The historical foundations of conduct disorders:

Historical context, theoretical explanations, and interventions

Jermund Norberg



Master thesis in Educational Psychology

Pedagogisk forskningsinstitutt

Det utdanningsvitenskaplige fakultet

UNIVERSITETET I OSLO

Høst 2010

© Jermund Norberg

2010

The Historical Development of Conduct Disorders

Jermund Norberg

http://www.duo.uio.no/

Trykk: Reprosentralen, Universitetet i Oslo

SAMMENDRAG AV MASTEROPPGAVEN I PEDAGOGIKK

<u>Tittel:</u>	
The historical foundations of conduct disorder.	
Historical context, theoretical explanations and interventions	
<u>AV:</u>	
Jermund Norberg	
EKSAMEN:	SEMESTER:
Master i pedagogikk	Høst 2010
Studieretning for Pedagogisk-psykologisk rådgivning	
STIKKORD:	
Educational psychology	
Conduct Disorder	
Oppositional Defiant Disorder	
History	

Summary

Conduct disorders became established as a medical diagnosis in 1968. Today they are one of the most frequent reasons why children and adolescence are referred to a mental health clinic. Conduct disorders impact upon the emotional wellbeing of the individual, their social and family relationships, and their academic success at school and their future wellbeing as adults in society.

The school makes up a significant part of a child's life and for children with conduct disorders the school environment can be particularly challenging. The nature of the school that enforces rules, boundaries and expectations on students' behaviour is problematic for a child suffering from conduct disorders whom opposes the authority of the teacher and the school. This causes difficulties for the child and the teacher's ability to ensure positive learning outcomes for all members of the classroom. Thus conduct disorders is a significant challenge for teachers, educational psychologists and the education system itself, placing high demands on the skills and knowledge of teachers, educational psychologist and other professional involved.

Central to understanding conduct disorders is that the diagnosis and treatment of conduct disorders is dependent upon the social and political context of the time. The historical perspective demonstrates that conduct disorders is a category that is ambiguous in its development and understanding. This challenges the educational psychologist to approach diagnosis and treatment with caution, treating each case thoughtfully and critically engaging the theoretical literature of the time with the needs of the individual child. To fully understand the contemporary perspective it is important to know how it originated and how it has developed. The origin of conduct disorders can be traced to the research around delinquency at the end of the 19th century. Thus, three significant questions are identified and answered in this thesis:

- What is the historical context that the diagnosis of conduct disorders rose from?

- In the last forty years how has changing diagnostic criteria reflected the theoretical developments?
- In what degree and kind have the theoretical understanding of conduct disorders developed, and how is this development reflected in the causal explanations, assessment and treatment of conduct disorder?

Method

To answer the questions this thesis has employed the qualitative methods of historical and text analysis. This is done under post positivistic research paradigm guided by the ontology of critical realism.

Sources

The literature is based around the main contributors to the historical development of conduct disorder. The early history draws on the writings of Lombroso, Aichhorn, Healy and Burt, the middle period on Bandura, Patterson, Robbins and the contemporary research of Burke, Frick, Maughan, Mofitt, Ogden, Nordahl, and Rutter among many others.

Findings/ conclusion

This thesis has identified three distinct periods in the history of conduct disorders. The first period begins in 1880 where the origins of conduct disorder lie within the social and legal problem of delinquency. This period is characterized by the initial recognition of delinquency and antisocial behaviour as a medical and educational problem. In the second period from 1910 until 1968 there was increased research interest in conduct problems of children as researchers attempted to identify the causes of inappropriate behaviours. This culminated with the first categorisation of Conduct Disorder as an official category in 1968. Thus the final period begins in 1968 and is marked by a rapid accumulation in the knowledge around

conduct disorders and an increasingly holistic perception of the cause and treatment of conduct disorder, taking into account the individuals interaction with the environment.

The first period marked by the categorisation of delinquency arose from the development of three critical factors: the recognition of childhood and adolescence as distinct developmental periods, secondly the increasing presence of children in the public space that represented a problem for the general public; and the emerging discipline of criminology that developed theories around the cause of criminal behaviour. The initial research around delinquency was through the lens of biological determinism. Biological explanations were challenged by psychological explanations at the start of the 20th century as a result of the increasing popularity of Freudian psychoanalysis. