symptoms as characteristic of the disorder or possibly existing as a result of comorbid pathology? Please explain.

Both you will get people with Asperger's who are clearly ADHD. You will get people with Asperger's who clearly have a mood disorder. You will get Asperger's with OCD. You will get Asperger's with conduct disorder. You get Asperger's with learning problems. You get Asperger's with social phobias. You get Asperger's and the whole catastrophe but Asperger's in themselves because of their problems have their own problems and that can be a function of their own 'Aspergerishness'. So of course you get both.

Given your understanding and experience, is a dual diagnosis of AS and CD possible?

Yes definitely.

- **Theoretically, how would you justify your opinion?**

- o **In relation to attachment?**
- o **In relation to mentalization?**

Well I would say that for an Asperger's person to have conduct disorder, they would have had to have had an impaired attachment and had to have had the same faulty, dysfunctional family history that conduct disorders have which is usually neglect and abuse which, more the emotional abuse than even the physical abuse, and so if you take an Asperger's and you maltreat them and you disrupt their attachment, you will get an Asperger's with conduct disorder features, that is what you will get. In terms of mentalization, I think the motivation, I think they both have impaired mentalization but in different ways, the problem with the Asperger's is they have very few common sense social cues and if you take away their motivation to try and belong and adapt and adjust because they are attached and want to fit in, if that is taken away because they have been maltreated, they develop that lack of motivation you get in conduct disorder, then you end up with somebody who won't mentalize at all and that is somebody who doesn't see the point of fitting with society and you end up with somebody who is extremely difficult to modify and somebody that doesn't fit into society and somebody you can't control and you end up with something that is very, very, very scary.

- **If dual diagnosis is possible:**

- o **How would this child evidence attachment when, and if present?**
- o **How would this child evidence mentalization abilities when, and if present?**

If an Asperger's child doesn't attach they can manifest similar behaviours to children with conduct disorder, a carbon copy and they are a very dangerous animal in deed, very, very dangerous in deed because they are violent and terrifying. When you get an Asperger's child showing...what is dangerous with an Asperger's is that they are literal, ok we haven't mentioned that but they are literal so the joke is if you say to them 'stop pulling my leg' they will say 'I haven't touched your leg'. That kind of thing but what happens with that is if I say to you 'look you can't put your fish tank in my lounge' and you have Asperger's and say 'why not, I like it in the lounge' and you say 'well look, this is your toy and your toys belong in your room' and they don't see the social significance that their toy should stay in their room where most people would and see that it is not

appropriate to bring it into the lounge. Now if that person with Asperger's is also conduct disorder and is aggressive and impatient and impulsive now when you say to your Asperger's without conduct disorder 'look sweetheart you must take this and put it back in your room' they will be upset and distressed but they will take it back to their room. If they have conduct disorder features they will not conform and they may actually choose to assault you for irritating them so now you end up with somebody who is quite dangerous and Asperger's with conduct disorder is dangerous because their filtering capacity about what is socially appropriate are not there. So a conduct disorder might still conform in certain ways because they know if they go that far, they will go to jail where as an Asperger's won't realize if they go that far they will go to jail. So I think an Asperger's with conduct disorder is very dangerous animal in deed, I think they are extremely dangerous and there is a lot of evidence that they are over represented in jail. A lot of evidence and they are scary, they are very scary because there are no breaks and there is no capacity to read social appropriateness and of course usually they have this great motivation to learn or try but there is nothing. That makes them very dangerous but it is not a popular idea and you need to be very careful. The Autism and Asperger's lobbies are one of the most powerful lobbies in the world. The reasons I think and it is my personal opinion is because they are run by very functional parents. Usually people with psychiatric diagnoses have dysfunctional relatives so their lobbies are not strong but the Autism and Asperger's are very strong because their parents are usually high functioning. They have a neurodevelopmental disorder, they are not dysfunctional families so they are among one of the most powerful lobbies in the world. Their conferences are among the best run, they are hugely well founded and they have a big thing about not having prejudice against Asperger's and not having negative features against Asperger's and giving Asperger's equal opportunity. I presented my paper saying you can get an antisocial Asperger's, I was treading a very fine line which is not news they want to hear so you need to and when you say there isn't much written about it I would imagine there isn't going to be much written about it because it is not going to get the kind of support you hope.

- **What contributes to a dual diagnosis in some individuals?**
 - If you have a dual diagnosis, you will have impaired attachment and you will have the factors that breed a conduct disorder which will be in the background of that Asperger's. That will be neglect and abuse, dysfunctional families and that of course automatically disrupts attachment.
- **Is a dual diagnosis adequately explained using theoretical concepts such as attachment theory and the theory of mentalization?**
- Yes because it would be linked to their attachment bearing in mind that Asperger's is a neurodevelopmental disorder.
 - **What else could account for such a diagnosis?**
 - Nothing
 - **Any influencing factors?**
 - No there wouldn't be, you can't get a psychopath out of nothing. No it isn't possible but you can get an Asperger's whose not a conduct disorder in any way but you can get them

being aggressive because if you stress an Asperger's they do slap. It is one of the reasons they get put in jail or get fined is because they get stressed out and they can be impulsive and hit but they don't beat you to a pulp or kill you or stab you but they can hit out in frustration but there won't be the manipulation, stealing, lying, all those things aren't there so you know it's not a conduct disorder but they do have poor impulse control around their tempers. You stress them, they can be aggressive but you would never confuse that with a conduct disorder, it is obviously not one.

What is the possibility of misdiagnosing AS as CD?

None, unless you are a twit.

Can you elaborate on whether or not each of the disorders are able to empathize or sympathize?

Ya I think that the conduct disorders actually can empathize and choose not to and I think they have got big problems with sympathy but that is because I think empathy can, you can get away with a lot of mimicking behaviours that look like empathy so in a way I think it is a fake empathy if you like. The Asperger's genuinely doesn't get it, doesn't get the picture but is concerned and wants to, which means there is a sort of informative empathy going on there that you can try and build on.

Research Interview Participant 5:

Profession: Psychologist

General:

What experience do you have in the field of Conduct Disorder (CD) and Asperger's Syndrome (AS)?

Well working at the unit here, we have quite a large amount of experience we get a lot of conduct disorders coming in so and in terms of Asperger's I think this is one of the specialist units in terms of Asperger's and Autism. We get a lot of autistic children coming in so I am involved in terms of assessing them and looking for placements, counselling parents, and sometimes family therapy in relation to them. You know conduct disorder the same, working with families, assessing the children, placement so you know I am quite experienced in it.

What kind of clinical setting do you work in?

Well it is a child and family psychiatric unit and it deals with children from birth to seventeen years old looking at children with emotional, behavioural and psychiatric problems.

Are you psychodynamic in orientation?

Ya, relatively...I am.

When you refer to a child, what 'age group' are you referring to and why?

Well in this unit we deal with children between naught and seventeen and then at eighteen they go onto the adult clinic. I would distinguish between child and adolescent. I mean I suppose child would go up to about twelve and then from twelve to sort of early twenties would be the adolescent period and I mean we base that in terms of developmental issues being negotiated at those times.

What theoretical explanations do you draw on to understand children with AS and CD?

I think in terms of well both of them I think the primary diagnosis in the unit would be based on the DSM-IV symptoms, you know if they are displaying the symptoms so the DSM-IV medical model would be one and then more, you know from a more psychological perspective I think conduct disorder, I would draw heavily on attachment theory you know. I think in the unit we see quite a strong connection between attachment impairment which then affects empathy, reciprocity and those sorts of factors and then the emergence of conduct disorder. I mean underlying conduct disorder I would imagine is the inability to empathize with others, to not desire to conform socially, that they haven't formed a connection with the mother and thereby their behaviour...you know if you attach to your mom your behaviour will be motivated by your desire to please and the loving relationship with your mom you will internalize those values...where as if there has been an impairment in attachment you motivated sort of by you don't have that desire to please and your capacity to empathize is impaired. In terms of autism and Asperger's, I see it as, you know obviously I would see conduct disorder having it's origin in attachment problems where as I think in autism or Asperger's there is more a

neurological/biological base you know, that there is some kind of brain dysfunction but I think where the attachment comes in, obviously the autistic or Asperger's child's relationship or ability to connect with the parents is filtered through possible difficulties with socialization, attachment and that kind of thing. Obviously the child's capacity for mentalization and understanding the other's point of views or so is impaired.

How accustomed are you to drawing on attachment theory and the theory of mentalization? In relation to children with AS and CD?

I think attachment there's...I think attachment is quite fundamental to our understanding of children in all different spheres, different illnesses, the effects, so I think it is quite fundamental. I think mentalization is a more a recent development but I think it...my understanding in a way builds on attachment theory it sort of expands on aspects of attachment theory and what happens when there isn't attachment.

- **If alternate theory:**

- o **Can you elaborate on this understanding?**
- o **How does this theory help you understand these children?**

(Not applicable)

Asperger's Syndrome:

How do you understand AS in terms of attachment theory?

Look I think it is something quite fundamental that you are looking at but I don't see attachment difficulties as causing Autism or Asperger's. I think it is more neurologically or biologically based but I think the child's difficulties, I mean attachment is reciprocal you know the mother's sensitivity to the child and the child's ability to respond to the mother, so I think obviously with an Autistic child or a child with Asperger's or I suppose with most children with disabilities it is likely to impact on the attachment process in terms of the child being less able to respond to the mother, the mother possibly feeling rejected and so on I think it complicates the attachment process.

How do AS children evidence attachment when, and if it is present?

Look I do think in terms of the children we see in the unit I do think an Asperger's child has the capacity for attachment to the parents I mean you can see obviously although there are difficulties, you can see that certain children, Asperger's children are capable of forming an attachment to the parent and some are more attached to the parents than others and I think in terms of things like help seeking behaviour you will notice it. I think when there isn't an attachment I think you will start getting more behavioural problems although you are likely to have behavioural problems for different reasons I think when the attachment is impaired you start getting more severe behaviour problems in an Asperger's child.

- **In your experience when, if so, does attachment develop in these children?**
- It's hard to say but you can see it in some children, it just...you know is seen differently...
- **Do these children seem to attach to people?**
- Yes

How do you understand AS in terms of mentalization?

I think that Asperger's children do have difficulties in their capacity for mentalization. I think that they do struggle in terms of the whole Theory of Mind sort of thing. They struggle to understand and you know they are quite egocentric so they struggle to understand what another person might be thinking or how another person might be feeling. So ya I think there is a fundamental difficulty with mentalization. I do think they are able to show the ability as they develop but I think it is linked to their IQ. Well Asperger's by definition are more high functioning than your autistic child, but I think the higher the IQ the more capacity they have to learn how to see things from another's perspective rather than it being more innate.

How do AS children evidence the ability to mentalize, when and if this ability is present?

- **If clinicians feel these children don't mentalize:**
 - o **How do you understand their impoverished ability to mentalize theoretically speaking?**
 - o I understand it more from, I know it is a psychological process but I think I understand it more from in terms of that their brain functions differently from other people and so I understand it as being linked to brain malfunction.
- **If clinicians feel these children can mentalize:**
 - o **How do you understand their ability to mentalize, theoretically speaking?**
 - o *(Not applicable)*

Conduct Disorder:**How do you understand CD in terms of attachment theory?**

I see with conduct disorder, I mean basically there's a lack of attachment that the child doesn't form a secure attachment with the parent. They become very self sufficient you know to get their own needs met, that kind of thing. You know sort of from that, the feelings of deprivation emerge, anger at the deprivation, rage and there is not that desire to please an attachment figure because there is that lack of attachment.

How do CD children evidence attachment when, and if it is present?

Well I suppose you get a spectrum, a degree of attachment, it would be along a spectrum so some conduct disorder children may be more attached than others. I think it is on a spectrum, I don't think it is one distinct entity kind of thing but I think conduct disorder children form more superficial attachments driven on...ya so it is not really an attachment because it is quite superficial but I mean I think they will connect with other people, develop relationships based on the motivation to get their needs met so it will be on a much more superficial level, it won't be consistent and it won't be ongoing and there is not this reciprocity you know like if they are getting their needs met they likely to continue in the relationship but when demands are made on them to meet other people's needs, the relationship is likely to be undermined.

- **In your experience when, if so, does attachment develop in these children?**

- *(Look above)*
- **Do these children seem to attach to people?**
- Some do, as I said I think it is on a spectrum

How do you understand CD in terms of mentalization?

I think if you compare conduct disorder and Asperger's they both do have, you know there are difficulties with the capacity to mentalize but I think they are slightly different in nature because I think the Asperger's child is sort of unable to understand things from another's perspective and I think the conduct disorder child can be more manipulative and those sort of things so there is an ability to read other people's minds but I think a lack of desire to please the other person. So there is a capacity to read another person's mind or understand another person's mind but there is not the desire to, there is a coldness so it doesn't...their capacity to understand somebody won't be used in order to relate to that person or promote a relationship to that person it will be more used in terms of getting their own needs met.

How do CD children evidence the ability to mentalize, when and if this ability is present?

- **If clinicians feel these children don't mentalize:**
 - o **How do you understand their impoverished ability to mentalize, theoretically speaking?**
 - o Well I suppose mentalization in psychological terms is a concept that explains a person's capacity to form relationships, for reciprocity, to empathize with other people, to sort of put yourself in that person's shoes and understand how they might be feeling, and to understand their behaviour, so it is a concept that would foster relationships but I do think that the conduct disorders...I suppose mentalization should promote empathy but in conduct disorder, I think there is the lack of empathy, it is diminished because they might have the capacity to understand the other person's behaviour or what they are thinking but there is a lack of capacity to feel much about that, to let to allow another person's feelings to influence their behaviour and the decisions that they make. I mean I think it is fundamentally linked to attachment because in attachment you, I mean the sort of role attachment forms is for the child to feel safe in the world, to be close to the parent figure, for the parent figure to respond to them, have their needs met, and you know then a gradual not getting needs met in order for a child to be able to develop their own capacity and so I think with conduct disorder that the impairment in mentalization is linked to the fact that they haven't had a space where their needs were met so their capacity to see relationships as being useful and desirable is impaired. They learn to rely on themselves more, they learn that sort of survival of the fittest, that kind of ethic that you need to look after yourself and so I suppose it is linked to the sense of if you are securely attached and you have had a person who is caring for you, you then have the capacity to reenact that in your relationships with other people the

capacity to care for them, take their feelings into consideration where as with a conduct disorder you might be able to understand how somebody else is feeling but because your feelings haven't really been taken into consideration, you lack the capacity to respond to that and the desire to respond to that.

- **If clinicians feel these children can mentalize:**
 - o **How do you understand their ability to mentalize, theoretically speaking?**
 - o *(Not applicable)*
- **In relation to attachment theory and mentalization, how do you understand a CD child's ability to manipulate?**

I think that it is very linked to mentalization because they do have the capacity to read another person's mind but they lack the empathy to make that meaningful in terms of relationships so I think manipulation is based on getting your own needs met. You manipulate somebody, you find the best possible way you can to get your needs met and there's a sort of a lack of concern for the feelings of the other or the impact of your behaviour...that your behaviour has on the other. So I think the conduct disorder, their mentalization capacity, the impairment is linked to the lack of concern so that is how I understand manipulation that you driven to get your own needs met and you will use whatever means at your disposal without concern for the other.

Similarities and Differences:

In your opinion, are there any similarities between AS and CD?

Ya I think there are but I mean I think they are very different but I do think...

What, in your opinion, are the conceptual similarities between these two disorders?

- **In relation to attachment?**
- **In relation to mentalization abilities?**

Look I think that, as I say the mentalization, I mean with both there is a fundamental difficulty in that capacity for complete or whole mentalization. With Asperger's I would understand it more as not being able to understand another person's feelings so that would then impact on their ability to relate whereas the conduct disorder does have more of a capacity to understand another person's feelings but they are less...the feelings are not meaningful, there is a lack of concern. I think with the attachment, in a conduct disorder there is far more of a fundamental impairment in attachment where as I think because of the Asperger's child's difficulties with social interaction, it will obviously impact on the attachment process but I don't think there is as fundamental a breach in the attachment process.

What, in your opinion, are the diagnostic similarities between these two disorders?

Ya I do think there are diagnostic similarities. First of all I mean, it is not conduct disorder but when you get a Asperger's or an autistic child one of the primary differentiating diagnoses is oppositional defiant disorder which then may or may not lead on to conduct disorder but you going to get that same difficult behaviour. You know like there is a temper tantrum about this and about that, so those behavioural flare ups and

struggles with parents over various issues are very, very similar but then you need to tease out where it is coming from, you know what I mean. I do think in autistic or Asperger's children you can get also like a sort of...quite disturbing behaviour. The child might hurt an animal, hurt another person or whatever so the picture might look the same but then you need to see where the motivation is coming from so ya I think there are diagnostic similarities and I think you need to get a much more detailed understanding of the particular case in order to be able to say whether this is conduct disorder or Asperger's. I think Asperger's people are likely to run into problems with the law because they will do things that they don't understand are incorrect. They are likely to have problems in relationships as the conduct disorder person has. At school they are likely to have peer interaction problems so yes there are a lot of similarities.

In your opinion, are there any differences between AS and CD?

Yes, I think so...

What, in your opinion, are the conceptual differences between these two disorders?

- **In relation to attachment?**
- **In relation to mentalization abilities?**
- I think we have sort of gone through that so yes (*look above at similarities questions, the participant highlighted the differences in that question*)

What, in your opinion, are the diagnostic differences between these two disorders?

Ya I think that just fundamentally in terms of Asperger's there's often...but actually it is also a similarity because in conduct disorder you often get lowered verbal functioning. You know it is often associated with the low verbal ability and autism or Asperger's is also often associated but I think the impairment in verbal capacity is more severe in Asperger's children than conduct disorder so in the way it is a bit of a similarity but also a difference. I think in Asperger's children, in terms of behaviours and rituals and you know sort of obsessive features and preoccupations with that kind of thing, I mean you might...in conduct disorder, you are not going to get that, they might have co-morbid disorders that then bring those in, but I don't think it is central to the conduct disorder as it would be to Asperger's. I think in obviously in Asperger's in terms of diagnosis, it isn't a diagnostic feature but you need to look at history of autism or Asperger's in the family, genetic loading and that kind of thing and you know in conduct disorder I think you are also going to be looking at or what is also going to be informing your decision is pathological family functioning as well, that is also very much a picture of conduct disorder that they come from chaotic dysfunctional families whereas Asperger's children generally, well the one's we encounter here, tend to be more functional than conduct disorder families. Conduct disorder is linked to pathological family functioning where you get problems with attachment and that kind of thing where as with Asperger's the child is born with a disability so it is not the family that is creating the disability so they are likely to be, on the whole they have a better chance of being higher functioning.

Dual Diagnosis:

In your opinion are AS and CD mutually exclusive disorders or can they be co-morbid? Why?

I think they can be co-morbid, I do think so but they are different, you can get co-morbidity but they are different so I think you can get an Asperger's who doesn't have an attachment and has a pathological relationship with the mother and that kind of thing...you know what I mean so if you get an Asperger's child who's got a conduct disorder on top of it, it is a very worrying child because their capacity for understanding is very impaired so if their, like the conduct disordered child, their capacity for concern is diminished whereas in Asperger's children, the capacity for concern or the wish to do the right thing is impaired yes, I don't think I am explaining but yes I do think so.

In your opinion, when behavioural difficulties are present in individuals with AS, would one consider such symptoms as characteristic of the disorder or possibly existing as a result of comorbid pathology? Please explain.

No I don't think it needs to be a co-morbid diagnosis because the Asperger's child has a fundamental difficulty processing social interactions and understanding and they do and are at risk for engaging in behaviour that is conduct disordered where they might run into problems with authority figures, the law and so on but the in a proper Asperger's child the sort of origin or the cause of the behaviour would be different so the...no I don't think conduct disordered behaviour central to a diagnosis of Asperger's you know what I mean, you don't diagnosis them on the basis that there are behaviour problems but I do think they tend to go hand in hand if the teacher is saying the child is biting this one or hitting this one and then as a teenager they are going to be inappropriately approaching girls because they don't have the skills to do it appropriately so I do think it goes hand in hand but I don't think you have to have that behaviour for a diagnosis but I think it is likely to happen.

Given your understanding and experience, is a dual diagnosis of AS and CD possible?

- **Theoretically, how would you justify your opinion?**
 - o **In relation to attachment?**
 - o **In relation to mentalization?**

I do think it is possible and you know in terms of theoretically understanding Asperger's and conduct disorder you sort of look at it in terms of how I would understand conduct disorder and Asperger's theoretically but I think there can be an interplay because obviously the Asperger's child's capacity for attachment is at risk so they sort of more vulnerable for developing attachment difficulties and then more vulnerable for developing into the end results of attachment difficulties. I mean I think you do the same frameworks you would normally use to understand each independently but you would have to look at the way in which the Asperger's its self impacted on vulnerability and so.

- **If dual diagnosis is possible:**
 - o **How would this child evidence attachment and mentalization abilities when, and if present?**

- I mean I think their capacity for attachment would be severely, severely impaired. I mean I think you are going to get a highly problematic child. I think that their capacity for attachment is going to be very impaired but I do think that with an Asperger's person, they escape functioning independently whereas a conduct disorder child has the awareness to go out and get a job when they grow up so I think the Asperger's is less capable of functioning independently so they are going to be more reliant on other people and also their capacity to manipulate is going to be less I would imagine than a conduct disorder's capacity to manipulate. I think again you might get some superficial attachments based on the meeting on the needs.
- **What contributes to a dual diagnosis in some individuals?**
- I think the fundamental contributing factor is the attachment process I mean I think conduct disorder is linked to impaired attachment. I don't think Asperger's is causally linked to impaired attachment but I would look at attachment theory as explaining both and how the Asperger's child's attachment process is more vulnerable, as you would get in any child with a disability like a mentally retarded child, a deaf child or whatever. The attachment process is more at risk because they place more stress on the parents and I think an Asperger's child is a stressful child to have. I mean you are always running into problems and difficulties and I think the parents...I mean I think the joy they give the parents is less than a normal child and their capacity to respond to the parent is less so I would look at it through the attachment lens.

What is the possibility of misdiagnosing AS as CD?

- If so, why do you think this happens?

I think that there is the possibility but what I want to say out in probably adult psychiatric units you can probably get that. I mean child psychiatric units are more tuned into Asperger's and picking up on Asperger's and that kind of thing where as I don't think they are in adult units so I think you could get somebody who is seen as conduct disorder who might actually be Asperger's and misdiagnosed. In terms of other agencies like police and society at large, I think the Asperger's is not going to be well understood and although they aren't being diagnosed there, I do think they are easily going to be understood in the lay population as being troublemakers, difficult. I think we actually had a case in this unit, a boy who was seen as having a dual diagnosis and he was referred to UNICA and I mean he was quite high functioning and he was Asperger's but he was extremely violent towards his parents, would attack his mom and he cracked her skull and broke her arm and that kind of thing but I think at the time we understood this as not just Asperger's, there was a conduct disorder element to it as well but ya I think in a unit like ours, we are going to tease out the difference but I think sort of that this is one of the centers where Asperger's and Autism is diagnosed. I think as I said to you, Asperger's and ODD, the differential diagnosis so I think there is quite a high possibility of misdiagnosing.

Can you elaborate on whether or not each of the disorders are able to empathize or sympathize?

I think the conduct disorder has the capacity to empathize but not sympathize but for me the term empathize carries with it the implication of sympathy as well so I think the conduct disorder can mentalize, put it that way, but not sympathize. I struggle to use the word empathize with conduct disorder whereas I think the Asperger's child has a struggle with the capacity to empathize but I do think they are driven by the desire to do the right thing whereas I don't think a conduct disorder is driven by that. The Asperger's child gets upset when their routine is disturbed because it is not the right thing and I do think they have the desire to do the right thing whereas I don't think the conduct disorder does. So I would say the conduct disorder is unable to sympathize or unable to care about what he understands or to have emotional meaning for him whereas I think the Asperger's child, they do have the capacity for it to have some sort of emotional meaning in the sense of desire to please but they struggle to understand what it is the other person is thinking or how they are supposed to respond to it.

Research Interview Participant 6:

Professional: Psychiatrist

General:

What experience do you have in the field of Conduct Disorder (CD) and Asperger's Syndrome (AS)?

I've been a child psychiatrist for twelve years. I've worked in most of the Government academic units in Johannesburg and I have seen a significant amount of Conduct Disorders, a smaller amount of Asperger's, not so much in my current unit but at places like TMI you see more, I have seen more. I also run a private practice, it's a part time private practice in which I am seeing a broader referral base and there I have been seeing Asperger's disorder and plenty of conduct disorders. I would say my experience is broader in Conduct disorder and more in CD than it is in AS. I also think that as you become more experienced you start to pick up and become more aware of Autism Spectrum Disorders full stop so it is something that I think perhaps has come more over the last couple of years.

Are you psychodynamic in orientation?

I would say so, ya.

What kind of clinical setting do you work in?

I work in a Government outpatient child psychiatry clinic. That's what I do five days a week and I run an inpatient unit for children under the age of thirteen and see inpatient adolescents as well and then my private practice is purely outpatient.

When you refer to a child, what 'age group' are you referring to and why?

When I refer to a child I am referring to anybody between the age of naught and seventeen. Sometimes I would be referring to somebody over the age of thirteen. I think one has to differentiate depending on what you are talking about. So I think you have to qualify it. But generally if I am talking about children I am talking up to the age of seventeen.

What theoretical explanations do you draw on to understand children with AS and CD?

I would say with CD I would fundamentally conceptualise it as a behaviour disorder as well one of the disruptive behaviour disorders which is characterized by a whole range of unacceptable behaviours which occur out of the realm of what can be considered normal. I think a lot of the behaviours that we see in conduct are seen in most children but they are occurring more consistently, they are not responsive to consequence and learning in the same way that they are in children who are not conduct disordered. In my conduct disorder children it is the fact that they are often very recidivistic, they don't respond to intervention and lack remorse for their actions and it is a disorder that develops over time so it changes in its dimensions over time. Also my most important conceptualization of conduct is that it doesn't occur alone, it occurs in combination with other disorders so it is never clean. It occurs in combination with ADHD, particularly in combination with mental handicap and with pretty much most of the Axis one diagnoses, often as a

consequence or in association with very poor parenting structures. Asperger's I would see as a disorder, a pervasive developmental disorder which is a disorder characterized primarily as children that are different, children that have a different way of interacting at a verbal level and a different way of understanding other people's interactions. It is about interaction, it's about understanding, it's about insight, it's about capacity to connect and that they can be quite high functional sometimes but quite dysfunctional in social realms.

How accustomed are you to drawing on attachment theory and the theory of mentalization in relation to children with AS and CD?

I am extremely used to drawing on attachment for conduct because the majority of attachments we see are conduct disorders. I think the whole basis of not being attached not trusting; not having the concept of other people's emotions, not developing empathy links the two conditions quite strongly. My experience in terms of attachment and the development of an attachment disorder and Asperger's is not something that I have really considered although obviously they are running parallel. My sense is the Asperger's child struggles to attach because there is something innate to the Asperger's child where as the child who is resenting with an attachment disorder primarily is not attaching because the caregiver does not facilitate attachment then the child doesn't learn to attach. I mean that has been my practical experience.

Asperger's Syndrome:

How do you understand AS in terms of attachment theory?

I must say all the Asperger's I have seen have been attached to a point but a lot of the Autist's I have seen have also been attached to a point. I think that they attach at some level but the object of their attachment is always aware that there is something missing in that attachment because there is just not the same level of reciprocal understanding. It is the reciprocity and they are not always aware of the rules of interaction. I think they attach at a level but I don't think they have the capacity to attach at other levels primarily because of who they are because my experience in the cases that I have had, have been cases where I have spent a lot of time with the parents and with parents who have other children to whom they had attached and this is just the one child who veered off and didn't attach. Whereas my attachment disorders, there'll be three children, all attachment disorders in the family.

How do AS children evidence attachment when, and if it is present?

I think they learn how to do it but they do it on their own terms when they choose to. They won't necessarily do it in settings where you would expect them to do it. They do actually...and they can show affection and they can miss the caregiver and they can have anxiety around the caregiver. I also think, I really believe there are relative degrees so you can have a degree to which you are socially un-disconnected or connected to point. I also think and this is more from my experience with autistic children is that they seem to develop the capacity to attach to one or two people appropriately so the primary caregiver, they can often develop some appropriate attachment to, where as they wouldn't develop it to anybody else.

In your experience when, if so, does attachment develop in these children?

According to the theory it should develop in about the first two years generally with other children...well if one looks at the other end of the autistic spectrum, the autistic they do, the mother's report that they make eye contact, that they respond and then when they get to about two or whatever they start to lose it...there is something in the essence of development where this happens, but it doesn't develop beyond a point rather than it goes away and I think all the Asperger's I have seen have been attached to a point but that is a clinical observation.

Do these children seem to attach to people?

Yes but I think it is the quality of attachment, it is not normal attachment and as I said it wouldn't be considered by the caregiver to be adequate attachment, something is wrong, something is odd, something doesn't quite add up and I don't know...I think the difference will also come in how the person experiences the attachment, how the kiddie with Asperger's actually experiences the attachment that they have. I also do think that it is quite difficult when you are assessing this kind of thing because you are doing it from the point of view of the caregiver who desperately wants their child to attach, who sees attachment and I really have seen this you know 'picked my kid up from school and my kid did this, this and this and what would be appropriate, what would not be appropriate or some days he does it, some days he doesn't do it' and I think that you know when you are working in an outpatient setting you are dependent on caregiver report and that can be biased.

How do you understand AS in terms of mentalization?

I think in some ways children with Asperger's have a more acute sense of being separate and being different, being not different, being separate, being independent from the caregiver. I think it is almost that that's what is actually quite disturbing to the caregiver is that that separation occurs so yes I think it does occur but I think it occurs...I think that everything that is occurring at that point in terms of attachment to caregivers and things like that is occurring in a slightly aberrant way so it is just an aberrant form, that is not a very good answer but that is as close as I can come to that one.

How do AS children evidence the ability to mentalize, when and if this ability is present?

To a point, I think that is what differentiates them I don't think that they significantly understand that there is a view point other than theirs which is why they go through life functioning as if theirs is the view point. I do think there are degrees I think it is very difficult to teach it; I think it is very difficult to learn it. I think that if you look at older kids they do learn things but I don't know if they learn it because they believe it; I think they learn it because they have to in order to fit in.

- *{If clinicians feel these children don't mentalize:*
 - o *How do you understand their impoverished ability to mentalize theoretically speaking?*
- *If clinicians feel these children can mentalize:*
 - o *How do you understand their ability to mentalize, theoretically speaking?} (Didn't ask)*

Conduct Disorder:

How do you understand CD in terms of attachment theory?

I think that first of all being unattached predisposes you to conduct disorder because attachment gives you the capacity not only to trust but to feel the feelings of others. So attachment is protective in terms of the development of conduct but I also believe there is a genetic component to conduct so it is going to run...and I have seen a large number of attached conducts who can be attached to certain caregivers but not generalize the empathy, because it is fundamentally empathy, not generalize it out to others on whom they are not dependent. I think my sense from the children that I see in my clinic here is that the attachment, the disorder of attachment comes first, it really...it comes early, really early and one sees it developing, one sees it with it's other associated co-morbidity and the conduct is something that develops over time, it emerges gradually and often, in one of the cases that I have seen very recently, the attachment actually becomes worse, as the conduct disorder became more prominent, the separation from the attachment that there was to the primary caregiver actually became a problem. I don't think that all attachment disorders have conduct. I think it really depends on the context in which you grow up with attachment disorder. I think if you are protected in some respects and I do think that there is a kind of ongoing impact on attachment, that attachment happens in the first couple of years but there are other things that feed it you know later up till about the age of six in terms of the child's experiences. That is definitely what we see here but that is also the time at which the comorbidity is coming out. It is a very difficult issue, the 'attachment-conduct' thing; it is just my experience that conducts can attach to their primary caregivers.

How do CD children evidence attachment when, and if it is present?

I think they attach to primary caregivers, caregivers whom they need, caregivers or people on whom they depend. I think it may be apparent through demonstrations of affection and anxiety at the absence of the person and I think being very aware that you are dealing with comorbidity so you may have anxiety as well and that the child is aware that they need people, that they are connected to people. They are not as aware of their role in maintaining a relationship which means they are more likely to be able to maintain relationships with people who are invested in maintaining the relationship with them, the people who are going to give them over and over and over again and that has been my experience with bad conducts but their mom's and dad's love them to bits and they are lovely relationships but it doesn't generalize so...a lot of the time, what relationships there are deteriorate as the conduct disorder progresses as the child alienates themselves and incurs more and more negative input the child alienates themselves from even the primary caregivers who are prepared to forgive them for a long time.

- **In your experience when, if so, does attachment develop in these children?**
- *(Answered above)*
- **Do these children seem to attach to people?**
- *(Answered above)*

How do you understand CD in terms of mentalization?

That is a fundamental deficit of conduct disorder is the appreciation of the feelings of others not so much because you don't know that they have feelings but you don't care that they have got feelings and you can talk to conduct disorders about the feelings of others, about how this one felt hurt but it doesn't affect them, it doesn't bother them, so they are...I think the fundamental deficit is a lack of empathy but it is not the capacity not to, it is just that 'I don't care, I am not bothered about you, so I am not bothered that you have got a bruise or that you are bleeding or that you are dead because I am me, I am on my own'.

I asked: How do you understand their not wanting to care?

It is very difficult because of the two theories around the development of conduct that fundamentally conduct is genetically transmitted. You adopt a child, give them all the love, all the attention from day two and your child develops a conduct disorder and grows up without empathy and I saw it in one child, it was profound, so there is that but then there is also the fact that for the most part children are not grown up in a vacuum, they are growing up in environments which either don't attach or attach conditionally or reject you if you are not completely normal which is what is going to happen with these children.

{How do CD children evidence the ability to mentalize, when and if this ability is present?

- *If clinicians feel these children don't mentalize:*
 - o *How do you understand their impoverished ability to mentalize, theoretically speaking?*
- *If clinicians feel these children can mentalize:*
 - o *How do you understand their ability to mentalize, theoretically speaking?}* (felt she had answered this)

In relation to attachment theory and mentalization, how do you understand a CD child's ability to manipulate?

A conduct disordered child is self-centred, is oriented on their own needs and will manipulate to get what they need because they are primary. They are not interested primarily in the best interests of the other person or in the feelings of the other person and how the feelings of the other person will be affected and it is their pattern of behaviour, their pattern of interaction with the world that you turn a situation to your advantage to work for you because you are the centre and you are not accountable, I mean this is obviously in the worst sense but I mean you are not accountable and you are not accountable for your actions but you are not accountable for the consequences of what you do so you are not accountable for the consequences of your manipulation and therefore they can, they have to manipulate in order to get their own needs met because if they don't they will have to be aware of the needs of others.

Similarities and Differences:

In your opinion, are there any similarities between AS and CD?

Let me answer it fundamentally first...both children with Asperger's and conduct do not interact appropriately in a reciprocal way with other people. Neither of them obeys the rules of social interaction for different reasons but neither obeys the social rules.

What, in your opinion, are the conceptual similarities between these two disorders in relation to attachment and mentalization abilities?

I think conduct disordered children are not...are children who because of dysfunctions in attachment are unable to experience, are unable to care about the person on the other side. Their centre is themselves and they are only interested in their point of view, their needs and getting their needs met at all costs and that is because they lack a fundamental empathy for others so they cannot see, they cannot give up their need in favour of someone else. The Asperger's struggles to interact, to meet...I think Asperger's are attached at some level but they are also self-centred, they are very self-oriented, they live in a world that is predominantly dominated by their own view and their own way of looking at it which is often quite idiosyncratic and it is not very amenable to being modulated and they will tend to act in concordance with their...with what they think without...not in disregard for everybody else but the conduct act in disregard where as the Asperger's acts without an awareness of it. It is a less considered thing. The Asperger's will give you a...I just had an Asperger's the other day...an Asperger's will give you an explanation of why they did what they did. The conduct may lie, the conduct may manipulate but they will not give you a reason, 'I just did it because I did'. Why...with this one (*the Asperger's child*)...'why did you go missing in the garden – because I wanted to go down to the bottom of the garden'...in the middle of the night. They can be quite concrete and quite direct but it is not as a disregard for the emotion of others, it is just not a real awareness that the emotions of others are important. I think on an intellectual level they could probably discuss the emotions of others but it is not important in my space. I need to say that I am really basing this on my experience, these on the patients that I have seen who are or have been very profound, the Asperger's patients, and they have developed over time and they have developed patterns over time and I think one of the things about Asperger's and conduct is both of them can look completely normal. They can come across as completely normal and I think that is why we are missing some of our Asperger's in our schools. It is only when you start to interact and communicate with an Asperger's that you realise that they are in this space and they are not connected to your space emotionally. The conduct may be, when they choose to be but because they can manipulate and because they can choose when it suits them.

What, in your opinion, are the diagnostic similarities between these two disorders?

I think it is really difficult to answer but it does come down to empathy. It does come down to the capacity for empathy for the person who is sitting next to you. The motivation for the lack of empathy is different but fundamentally from a diagnostic point of view it is empathy. I mean they both indulge in unacceptable behaviours. Asperger's don't necessarily indulge in predominantly antisocial behaviours that are designed to hurt, Asperger's behaviours are often odd, they don't make sense where as often with

conduct disorder you can understand that there is a purpose to the behaviour from the point of view of the person that is doing it. The intention is different.

What, in your opinion, are the conceptual and diagnostic differences between these two disorders in relation to attachment and mentalization abilities?

You know what I don't think so, I don't think so. I think they are fundamentally different. I think you can take things out that are common but I really believe that they are fundamentally different. If you look at these, if you spend time with Asperger's kids and you spend time with conducts, except that you dealing with attachment which is going to connect them but fundamentally it is not even coming from the same route, no. My answer is no.

Dual Diagnosis:

In your opinion are AS and CD mutually exclusive disorders or can they be comorbid? Why?

I don't think there is any such thing as a mutually exclusive disorder. I think that because I believe that there are degrees of Asperger's, degrees of contact, it is possible that there could be, I don't think in a full blown Asperger's you won't get conduct but I think because there are degrees I think it is possible that you could get it. I think they are fundamentally different disorders and that whilst they share a commonality, the commonality works differently...they share like they both fundamentally have problems with empathy but it is profoundly different. Look I tell you the reality is I have never seen Asperger's plus Conduct. I have seen cases on autistic spectrum with conduct. If I saw them diagnosed together, I would be very dubious and I would suggest that one look at the other comorbidity first to see if for example if you didn't have a bipolar disorder or something like that which might be affecting the behaviour. I think in theory with a degree of Asperger's it is possible. I wouldn't diagnose it with Asperger's unless and I think it is very difficult to explain...now I have a patient who has about five diagnoses but the one diagnosis is well she has got an attachment disorder, she has got conduct disorder, she is bipolar, she is ADHD and we had a long discussion about whether she was Asperger's because she is very weird and just because she had this odd, inappropriate way of rationalising the behaviour that she did. We subsequently decided that she wasn't Asperger's but the other diagnoses were just too dominant. I don't know how often we get clean cases where you can do that. I don't think that realistically they are diagnoses that would naturally occur together. You know comorbidity is common in psychiatry, you see...you very rarely see one diagnosis you see two or three diagnoses and you get used to seeing the combination picture rather than just the individual diagnosis and I am not sure that I think Asperger's and conduct would work, it is my gut feeling but it is about degree, it is about comorbidity and the other thing is you can make any diagnoses you like today but you need to check that child in a years time because that diagnoses is going to change so whatever you think...I think you have a right as a child psychiatrist, I have a right to write down all the diagnoses that I think might be going on, I can write Asperger's, I can write conduct, and then say 'ok now I am going to watch', so I mean I don't work with fixed diagnoses so I work within a range. I am looking at a bit of this, a bit of this. Over time I'll assess it. What we have seen in the inpatient unit is that these funny children, this kind of child that you might want to call 'conduct

Asperger's is very likely going to turn out to be schizophrenic or bipolar because that is what they look like in the early phases. They have got this iffy non...doesn't fit into anything but there is something wrong with this child profile so I am honestly not telling you something that you would be expecting to hear but that is...what I am saying is that very often we don't work in terms of discreet diagnoses, we work in terms of 'got some features of this, got some features of this, got some features of this' ok, accept that don't necessarily bind them unhelpfully. Treat the symptoms, contain the child and watch the child over a few years and see it resolve itself, it does resolve itself and I would not diagnose Asperger's and conduct disorder together if you need an answer, that would be my answer is that I think it is extremely unlikely that you will see the two of them together but I would be quite happy to write them on the same line in my notes and say particularly with the younger child where so much is undefined and so much is unevolved. I saw a thirteen year old Asperger's who had been emerging since about the age of seven. She had never been diagnosed but she had all sorts of bits and pieces, she had been diagnosed as anxiety, she was diagnosed as all sorts of bits and pieces and when we finally put all the bits and pieces together at the age of thirteen, it was very clear that she was Asperger's. So that is the approach that I am taking in child psychiatry and here I am really talking about children up to the age of thirteen where I look at symptoms and I reconnect them depending where we are going, the child's level of functioning, the child's ability to adapt and the child's ability to learn skills because conduct's reach a point where they don't learn, 'this is my pattern, this is how I do it, I am predictable'. Asperger's reach that point in a different way but they are following a pattern and they are going to follow the pattern although you can teach them certain adaptive aspects of social functioning probably easier than you can teach the conduct but then there's degrees, there's degrees of everything. I am a bit swamped with patients and I am looking at everything as though it is happening today and tomorrow and the next day and then...the short answer to your question is that I do not think that they can occur together.

In your opinion, when behavioural difficulties are present in individuals with AS, would one consider such symptoms as characteristic of the disorder or possibly existing as a result of comorbid pathology? Please explain. (Felt she had answered this and comes up again later)

Given your understanding and experience, is a dual diagnosis of AS and CD possible?

I wouldn't make a dual diagnosis but if you speak to me in two years time I might change my mind based on who I see. I mean I am basing my...I have seen ten years with my children and I have seen ten years of children growing up and I haven't seen it. I have seen Asperger's, I have seen Asperger's with a lot of other comorbidity but never with conduct and I don't see, I just think it is extremely unlikely.

Theoretically, how would you justify your opinion? (I added that if she were to think about it theoretically rather than from her experience of such a diagnosis, whether a dual diagnosis would *theoretically* be possible in relation to the following:)

- In relation to attachment?
- In relation to mentalization?

Even theoretically, no I would say no because I think you have got conduct features that have come from a different place that is how I would conceptualise it, no I wouldn't because they are fundamentally different.

- *{If dual diagnosis is possible:*
 - *Does an overlap occur diagnostically and/or theoretically? How?*
 - *How would this child evidence attachment when, and if present?*
 - *How would this child evidence mentalization abilities when, and if present?*
 - *What contributes to a dual diagnosis in some individuals?*
 - *Is a dual diagnosis adequately explained using theoretical concepts such as attachment theory and the theory of mentalization?*
 - *What else could account for such a diagnosis?*
 - *Any influencing factors?}*

What is the possibility of misdiagnosing AS as CD? If so, why do you think this happens?

It is quite good, it is quite good. I think because they misinterpret other peoples' gestures and their reactions are not understandable, they are seen as inappropriate so you can get things like aggression. You will get behaviours which are fundamentally conduct behaviours which the Asperger's are doing for their own reasons which are not necessarily antisocial so like stealing or they pick something up you know the Asperger's you know, my supervisor would tell me the Asperger's will pick it up because they are hungry so they pick it up and have it you know, and so I think there is a chance that it could be misdiagnosed if you looked at the person purely on a behavioural scale. If you just looked at the actual behaviours, perhaps also not looking at the pattern of behaviours because I think the patterns of behaviour would help you if you didn't have a history and an interview with the child which gave you some idea of their social skills and their social understanding of others. So if your diagnostic parameter, if the way you did it you could make the wrong diagnosis because you could diagnose any condition on criteria but the essence of these diagnoses is not on criteria, it is on the complex as it fits into the person and particularly with Asperger's. It is not about the list but if you look at the conduct disordered features, if you looked at some of them in isolation, yes I think you could.

Can you elaborate on whether or not each of the disorders are able to empathise or sympathize?

Actually that is very difficult. I am just thinking about the last conduct I saw...nothing is total. The conduct disorder feels, they do feel and they, I think they have the capacity to feel in certain situations for certain people. Fundamentally they lack empathy so it would be linked; it is not something that is generalised. It is not something they can use for their benefit in terms of interaction and functioning in the world. I do believe that they have pockets of areas where they can be empathic like to a sibling...or that in conduct it might limit certain behaviours that certain amounts of empathy will limit behaviours for example rape and those kind of behaviours. Asperger's, I just think it's got a different quality all together. I am just thinking of the one's that I have seen. I think they do, I

think it is not an absolute absence; it is just where you use it and how you use it. All Asperger's I have seen had empathy, some of it wasn't very useful empathy but they have a capacity but it is just a dominant way...it doesn't govern their action and their functioning to the same degree but it is not that they are without the capacity to feel for others but that again is purely a clinical observation.

Research Interview Participant 7:

Professional: Psychiatrist

General:

What experience do you have in the field of Conduct Disorder (CD) and Asperger's Syndrome (AS)?

You mean as a combination or as two separate conditions. Well lots, I don't know how specific I can be. I see lots of autistic children and I suppose a minority of them have conduct problems but certainly I have seen a number. I have worked with hundreds of children with conduct disorder.

What kind of clinical setting do you work in?

I've worked with the Asperger's in the autistic school and mostly in child clinics across the board you know in Soweto, Johannesburg, you know various clinics, Alex, here, that's all. I do private practice now and I don't know if I have seen too many of this group there, probably not. Yes I do do private practice but I am not sure I see a lot of...maybe fifty autists but not necessarily conduct disorder.

When you refer to a child, what 'age group' are you referring to and why?

Up to eighteen.

Are you psychodynamic in orientation?

I am a psychiatrist; yes I suppose so up to a point.

What theoretical explanations do you draw on to understand children with AS and CD?

I diagnose the pervasive developmental disorders as a biological condition and conduct disorder as a small genetic input and a large environmental input.

How accustomed are you to drawing on attachment theory and the theory of mentalization?

Very frequent, I mean we regard it as absolutely basic and crucial to everything

- **In relation to children with AS and CD?**
- Both of them, yes. Not Asperger's so much as conduct but it is certainly relevant there.
- *{If alternate theory:*
 - o *Can you elaborate on this understanding?*
 - o *How does this theory help you understand these children?}*

Asperger's Syndrome:

How do you understand AS in terms of attachment theory?

In terms of attachment theory...well they are two unrelated topics. The Asperger's children are quite capable of attaching but they are quite vulnerable to bad parenting and then you do get attachment problems or to parenting where the parent isn't present. I mean all those sorts of things happen as well but they are like other children in respect

that they can attach and if things go wrong then you know there is an attachment disorder as well.

How do AS children evidence attachment when, and if it is present?

Well some of them are very affectionate and show it quite clearly. Some of them get very distressed if the attachment figure is not around, you know that person can contain them and comfort them. Some of them are highly resistant to other people but they will put up with things from their attachment figure that they won't let anybody else do. I suppose it is even the way they talk you know the way they talk about their mother or their father or whatever and we usually get the lack of attachment from the history that the child for some reason or other you know has had an attachment disruption. Quite often it can be something like the parent is depressed or mentally ill or in hospital or sick or absent or the child is left with various caretakers of one sort or another I mean all those sorts of things happen so it is a combination of how the child is, how they react with the parent, and how we watch the continuity of what has happened in that child's life. It depends on the individual and you have to do it separately. You have to take a very good developmental history from day one. You have to observe them together. You have to listen to the parent report and you have to see what the child tells you. I mean they do projectives on some of these children, I don't know how valid they are but I can't answer that you would have to ask a psychologist but some of them are clearly attached and some of them are clearly unattached so there are a whole variety of things that you can assess it on.

In your experience when, if so, does attachment develop in these children?

I don't think we know but I would imagine we think it develops like other children because if the early attachment is disrupted, the attachment does get impaired. You know sometimes these children are autistic because they have had a birth difficulty or an illness or something that has affected their brain and they certainly have attachment problems and that is early on so I presume it is exactly the same as any other child. I mean I think everything is distorted in these children because they have difficulty with incoming perceptual, you know interpreting incoming perceptual stimuli and so everything is confusing for them but attachment is such a very basic thing that they do seem to know who their mother is, you know if there is a good mother.

Do these children seem to attach to people?

They attach to people but they become obsessed with certain objects very often but sometimes those things change. You know it will be a...to give you a ridiculous example...one little boy would not let go of a plastic disk with a pin on it which had been his father's name tag at conference and he carried it around for a year and they had actually gone and bought more because without his tag...but those are self soothing devices, those give the child a sense of security but that is different from attachment. They are different attachments; that is not the same thing. They fixate on certain things and those things have an importance for them and the importance is often that if they are fiddling with that thing they feel calmer and more confident or if they have got it they feel better and it is because the world is often confusing and bewildering for them but this is not the same as attachment to a person at all and you can have a child who is attached

or unattached who will fixate on certain objects. So yes they can attach to people. However it depends on who you are talking about because a severe autistic doesn't connect with anyone so how do we know if they are attached or not because we don't have a clue but Asperger's do seem to attach. I had one kid who was very clever, he drew his mom a birthday card or maybe it was a mother's day card, and his obsession was fish and he drew very detailed fish and on his mother's day card was a white shark with the mouth open and all the teeth and she cried and cried but he had chosen what he thought was a nice picture and had no idea that his mother wouldn't like this shark with its mouth open about to eat somebody is not the best picture for a mother's day card but she cried and cried and said 'you know if I died I don't think he would notice' but she was very depressed herself and that will interfere with the attachment. So I am not sure really what the real story was there, I mean I only saw him twice I think but if they are properly reared, even the really low ones, they do seem to attach although the very, very low ones are so self-absorbed and so cut off, that I wouldn't know what...but they do often resist change and they don't often like different people or different situations or different whatever. They want everything the same I am not sure how attachment comes in with those children because when you see them you can't connect with them, nobody can so I don't know about that lot but they don't sort of don't take likes and dislikes to people either, they react very negatively if somebody abuses them or I mean you know quite often you will get somebody who shouts at them or hits them or pinches them or something and then the behaviour deteriorates but it is always like a noxious stimulus causing the behaviour to deteriorate. It is not a relationship, I don't know that they can relate at that level you know when they are that ill but I don't know where the cut off point comes on the spectrum.

How do you understand AS in terms of mentalization?

I am not sure by what you mean by mentalization but they are entirely egocentric in the sense that for them the big difficulty is understanding that other people are people in their own right and how you feel different or believe different or think different or are different from them that they can't pick that up. They can identify with you if they can understand it from their own perspective but not if it is something different so I don't know how to explain it to you how I see it but I mean a child can be quite a kind child so if he's fallen and grazed his knee or if somebody falls and grazes their knee, he'll be very sorry for them and understand that it is sore and that they are sad because they have got a sore knee but it means absolutely nothing to him...I mean one little boy I had last week just stepped over a child who was screaming on the ground with blood pouring down her leg and seriously annoyed the child's mother by stepping over her and running after his soccer ball so in that sense they can appear very callous but they also learn as they get older so there is a difference when they are younger and older because all the time they learning and sometimes it is inappropriate. Like another little boy, he and his dad were going sailing. Now the mother was delighted the dad was taking the kid off her hands but the kid said to his mom 'do you mind if we leave you behind, you will have nobody with you, will you be alright' now he knew if they went off without him, he didn't like it but he didn't understand that for his mother it was a treat to go and do what she wanted to do and not have the responsibility of the child so in that way they are not unkind children, but they see things from their perspective which they project onto everybody else and if

their projection happens to be wrong, they don't get it. So they will say 'I am being nice to you' and you can stand there till you are blue in the face saying 'this is not what I want'. Like if he absolutely loves trains, he might give you a train whether you are a little girl or an old lady and he will think he is giving you something very wonderful but you actually don't care about trains. This is where conduct disorder comes in...these children who are attached and do have relationships, they can sort of understand that other people...that you be nice to other people because that is how they are that is how they have developed. They haven't developed you know all the conduct disordered features that these unattached, abused ones do. So they can be very sweet and kind but you might have a splitting headache and you might want to sleep and you say to the child 'just leave me' but he will come and bring you water to be nice to you and he will come and say after five minutes 'now you have had your sleep now, let's go to the park' you know these sort of things and it is because up to a point he can interpret what you are saying but there is a huge limit to it so the mentalizing...they can do quite sophisticated exercises like there is a man called Baron-Cohen and there is another one what is her name she did a whole lot of very complicated ones starting with Sally-Ann...Frappe. Anyhow they worked out quite complicated things where the child has got to work out what the other person would have concluded and they can't but the more intelligent one's can at quite a high level so they can do those sort of exercises sometimes at quite a high level and it is quite complicated but what all the families complain about is the extreme egocentricity that the world is from their point of view and what they want is what counts and what you want, they are not that able to...you can explain to them and once you have explained they sometimes get it but they don't always and like the whole thing is...for example they can't mentalize in the sense that now we have got a teenager and he wants to, say it is a boy, he wants to have a relationship with a certain girl, he doesn't know how to set about seducing her, he hasn't a clue. So in that way he can't imagine what he's got and what she will feel and what he's got to do to get her to respond to him in the way he wants but what I am saying is that they can empathize or mentalize to a limited extent but within the bits because if you say to the parents is this child empathic they always say yes but there is that 'stink lip' to it. They can't negotiate in a game. Say you want to be friends and you want to play with so and so you have got to, if you play with them, you have got to make yourself an amenable play companion. These kids will tell the other child what they have got to do and if they don't do it then they get angry or they will drift off you know depending on how they are but they don't know how to reciprocate in two and fro communicative, social, any sort of interaction. That is what they have got to learn but they do learn a lot and the more people explain to them the better they get but it takes time and they are still left with a deficit because in everybody else it is innate, in this lot, it is acquired with great difficulty and some can barely do it.

{How do AS children evidence the ability to mentalize, when and if this ability is present?

- **If clinicians feel these children don't mentalize:**
 - o **How do you understand their impoverished ability to mentalize theoretically speaking?**
- **If clinicians feel these children can mentalize:**

- **How do you understand their ability to mentalize, theoretically speaking?}** (*Rather asked the following*)

How do you account for this, their egocentricity or only being able to do it to a certain extent?

Well I think that is the whole fundamental problem in autism but their connections, I assume it has to do with how their cerebral connections work that in interpreting somebody's face and you know the pathway that goes from that part of the brain to how you then react to that person. All these pathways are faulty so you can develop them but they are not there the way they are in everybody else or they are all misconnected, it is like the wiring is faulty.

I asked: if there is attachment present would their ability to mentalize be greater?

Yes that would stand for any child whether they are Asperger's or not. If you don't have attachment then you are not empathic so you cannot teach it to the one that doesn't have the basic attachment, you can stand on your head. So the attachment is crucial to the whole...the nice children you know who learn are all children who are attached. The other ones don't learn but neither do conduct disorders, you can try and teach them empathy but they don't learn it, they don't feel it. I am talking about the mentalizing in the intact child without the extra diagnosis of attachment disorder or attachment disruption or whatever you want to call it. They are different, they are totally different conditions actually but they can both occur in the same individual. The same as you can be Asperger's and Schizophrenia, or Asperger's and depressed but I dare say there are certain things they are more vulnerable to. I think they are very vulnerable children because they are struggling so hard to cope in a world that is very confusing for them and overwhelmingly confusing for them that is why they attach to something like an object because it is a soothing device. There is a book you might like to read, what is it called 'bring in the idiots' or 'bring on the idiots' I don't know quite who it is by but he was a boy who was a very high functioning autistic but he went to a little special school in New York, an experimental little school at a very young age and what he did as an adult in his thirties was go back and try and find those kids and see what had happened to them but in that book, for himself, he always felt the need to have paper clips in his pocket and if he found himself in a situation where he got stressed out, if he took out his paper clips and played with his paper clips, he could cope much better but he described that phenomenon particularly well of how...and he said everybody had something that they did or had but that had the same effect and it was...he described it as an adult going into a pub and people are making general conversation and he can track an idea and that sort of thing but he can't just chit chat with you when you talk about this nonsense and somebody else talks about that and then they all scream with laughter then he doesn't know where he sits but if he gets out his paper clips he is much calmer and sort of partake of it but he describes that phenomenon very well what it actually meant to him but he puts it in the words that an autistic would use which I can't use. He had his own word for it but he called it...I mean they all have it, I mean he carried paper clips in his pocket always and if he took them out and fiddled with them he instantly distracted himself and just the repetitive action of playing with them settled him.

Attachment is awkward in these children because they are impaired in every way and they are certainly impaired in relationships so depending on how severe the PDD, you are going to see differences but the high functioning, generally they can attach and they can also turn into conduct disorders, I am not sure about the very severe ones because they don't do anything so it is hard to know what is going on with them, you know they might scream so you know they are clearly distressed but you don't know if they have got tooth ache or something to do with some stimulus in the world or you don't know what it is or sometimes they just scream because they like the noise. I mean one of them wrote a very nice thing about how he screamed and the huge dramatic relief he felt but his parents recall the worst thing that was about his childhood was these endless excessively high pitched, serious, ongoing bouts of screaming for hours at a time but he did it because he liked it but he couldn't say that as a child, you know 'I wanted to scream' you know you wouldn't know. They can also be quite manipulatory about it, I mean one boy in a training centre, he didn't speak either but he didn't like the teacher who was a absolute fool of a teacher and decided that he must conform, he has got to learn to conform so he would go to the school gate and stand there and scream but like you have never heard in your life I mean they could hear it two kilometres away and the police would come. Now he was manipulating, he was indicating 'I don't like this woman, I want to go home'. So that is a different mechanism altogether and another child will scream because they are in pain you know they can't say I have got tooth ache or ear ache or something so it is very tricky trying to sort out what is going on and how you attribute it to what is mentalization or what is something else you know depends on how well you know the child and how much information you can get from the people and stuff.

Conduct Disorder:

How do you understand CD in terms of attachment theory?

Well there is usually seriously impaired attachment of some sort or another. Sometimes there has been attachment and there's been a loss of the attachment figure. Sometimes there has been no attachment. Sometimes the attachment figures been abusive or neglected them but there's definite clear evidence of faulty parenting if I can put it that way.

What attachment style do you generally see in these children?

Unattached is what I have seen but that is because I have seen an extreme group. All children who have been, I mean some of them, it is hard to know if they are attached but they are obsessed with the parent but the parent seriously abused them and I think it is because parents aren't abusive all the time, the child always seems to hope that the parent...sometimes they will be nice. I mean say the parent has broken your arm and given you a black eye and stubbed cigarettes out on you, they aren't like that all the time, sometimes they behave like a parent should behave and the child doesn't seem to give up hope that the parent will parent him properly the way a sort of idealized parent would so there's a whole range of disturbed attachments in conduct disordered children, some of them, the one's I see mostly are unattached but some of them are very anxiously attached. Some of them are very avoidantly attached you know the parent can't comfort them because they have got no idea what the parent is going to do next. I have forgotten all the

different types of attachment; they are not very meaningful to me. There is a whole list of different attachment styles but these children are not properly attached.

How do CD children evidence attachment when, and if it is present?

Well once they are unattached they are assumed to not have the capacity to attach although there are certain people they are fond of but often there's a sort of expediency to it. I mean you can put them in very good foster homes but they will sort of be fond of the mother and then one day at school somebody will come with a very rich or pretty mother and he will say 'I want you to be my mother, I want to go home with you' and it will greatly offend the foster mother who has put a lot of time and effort into him but I think in some ways they do learn to trust and like certain people but it is not the same as a proper attachment figure. It is a sort of, if you have got a good children's home for example there is certain people that they will like very much but it's not like they are attached forever to those people. It is not like their mother, you know, say it's a social worker or a house mother, if that person leaves they will be upset and annoyed because they are fond of them but it is not the same impact on that child as say the death of the mother. I mean sometimes they can marry and all sorts of things but I mean there is a lack of commitment and a lack of empathy for the person that they will live with, it is much more an expedient relationship.

In your experience when, if so, does attachment develop in these children?

- **Do these children seem to attach to people?** (*answered above*)

How do you understand CD in terms of mentalization?

Oh I think they are quite good at mentalizing and can con the hell out of you. Have you read...? (Couldn't hear author's name)? That is the 'mask of sanity', he was the first person that ever wrote a book on antisocials and he said the very best ones are the ones who borrow money from me. Now he knew more about it than anybody else at the time. I think it was the fifties, it was a long time ago but it was quite an entertaining book but he can explain how they can exploit you because they can mentalize exactly about how to turn your buttons on.

In relation to attachment theory and mentalization, how do you understand a CD child's ability to manipulate?

They don't care about you but they want something from you and they know how to get it. They don't care about you but they know how they can get you to care about them, or to give them what they want or to hand over a basket of money or take your car and you will lend it to them because you will get a story that is very convincing from a very sweet sounding person and that is the end of your car. You know they can do that so they are mentalizing because they know how to, they can manipulate so well. Asperger's are very honest, they can't manipulate you excepting in a different sort of way you like the parent's often get very well trained by those sort of children to conform to what that particular child is needing or wanting but it is just that their behaviour is impossible if you don't do what they want so for simplicity sake you do what they want but that is not the same as being conned out...I mean an Asperger's child will never do what these conduct disorders do which is go to somebody and say 'I have got no money and my

mother has abandoned me and I have got to get home, please help me, you know could you please just give me ten rand' I mean they could never do something like that and then the child goes home with ten rand and the mother is wanting to kill him because he has humiliated her now with the neighbours. She says 'of course I have got money, all you want the ten rand for is to go to those shops and play those games' and that's the sort of thing that the conduct disorder child can do but that is mentalizing because he knows you will give it to him if he asks you in a certain way. If he can understand how you work, which the Asperger's child can't but the Asperger's child might care about you but he can't respond to how you feel because he can't get it but the conduct disordered child doesn't care what he does to you. So he can pretend to be a Muslim or something like that if he thinks that is going to get him what he wants. So what characterises them is the total inhumanity of their behaviour, you know that governs... they are just so well that is what psychopaths are all about, they just don't care, they don't have the capacity for empathy, they are the ones that actually don't have the capacity at all. Although sometimes, there is a book on serial killers and the one man is a very fond husband and father and he murdered women and he had one in the boot, a dead one who he was going to dispose of and his wife phoned and said I have got tooth ache so he goes home and he is all kind and he takes her to the dentist and he sits there while she has her tooth fixed, he takes her home, he is very solicitous and he goes and he dumps the body. So you know when they want to they can be nice.

I asked instead: How do you account for that behaviour in CD in relation to attachment and mentalization?

But that is what; the woman who he lives with has got something that he wants. He wants to appear as a respectable man maybe...and as husband and father...maybe as a cover for his murderous activities, I don't know. Or maybe he likes going home and having her cook dinner for him and wash his clothes because they are very inclined to use people so I don't know, I don't know. That is the sort of thing I mean nobody who was truly empathic and loves his wife would murder women in a serial fashion so they are very sick.

I also asked linking to an earlier question: If you were saying earlier that attachment helps the ability to mentalize how do you account for a conduct disordered child's ability to mentalize if he is unattached?

I can say that you can teach the Asperger's child if he is willing to learn but you can't teach him if he doesn't have any bases to take in what you are teaching. The conduct disordered child has learnt how to get what he wants from the world. The Asperger's child...the Asperger's child who is not attached can actually be extremely dangerous because they so angry. The conduct disordered child is also angry; I mean they are all raging inside but the one, with the Asperger's child that is so prominent that they don't listen when you try to explain to them about other people because equally they don't care about other people.

I asked: If the conduct disordered child doesn't have an attachment how do you account for their ability to mentalize?

Because they are not impaired in the same way as the Asperger's; the one has got a biological miswiring, the other one hasn't. The one is a biologically damaged brain and the other one isn't. So the normal brain will learn how to get what you want from people because he can pick up your cues and he can read what you want and he knows what you respond to and he can put that information together and he knows what will work. The Asperger's child is much more straight forward, he can only give you his point of view and if you love him you accommodate him and then he wants to please you and he will try and understand and a lot of them want to relate to people, they just don't know how but the conduct disorder person is impaired in a different way but he has lost the capacity to care about anyone at all. It is a different sort of disorder but in the end it is a total incapacity with terrible consequences. They might have for example like serial relationships, they might crook the boss but they end up with serious negatives of all sorts but at the base is this infant who wanted a mother and who never had one and so often there is this infantile quality to their neediness which people respond to because they are impaired in that respect. I mean what has happened is something that has destroyed them but it is an environmental failure whereas the other is a biological disorder so the mechanisms are different but in the end it is how your brain gets wired that is going to be the way you are as an adult and in these conduct disordered children, links between affection and empathy and responsiveness are not going to be formed. So in the end they can't do those things so they have an incapacity but it is a totally different one from the Autist or Asperger's child.

{How do CD children evidence the ability to mentalize, when and if this ability is present?

- *If clinicians feel these children don't mentalize:*
 - o *How do you understand their impoverished ability to mentalize, theoretically speaking?*
- *If clinicians feel these children can mentalize:*
 - o *How do you understand their ability to mentalize, theoretically speaking?}* (Didn't ask, think she answered above)

Similarities and Differences:

In your opinion, are there any similarities between AS and CD?

They are different conditions but you can have a conduct disordered Asperger's. They are co-pathologies, I mean they can be comorbid but they are different pathologies.

What, in your opinion, are the conceptual and diagnostic similarities between these two disorders?

Well conceptually they are two different conditions with different origins and different outcomes. They can occur together in the same individual, the same as schizophrenia and Asperger's, they are not the same condition but you can get an Asperger's turning into schizophrenia or into measles for that matter. They are not the same condition but you can get them both in the same person

- **In relation to attachment and mentalization abilities?**

Excepting that if you get a conduct disordered Asperger's; it is the same source as an ordinary conduct disorder. It is abuse or neglect or loss of figure, parent figure you know there is an attachment problem, a problem with parenting or whoever the child would have been attached to so in that way the cause of the conduct disorder in the Asperger's is the same.

{In your opinion, are there any differences between AS and CD? (Answered above)

What, in your opinion, are the conceptual differences between these two disorders?

- *In relation to attachment?*
- *In relation to mentalization abilities?*

What, in your opinion, are the diagnostic differences between these two disorders?}

Dual Diagnosis:

In your opinion are AS and CD mutually exclusive disorders or can they be co-morbid? Why?

No they are often co-morbid. Well they are not often co-morbid but I think Asperger's are quite vulnerable to developing conduct disorder if they are ill treated because they have so little ways of coping with what is happening to them. It is not necessarily attachment, it might be abuse. You know you can have an attachment to your mother but be abused by somebody else, her boyfriend or something. I mean conduct disorders aren't abused children, aren't necessarily all unattached in a sense that it depends who abuses them and how badly they are abused. You can be attached to a mother who is married to an alcoholic, violent husband and she can't protect you from him but you can be attached to her but you can be so severely abused that you develop conduct disorder.

In your experience have you seen children with Asperger's that are conduct disordered?

Ya we have got some nasty ones and we don't know what they are going to do, we have. One little boy, seven, his parent's, his grandparents who looked after him had one of those thatched houses where the thatch sort of comes down and he lit the house and it went up in ten minutes so they had no where to live so he was sent to his father who was Dutch and who he had never seen and there what did he do...they said he was an absolute monster, sadistic and violent and acting out and conduct disordered in every possible way but the Dutch are very permissive so they said there is nothing wrong with this boy, he just needs to be loved and looked after nicely. Well what he did was get a ladder and stand on it and pull the bulb out of the light and stick something into the light bulb and he caused a fire in the building and blew the whole neighbourhood you know from the electrical thing and what else did he do...something else anyway when he had done two or three of these things, they decided that he was a problem after all so they can be quite small but that child, the grandparents' were looking after him because the mother was some useless individual, I have forgotten the story about her but they can be very, very problematic. He was also very vicious with the children in the school; you know he was in an autistic school. I mean there was one little girl...but they were all abused these children, this little boy might have been neglected, I think the mother was maybe just useless but anyhow he was eventually taken away from her and given to the grandparents and since burnt their house down but they perfectly dreadful and I don't know how you

manage them because you actually can't stop them. I remember this one little girl she would stand on the children's beds and wee on their beds. If they had glasses she would flush them down the toilet. If they had...she got the matron's false teeth and flushed them down the toilet. She, one day, oh she was on the bus and she hid a rusty nail in her clothes and then she sliced up a very handicapped little boy on the bus when nobody was looking. Then her granny had a stroke and when they went to visit the granny, they couldn't understand why the granny was covered in these hideous, hideous bruises and then they discovered that this little girl was actually pinching her at the hospital because the mother started blaming the hospital. Then it became clear that this little girl was actually very sadistically punishing her. Now when we first saw her when she was five she went to wash her hands, she went to the toilet and she washed her hands and someone was with her and saw her face with a funny grin on it and the child was actually washing her hands under boiling water but she was so distorted that she was actually hurting herself but enjoying it and so we were very worried about her and said to the school 'don't take her she is dangerous'. When I went, she got the teacher who was supervising break and the teacher, she pushed her down over something and the teacher fell and she sat on her and picked up her hair and banged her head up and down. Now these children are strong when they are angry. She wasn't particularly angry with the teacher she actually quite liked her but she banged her head up and down. Now this woman came with bruises on her forehead very wild looking and I said 'you have got to get rid of her' but they sort of felt that they had to try and treat her but those sort of children are not treatable. So she ended up in Witrand (sp?), I don't know what they are doing with her; I hope they locked her up. She was autistic not Asperger's but she was a severe conduct disorder so you certainly see them together and they are utterly vicious.

How do you differentiate between the dual diagnosis of CD and AS or what you were saying earlier that is just characteristic behavioural difficulties that might be seen? (*Refer to discussion about jailed AS*)

Well they are different; you would get totally different behaviours. I remember one boy...the father came on a crutch and the father had beaten him consistently since he was an infant because the father believed in really aggressive hidings and the mother had been optionally permissive but he said he had broken his father's ankle and we said 'how did you do that, why?' He said 'I know...' this is now twelve or something, 'I know bones in the body, I have learnt the skeleton and I know where the bones break easily and I know it's your wrists or your ankles and I thought if I broke his wrist he could still chase me but if I broke his ankle he can't'. So he had taken a metal rod or kicked the man or done something that he had actually broken his ankle and he said from then on he couldn't chase me. Now that is not the sort of behaviour you get in an Asperger's. You might have temper outbursts when he is frustrated or overwhelmed but they are non-specific and I mean that was a calculated attack on a man who had abused him consistently from early childhood. We didn't care about the father but didn't know what to do with the boy. He had a logical you know...if he wanted to do something he made himself so unpleasant like his mother didn't take him to the supermarket so when she came back and she opened the boot to get the groceries out, he trashed the whole lot you know he emptied the sugar on the lawn, he broke all the eggs and he said next time you will take me. The boy was high functioning autism but that is not high functioning autism naughty

behaviour, can you see the difference. So it is not hard when you get them because they tell you. He also broke his mother's head, she had a fracture in her frontal lobe, he hit her and we asked him why he did that and he said 'well she was talking to my sister and she wasn't listening to me', he said 'next time she has learnt her lesson she will listen to me'. It is quite calculated, it is deliberate and it has got absolutely no capacity for empathy. Now he was fond of his mother but she was an adoptive mother and he clearly was quite prepared to hurt her although he liked her but you see that is conduct disorder because a conduct disordered child would do the same thing but not an autistic child or child with Asperger's.

In your opinion, when behavioural difficulties are present in individuals with AS, would one consider such symptoms as characteristic of the disorder or possibly existing as a result of comorbid pathology? Please explain.

Well you would have to take a proper history; you would have to work it out. I mean sometimes they are doing things like exploding because the demand on them is too great and they just are not coping, they have got no other way of showing you or telling you so they have outbursts but that is different from the sort of conduct disordered behaviour I am explaining. So there is a different quality to it and I don't think it is a huge diagnostic difficulty anymore...I mean I think all these things are quite tricky like if somebody's bipolar, is highly irritable and aggressive how do you tell the difference between that and somebody who's conduct disordered because they both smash up your house. The intention is different and the reason for the behaviour is different. The one is a mood disorder out of control and then that person's mood is treated and they are on the proper medication they won't be violent. The child who stabbed the principal was not conduct disordered, he did not do anything violent before and probably never did again. He wanted to know what it was like to stab someone which is a very, very...that is where they don't mentalize. There is no capacity to think 'how did it feel for her' which would stop any other child from stabbing somebody and those children who stab someone know perfectly well that they want to hurt you that's why they are stabbing you. You see he wanted to feel what it felt like to stick a knife into someone. So there is a difference, I mean you can have a whole ward round and everybody can have different opinions and you can fight about it and discuss it but the whole thing is to try and get down to the basis of where the problem lies but the whole thing is why you want to know because what are you going to do. You know you have got to make a decision about what you do with these people.

Given your understanding and experience, is a dual diagnosis of AS and CD possible?

- **Theoretically, how would you justify your opinion?**
 - o **In relation to attachment?**
 - o **In relation to mentalization?**

I do think Asperger's are capable of getting themselves into trouble by nature of the condition but I do think they are not all conduct disordered but some certainly are and the ones I have been telling you about are conduct disordered as they come. They had all been victims of their circumstances. This one boy who broke his father's ankle had been, the man would have rage attacks and beat him up and had seriously abused him. The

other little girl who pinched her granny...they were attachment disorders were they had been neglected by sick mothers when I say sick they were either depressed or psychotic or something or alcoholic or something but the child had no proper care so the same sort of mechanisms that you see in other children. I mean the one who broke his dad's ankle had a very loving, sweet mother but he had been seriously abused. It is not an intrinsic part of Asperger's at all. I think they are like every other baby who are born into a world that either treats them well or badly or meets the infants needs because neglect is just as dangerous as abuse and also loss of attachment figures or changing figures, you know it is going to be the same for all of them. If a child has an impaired attachment, they might develop withdrawal or anxiety or depression, they might develop something else, they don't necessarily develop conduct disorder. They don't necessarily develop conduct disorder at all, some of them are just very withdrawn and very sad and some just don't develop optimally you know they have this tall potential which is never realised. They withdraw, a lot of them withdraw, they just switch off.

- **If dual diagnosis is possible:**
 - **Does an overlap occur diagnostically and/or theoretically? How?**
 - **How would this child evidence attachment when, and if present?**
 - **How would this child evidence mentalization abilities when, and if present?**
 - **What contributes to a dual diagnosis in some individuals?**
 - **Is a dual diagnosis adequately explained using theoretical concepts such as attachment theory and the theory of mentalization?**
 - **What else could account for such a diagnosis?**
 - **Any influencing factors?**

What is the possibility of misdiagnosing AS as CD?

- **If so, why do you think this happens?**

No, it can be quite difficult to pick up Asperger's because people get so fixated on the behaviour that they don't see the Asperger's especially on the spectrum if you are at the high functioning end where you are more sort of right up there, people don't get the idea that the disability is present so they don't actually understand that you have got Asperger's so they are over represented in prisons apparently, not that I have got any figures on it, and it's because people like lawyers, judges and social workers and probation officers don't recognise that this person has a psychiatric illness, neither does the psychiatrist. So if they like 0.2% of the population in the prison population they are a much higher proportion so there are too many of them in prison and sometimes it's because, it has nothing to do with attachment or conduct disorder, it's because their behaviour is seen as pathological. What are some of the people who ended up in prison that have got nothing to do with conduct or attachment...like say someone is obsessed with trains and he is forever going into some forbidden part of the station because he wants to get the engine number or something and they keep catching him trespassing after he had done it four times they sent him to jail...and that is not either conduct disorder, it is just that he is autistic and he doesn't get it that because he so badly wants to get the numbers off the trains and write them down, that he doesn't take any notice of the rule which has no meaning for him so quite a lot of them end up in jail for that sort of a reason. I remember a case being

presented at Sterkfontein which I am sure now in hindsight was an Asperger's although I can't really prove it, but he would go into supermarkets and steal blocks of cheddar cheeses, nothing else, he would pay for everything else but he would put the cheese in his pocket. Now after he had done it seven times, the judge sent him for forensic evaluation because he said 'why does he pay for everything else and why does he steal the cheese?' Well the man couldn't tell us and everyone assumed, I don't know what they assumed, I can't remember the whole thing but I know now that it would have just been an autistic quirk that for some reason he felt he could take a block of cheddar cheese but he wouldn't have stolen anything else in the world, you could leave him with your wallet here with R5000 in it, he wouldn't touch it but put him in a supermarket and he wants his block of cheese, he will take the block of cheese but nothing else, he didn't steal anything else, ever. Now they have realised but people didn't realise that these people were impaired and often they lose it, they become overwhelmed by a situation and they smash up a room and then they are in there for destruction of property or they assault somebody because the person frightens them or frustrates them or upsets them and then they are in jail for assault but they are not conduct disorder and they are not assaultative and they are not criminal because they are actually psychiatrically impaired because they misjudged a situation and reacted inappropriately and so what I am saying is people don't often see the Asperger's so diagnostically there is a huge problem but out of a hundred psychiatrists in this town, if two of them get the Asperger's you are lucky. However, it is quite easy when you can see it, it is one of those funny things that when you can't see it somehow you are blind to it but as soon as you become aware of it you can see it. I suppose a lot of people aren't aware of attachment that would be another thing. I mean a mother might instinctively feel very protective of her baby and all the rest of it. She would just be seen as a sort of distressed mother if you want to put the baby in hospital and she is not allowed to stay with it for example but people don't understand attachment, I mean a lot of these things aren't understood. Misdiagnosis occurs because of a lack of awareness but the condition is present, they don't know the condition so I am sure that is why they are all in jail in the UK and I think that is why they are starting to look them out because they are going back and trying to undo who shouldn't be there because they have been...they can't represent themselves in court very well. I mean most of them if you say 'why did you hit her', because she annoyed you...you know that sort of thing. The behaviour seems pathological but it actually isn't, so in that way but it's not that there is a diagnostic confusion if you know the difference, it is only because people don't see the Asperger's. So it is more that people aren't aware of the condition so they get themselves into trouble, you know some of them should be in trouble but I mean one boy, a very famous case, watched a television program of a murder and the next day he took a knife to school and he stabbed his headmistress but he had unfortunately got her in the heart and she died and he was fond of her, he liked her, she was a very good teacher and they said 'why did you do it' and he said 'I saw it on the TV and I wanted to see what it felt like'. Now that boy is in jail for life but his motivation for killing her was arbitrary in a sense, it could have been somebody else he didn't target her particularly, it would have been somebody...it was chance who he stabbed. He just felt like stabbing, he wanted to see what it felt like to stab somebody but it could have been anyone. So that is not conduct disorder although he is a murderer so what you do with them I don't know. You

know if he is capable of that, you don't know what else he is capable of, you know the whole thing gets very complicated...I am glad I wasn't asked an opinion.

Can you elaborate on whether or not each of the disorders are able to empathise or sympathize?

Neither can empathize not in the true sense of the word, what they say in the DSM for Asperger's is social and emotional reciprocity which is different from empathy that is what they can't do, but conduct disorders can be terribly empathic if they want something from you. Well they can be very sympathetic if they want something too but it's a calculated manipulation for a purpose to suit themselves. So they want to instruct you or they want something from you. So it's for their gain and there is no actual caring about you but they can be extremely empathic or sympathetic and get exactly what they want from you. Asperger's are very straight forward and honest and unable to manipulate in that particular sort of way.

Research Interview Participant 8:

Professional: Psychologist

Note: As there were time constraints the interview was conducted haphazardly and questions were asked 'randomly' coming back to questions that were less important. Unfortunately we ran out of time so some questions were not answered. However the interview answers were transcribed verbatim but for the purposes of analysis, the questions were kept in the same order as previous participants although they were not answered in this order.

General:

What experience do you have in the field of Conduct Disorder (CD) and Asperger's Syndrome (AS)?

Well conduct lots, Asperger's not lots because I think I have seen about three Asperger's and I didn't even have to diagnose them, somebody else had and I actually saw them in private so I have actually seen none here at the hospital and I have been here for three and a half years so it's rare here. We have had a lot of autism but full blown autism and no Asperger's and I think a lot of that has to do with the fact that Asperger's, I mean your IQ is generally normal, language skills are normal just the social aspect is not ok and the IQ being normal is rare here. Most of the kids have low IQ's and I think it is the community that they live in. Conduct disorder is huge, we see lots of that. Sad and depressing but anyway.

What kind of clinical setting do you work in?

A hospital setting

Are you psychodynamic in orientation?

Mmh, yes

When you refer to a child, what 'age group' are you referring to and why?

Well ya the hospital well now we get into hospital politics but according to pediatrics ok we are a pediatric hospital we specialize in maternity and pediatrics so it is a women and children's hospital and the cut off age for admission is fourteen so we carry that on and we were only seeing patients up to the age of fourteen. Adolescents have to go to Helen Joseph with the adults. So women, then we got around it, we can see women so we could see adolescent girls and women because of the 'women's hospital' bit but boys above the age of fourteen have to go to the Helen Joseph and only recently probably in the last two months we have changed it now and adolescents we see here now as well on an outpatient basis. So children I would say is up to, I mean I think, twelve. Thirteen becomes an adolescent.

What theoretical explanations do you draw on to understand children with AS and CD?

Well I think it is quite a mixture. Conduct...I am just trying to think of the things we make the poor suckers read in journal club...um Winnicott a lot. I would say in terms of psychodynamics I am more middle school so I am not Kleinian I think it is a bit harsh so

I think the sort of middle school people so like Bion, Winnicott and then what's happened is we have become extremely attachment orientated here so we have got everyone reading Schore, Fonagy and what are the other glorious ones. There's a whole bunch, I mean Bowlby one has to read that standard stuff but most of the reading, I think I mean where my thinking is coming from at the moment has got to do with a new form of therapy that we have started at the hospital here which is parent-infant psychotherapy and I think that stemmed from my absolute frustration with the amount of conduct that we see where there are these children with these severe attachment problems where you feel they come here written off. Once they arrive here at like fourteen because mom has now caught them smoking dagga and stealing or whatever has been happening and I mean when you listen to the history, there has been some serious attachment stuff, untreated learning problems, untreated concentration problems at school so they are so far behind, beyond remediation and really there is not much you can do when a child is very unattached you know so the idea of the parent-infant psychotherapy is to catch them before they are eighteen months old so to catch it when the mom and the baby where we can still try and affect brain development and that kind of stuff. So ya I think that is where my kind of focus is coming from and that is...there are two women actually who are writing on that know, Tessa Baronden and Stella Acherone (Sp?), I think the one is Australian and the other one is Anna Freud center who is writing on it so I think that is where I am at the moment.

How accustomed are you to drawing on attachment theory and the theory of mentalization in relation to children with AS and CD?

Well a lot with conduct, not so much with Asperger's I mean the autistic, because we don't see them that much here but ya I would say with the conduct, to me it is the only way to understand what is happening. You know, what are you going to do, say 'you know well it is just the way their brain is'. I think you can't ever simplify it down to one thing so I think you need to incorporate the relationship, you know and the idea of how this person views the world which would explain why they are the way they are.

- **{If alternate theory:**

- **Can you elaborate on this understanding?**
- **How does this theory help you understand these children? (*Didn't ask*)**

Asperger's Syndrome:

How do you understand AS in terms of attachment theory?

Well I think in this sense I am very careful to not blame it on the mother because I think that there is a huge controversy around that. The fact that you know anything on the autistic spectrum was, I mean we talking about the olden days, where they would, it was about the mother and they would say it is normally older, cold parents and that is the reason the child is autistic or you know has Asperger's but I think now there has been so much more research into brain development that I think it almost falls more on the biological side let's say than conduct which I think has an element of biological but has a lot more to do with the environment and the attachment in a sense. So it is both and I think there are overlaps but I don't think they are the same thing if that makes sense. So I think what I am saying there is I am more careful to not necessarily apply an attachment

understanding to an Asperger's child so we are not going to say there was impaired attachment and that is why this child is the way they are.

How do AS children evidence attachment when, and if it is present?

Well I think the Asperger's kids that I have seen are, you know the one kid was actually quite securely attached you know so there is a sense where Asperger's is more...they are unusual, awkward children rather than it being a more...whereas conduct we would say is more a, I don't know you always want to say a malicious but it is not, it is also a disregard for others that comes from a lack of empathy but with Asperger's I think it is more a social...just lack of interest.

In your experience when, if so, does attachment develop in these children?

In Asperger's, I think there it becomes tricky you know because the idea is that, you know, I have even seen autistic children who are purely autistic children who are attached to the mom so you know you can say that their relating to others is not the same as in terms of the ability to see the mom as like let's say separate or see other people as separate, as having feelings and thoughts and this is specifically autism. I think there is just less impairment with Asperger's but definitely...the social functioning is impaired but you see, there I think we are talking about two different things. I mean whether the child is attached and the way they interact socially are two different things so I think that it develops along the same lines as a normal child but obviously it is going to depend on the mom's attachment style, all of that as well.

Do these children seem to attach to people?

Mmh, mmh, yes.

How do you understand AS in terms of mentalization?

Well I think that is the impairment in the social functioning so the idea of being able to, I mean I think who was it who wrote about it initially I think it was Piaget with the perspective taking, talking about children's ability to...I think where that links with conduct is their ability to develop a conscience but you know when you get your more autistic spectrum stuff there is a sense that it is harder for them. They can but it is harder to see things from other people's perspectives but then the idea of imagining what the other person might think or feel so attributing desire, I think that kind of stuff gets a lot harder for those kids. So you know again I think you can't really say it is cut and dry, I think some have more of an ability than others but it is impaired and that is why they are diagnosed with the condition and whether that is, it is probably both a brain thing and an environment thing but how I would separate them is that Asperger's tends to happen in all sorts of different environments where as conduct is prevalent in more a deprived, ya a socially economically deprived, domestic violence, substance abuse that kind of neglectful parents that is where you get more of it but then there is differentiations in conduct I think as well depending on rich, poor...you know is the child developing the conduct as a survival instinct and this is what has been modeled for them from mom and dad this is how we relate or is it more a temperament thing? The child has been given, you know, a lot of let's say love and attention but mom and dad's attachment is still a bit impaired, there is impaired limit setting you know where as like in a deprived

environment, mom is drunk and doesn't care really. Where as maybe there is an over invested mother who doesn't set new limits you know in the more rich community but I am getting completely off the topic here but I think basically what happens with Asperger's I mean the kids don't really have an interest in, I mean in what I have seen, they don't really have an interest in playing with, there is still parallel playing so there's that um, they almost...the development of wanting to seek approval from peers which is developmentally appropriate you know when kids start socializing at school, it doesn't really develop there's a sense of them being quite isolated um the picture of the parent in their head is held differently to children without the diagnosis of Asperger's. I think there is just more of a difficulty around seeing the mom as separate, she's not a thinking, feeling being but obviously there you have got your continuum. With Autism, mom is an object to Asperger's where I think there is more of an understanding but there's less of an almost an affect involved in it.

- **If clinicians feel these children don't mentalize:**
 - o **How do you understand their impoverished ability to mentalize theoretically speaking?**

Well there is the hard question because I think with Asperger's there has been a lot of research, I mean hell there has been a lot of research into conduct as well but in terms of brain development it is impaired, now what is causing that. I don't think we have any definitive explanations for that, for most things in psychiatry, psychology so yes there is an interplay between environment and obviously biological factors so ya at this stage as far as I know or understand if I am looking at the autistic spectrum there's lots of different explanations and people are still not agreed entirely on what is causing it so ya 'we don't know' is the answer to that one. Conduct there is more of an idea because there's a lot of environmental factors that we can see and then your heredity you know in terms of who has had it in the family.

- **If clinicians feel these children can mentalize:**
 - o **How do you understand their ability to mentalize, theoretically speaking? (*not applicable*)**

Conduct Disorder:

How do you understand CD in terms of attachment theory?

Well that's obviously the impairment in attachment that's very early on where there isn't sufficient mirroring, reflecting from the mom early on. There isn't sufficient scaffolding. Mom doesn't make any emotional sense of the world for the child. They don't learn the mind of the other so to speak because there isn't sufficient parental involvement so the child, but there again there are lots of different factors I think you get temperament, you get all sorts of things but ya I do believe you get two very different kinds of conducts though. You get your conduct that is very temperament where it seems there was a lot of, it's not like they grew up in a drug addicted family in a dangerous area or whatever but the child still develops it and that is more your temperament but then you get children I think that develop it as a survival tactic, it is defenses. So it is a defense system that starts early on but I think then it is important to look at the brain development that happens in the first eighteen months. You know I think there can be a lot of almost neglect of pathways that should grow but don't but it's more a kind of insidious thing that starts,

you can get conduct that can start...the onset can be at different times as well so you know obviously your much earlier conduct is prognostically quite bad as opposed to someone who starts in adolescence you know as a reaction. I think most adolescents have some diagnosis of sorts but outgrow it but the...ya so again it's this inability to have empathy that should develop in those early years but doesn't so we talking about early brain development that then predisposes towards an inability to develop social understanding so the idea of playing with other children and realizing that other children's feelings get hurt you know they have even identified that toddlers can have empathy for each other, some don't develop it at all and I think that is your very severe conducts you know where there is no sense that the other person will be hurt or upset and there is no sense of relating to that on an affective level.

How do CD children evidence attachment when, and if it is present?

I think that is an important question because again you get a spectrum of conduct you know and you get kids that are more securely attached so some of them do have an ability to attach. It is your unbonded children that you know are your severe conducts that you aren't going to be able to do anything with but you can get I mean if you look at the DSM criteria I think for half the children who live in Coronationville would fit the criteria because that's what they are doing. They are out with you know they can be easily influenced, I mean you have got lower IQ, they all on the streets, there is no supervision, lots of ya drugging goes on, there is hectic stuff so in that sense they will meet the criteria but whether they are actually as bad as what a conduct is made out to be, they are not. So I think in that sense some of them can bond and ya but again it is a difficult thing. I think in therapy is where you will feel it, straight away when you are with the child you can feel whether they have any regard for anyone else. I mean what we try to do with kids where we see they heading towards a conduct diagnosis, let's say young kids where there's all those kind of risk factors, so there's ADHD, there's a learning problem, there's stressed parents that are working all the time, never around or abandoned, it tends to be single mom's, dad's aren't that involved in this community but ya we put them into groups, that's where we try to...I think it's the only effective treatment because we don't have the resources to do these endless individual therapies which I don't think would be very effective with very unbonded children anyway. If they are completely unbonded there is nothing we can do and I think that is where we sit with it that we are wasting resources trying to solve this. We place the children rather. Then the one's where there is impaired attachment we will try and work with that and we put them into groups where we try and teach mind of the other so it will be things like 'ok he gets upset because he wants to play with the toy but that one is playing with it' and then it will be about talking it for them in a group or saying you know 'so and so how does it feel when so and so is trying to take your toy from you' you know that kind of stuff and try...and that we have found has been quite effective I mean in terms of getting kids to learn but some of them are severe I mean we have a group at the moment with one little boy who is just uncontrollable, very endearing, naughty as anything. He is six I think, ya and I think he will grow up to be a conduct and there is not much we can do with him but it's things where he gets frustrated incredibly quickly and will...you can see where he almost has moments where you see almost a flash of remorse or some kind of emotion but it's gone so quickly. He's kind of back to how we would say, it's like his defenses against any

anxiety he has need to be so strong that you just can't get in there. Any form of rejection he becomes raging, he rages at most things in the group and he's needless to say rather unpopular in the group so it is kind of managing all of that. He has learnt in terms of, I think, boundary setting you know that you will get things from other people in the group better if you respect the group rules and in that way I think it can be effective because normal socializing on the playground, I think he just fights all the time. He thinks aggression is completely ok and if someone calls your mother whatever it is, a rude thing, you know it is fine to throw a brick at them. That is what he is like. Ya so in that sense I do think that it is ever hopeful that some conducts are diagnosed very easily and we tend to write them off quite quickly so we have to be careful of that and once they are adolescent conducts, I have very little hope unless it started in response to something that has been going on so for example mom and dad got divorced or something happened and this child suddenly meets the criteria but they didn't ever before and there was no history of defiance or that kind of stuff then I hold out some hope but if it has been a perpetual kind of thing then it is very sad. So yes I do think the ability to attach is there, they do worry where their mother is. They do want to be close to her, it is not a, well some of them not all of them, some of them threaten to stab their mothers while they are here in the waiting room which I fully understand because I also want to stab the mother because she is painful, you get that sort of severe side of things but then you also get the one's who I think are more hopeful where some attachment did happen but there are other things that have gone wrong.

In your experience when, if so, does attachment develop in these children?

Do these children seem to attach to people? (*Felt she had answered this so I didn't ask*)

How do you understand CD in terms of mentalization?

There again I think it is a couple of levels I think there is a problem with emotion so affect, there is definitely an issue there so in terms of relating to other people and empathy. There's the idea of the cognitive side of it so not emotional, how do they understand relationships between people and I think that is impaired as well that the ability to naturally empathize with someone isn't there. It is a very egocentric focus on themselves that you know shows in development that something went wrong so the idea of there being a supervised interaction so mom supervises siblings and we all learn how to share nicely and so and so gets very upset when you steal her things you know that kind of idea and that isn't there and the children are deprived and there is going to be a 'me, I want' thing and no sense of having developed an idea that, you know Winnicott's idea of optimal maternal failure I think there is also a disruption in that where conduct could be linked to personality stuff later on. This is the big theory ya where your severe conducts will inevitably diagnosed as antisocial or borderline or whatever it comes out and there, I think there, there's big overlaps in terms of all the different personality disorders and there it is about attachment, how they attach to themselves as a person, to others, to the family but almost that narcissistic self involvement if you want to call it that, that early narcissism that Winnicott talks about I think never completely goes away so there's that sense of them being the most important, their needs being the most important and it's not shared with other people and the ability to tolerate other people's needs or feelings is just not there.

How do CD children evidence the ability to mentalize, when and if this ability is present?

- **If clinicians feel these children don't mentalize:**
 - o **How do you understand their impoverished ability to mentalize, theoretically speaking?**
- **If clinicians feel these children can mentalize:**
 - o **How do you understand their ability to mentalize, theoretically speaking?** (*thought she had answered this above*)

In relation to attachment theory and mentalization, how do you understand a CD child's ability to manipulate?

Like operant learning, the modeling, social theories all of those, I think that they learn that it works. It is the sense that it doesn't really matter that mom is feeling guilty, bad, sad, whatever it is that she is feeling but if I do this I get what I want. They don't necessarily have to fully understand the emotional process behind it just that it works.

Similarities and Differences:

In your opinion, are there any similarities between AS and CD? (*Didn't ask as we were running out of time so went onto the others as the questions are more focused*)

What, in your opinion, are the conceptual similarities between these two disorders in relation to attachment and mentalization abilities?

I think there's the idea of initially with the mom there's the sense of needing to realize mom is a separate other and mom is having her own mind, her own thoughts, her own feelings and I think something goes wrong there very vaguely...well more with conduct I would say but ya Asperger's I think there's...I suppose just to say Asperger's I think I am reluctant to blame it on the mother I think there's a sense in autistic spectrum you want to say you know what they aren't sure, it might have been a virus, it might have been something in the womb, it might have been...you know there is much more emphasis on it being brain oriented than there is with conduct so you know I think, yes there is a possibility that things went wrong, absolutely impaired you know attachment with mom in the beginning with an Asperger's child but for some reason we are all quite scared in saying that or blaming it on that whereas with conduct I think it is quite evident because we see it and we actually want to start research now that looks at pregnant moms and their feelings towards the baby now and then in five years when we inevitably see half those children in the department you know because that is what is going to happen and then to try link it back to how the mom felt at that time and then maybe try and do interviews between that but I think there we have seen that you know mom's who are extremely ambivalent and who come from abusive homes themselves, have impaired attachments themselves, don't have the...I mean a lot of the work we do is trying to get mom to understand that the baby has a mind of it's own so how do you think the baby is going to develop the idea that mom has a mind of her own you know mom just becomes this scary kind of representation that gets internalized because she is so frustrating all the time, there is that sense because mom is not actively trying to scaffold the child's world or make sense of their emotions, or try regulate the child's emotions. The mom is more

likely to lash out and smack because that was her experience so in that sense I think, ya initially that you know very early time when mom should be completely one with this baby, there is this time when they are bonded but then that optimal maternal failure doesn't happen properly so in that sense there isn't a sense of other as separate and then to start understanding the mind behind it so the idea of perspective taking or the theory of mind that they talk about thinking that someone else has feelings that can make sense, you know that the child can understand or feel empathy you know so I think that is later developmental stuff you know it's kind of what I think it starts from developing two till about five, six round there that time of learning then it develops further as you go along...there's, I think those are the most important concepts that go wrong at that time.

What, in your opinion, are the diagnostic similarities between these two disorders?

Well ya I think ya you will find in terms of your impaired social relationships but I think it is almost the extreme though to which it goes. I mean Asperger's just tend to be unpopular, they are not frequently sought out play mates as you will find in your school report, they are just not that but conducts it just comes out almost in more areas, it's pervasive they, well to fully diagnose somebody a conduct it's along those similar lines as it is for a personality disorder, it is pervasive it is starting to come through all areas of their functioning so there's you know impaired family relationships, impaired friendships you know it's just general disregard and then they start having impaired relationships with society in terms of breaking laws and all of that. Ya so there...I haven't really thought about it...but I would say that is about the only overlap in terms of Asperger's. Ya I don't know if I am missing things.

What, in your opinion, are the conceptual differences between these two disorders?

- **In relation to attachment?**
- **In relation to mentalization abilities?** (*answered above*)

What, in your opinion, are the diagnostic differences between these two disorders?

I think I answered that one before but conduct is a lot more aggressive to put it that way, a lot more angry. I would say Asperger's any kind of aggression that you get is more a frustration whereas with conduct it seems to come from a deeper sort of rage and disregard for people and things and rules so I think conduct is just a lot of different criteria that we are looking at.

Dual Diagnosis:

In your opinion are AS and CD mutually exclusive disorders or can they be co-morbid? Why?

It is an interesting question because I have never seen one where we have said it is both. I would say there is no reason why they both can't be diagnosed. I think there are overlaps and you would have to be very careful in the diagnosis but ya the idea that there is an impairment in mentalization, if ya...I would say a child with Asperger's grew up in a dodgy area there is quite a good chance that the child would be diagnosed with conduct but ya I mean my experience of them is that you know your Asperger's is just your odd children, they just socially odd and not, they not completely disregarding of other kids feelings in that sense like a conduct would be, they are just not interested. It is like a conduct will know they are upsetting someone and there is a rage element that is playing

out there where as an Asperger's wouldn't notice that someone is upset. It's like they would take something out of someone's bag because they are interested in it which is not that kind of conduct thing of you know I am just going to steal it, I am going to take it.

In your opinion, when behavioural difficulties are present in individuals with AS, would one consider such symptoms as characteristic of the disorder or possibly existing as a result of comorbid pathology? Please explain.

That I think would be completely dependent on the case. The, you know, what are we going to say that Asperger's children are immune to other things, they are not but it is almost as though autistic spectrum stuff has been so viewed in awe because they are odd little children, I mean when you see one you will never forget the first kid you see and the funny, odd things that they do but ya I think it all tends to then be lumped under the one diagnosis. I must be honest I am not a big fan of diagnosis. I think we do it because we have to at the hospital and I think in a lot of ways Autism needs to be diagnosed because then they go to the right schools, that is the only reason we do it because they are very misunderstood and I think they have a hard time. Autism, even Asperger's I mean there are Asperger's kids in private schools that I have seen and I mean they are rejected by other kids and it is not great for...not that I think they really notice or mind very much but I think it can become quite frustrating for them. Their experience of the world is not shared by the rest of the class and I think that can be...ya because it is hard for them to understand why the other children would do things so general coping and socializing is hard whereas...ya I think it would depend on the case and I think you would have to carefully sift out what is going on and history, look at the history and changes, changes, anything that had changed, is it a reaction to something, you know what is going on.

Given your understanding and experience, is a dual diagnosis of AS and CD possible? (*Already answered above – the answer was yes*)

- **Theoretically, how would you justify your opinion?**
 - o **In relation to attachment?**
 - o **In relation to mentalization?**

Ok um well you know the other interesting thing that I am just suddenly thinking about is that conducts do generally tend to have low...they have language issues where as Asperger's have normal language development and there's the idea that conducts act out of you know more of a frustrated, not able to manage emotions or verbally express anything. Ya I think that would comprise a difference but...ya how would you justify it theoretically...well it depends if you want to look at Asperger's as being a biological brain thing, put that, a kid with that, in the right environment and you can develop both. I think conducts can sometimes have some sort of attachment you know, I think Asperger's kids do have some kind of attachment, it is impaired but it is there so ya they can meet the criteria that way and it would be co-dependent on how the child was managed as well, what has been going on all along that I think you will get different presentations of Asperger's same as you get different presentations of conduct and I am sure there is a space in the middle where something could happen. I think that you can get a child who let's say attaches to the mom in a sense, it is not wonderful but it is there, and the conduct is more a reaction to the environment so let's say mom is not all that available and life is quite difficult for this child with Asperger's anyway and then ya let's say the conduct

appears out of more a peer relationship so the early attachment is there but it is not protected enough. Is that making sense to you...I think it is just complicated I don't think I have actually thought in terms of Asperger's and attachment to link it with the conduct I mean we know that the child just has no capacity to think of others and that that mentalizing sense...I think that is where the overlap is that you are talking about between Asperger's and conduct and if you have got an Asperger's child who was in with the wrong group you will get the diagnosis of conduct disorder sadly.

If dual diagnosis is possible:

- How would this child evidence attachment when, and if present?

It would depend on severity again in both cases and whether there was attachment or not. I mean how do kids evidence attachment, the one's we have seen there is a sense of some kind of anxiety lessening when their mother is around if that makes sense and that could be displayed in ya lots of different ways to the one degree of separation anxiety, new environment don't want mom to go out the room to the very sort of unusual patterns. I mean kids that...I mean I am trying to think of the one Asperger's kid. He used to cuddle up with his mom but only when they were watching TV and lie there but other than that but that had to happen so there was a sense that it is important there was something about that that was important for the child...I think they, it is almost a limited representation of the mother, you know it's more simplified in a sense in their mind and it is something about them as opposed to about a 'mutualness', both of us and we have an attachment, it is more about them and their kind of regulation of whatever feeling it is that whatever mom can provide so there is some sort of attachment but there again it would depend because I think some Asperger's kids have more attachment and would look to the mom, you know they would look normal almost in a sense with the mom's so very much I think it depends.

- How would this child evidence mentalization abilities when, and if present?

You know here I think it is varying things, I mean from watching a child who is conduct interact with others at times I think they can relate in, but it is a limited capacity, so they can relate to some experiences that other children may have had but I think it is when it will fit with their perspective in a sense. I think some autistic spectrum children do have the ability to perspective taking. You know they can do it some of them. The idea of the theory of mind in terms of what would somebody else be thinking in this situation, I think some have more ability than others. So sometimes they would be able to say 'oh well so and so thinks he did this' you know we can see it in a group sometimes where the child will be able to say 'no I think that that person is cross because of this' but it is very limited, it is simple, it is not age appropriate, you know there's...it is there sometimes to think of another person as separate and what their feelings or thoughts on something might be, they can do it but not appropriately.

- What contributes to a dual diagnosis in some individuals?

I think environmental. I would imagine the attachment with the parents and then whatever mystical biological things cause Asperger's or autistic spectrum stuff. If we are not taking the role of relationship into account I would say again that it is all the things that we talk about so biological, attachment with parents, all of that the environment, the parents' attachment styles so ya then you would get a child...I suppose what I am

thinking is the child with Asperger's growing up in a certain environment would have more risk I think.

- **Is a dual diagnosis adequately explained using theoretical concepts such as attachment theory and the theory of mentalization?**
 - **What else could account for such a diagnosis?**
 - **Any influencing factors?** (*ran out of time*)

What is the possibility of misdiagnosing AS as CD?

- **If so, why do you think this happens?**

I think there is probably a risk if the child has never been treated, if an Asperger's has never been treated or picked up I think that then there will be a high chance because I mean isn't it just telling because now I am just thinking we don't look for it, we don't really look for Asperger's I mean we will probably because on the one hand it is rare here but it's true to have a child who the autism will jump out at you but every second child is kind of conduct or something so I think it is actually high. Now I am thinking mmh maybe I should go and have a look now.

Can you elaborate on whether or not each of the disorders are able to empathise or sympathize?

There again I think it is degrees depending on the severity. I think if there is an impairment in their ability to empathize...specifically conduct disorder you will get kids who get let's say have an okay relationship with their grandmother, let's say who is the protective factor, they have terrible attachment to the mom and they have actually a very strong attachment to their peer group but then have absolutely no regard or empathy for other people so the other out there. I think there is a limited ability to empathize in some. With Asperger's again it would depend on severity but some will have none.

I asked if the participant had anything to add:

I think where the interesting thing that comes is, is around you know we don't consider attachment around our diagnosis, you know the DSM does not consider attachment in terms of their criteria so I think what happens is we will diagnose conduct according to whether they fit the criteria but then again we will talk about 'is the child attached or not' and that we don't base necessarily completely on the child, we base it on the history as well so what are the chances the child is presenting like this but the history says well mom was, let's say, drunk the entire time the child was...and mom dumped the baby with granny you know completely uncared for at six months. We would then instantly think there are huge attachment problems but then you see the DSM doesn't tie up with the psychodynamic understanding. There are attempts these days to try and integrate but it is difficult and I think psychodynamically people are very scared of going near Asperger's or Autism with a psychodynamic approach at all. It is always stuff about brain viruses and various things so you think that is what it is but ya...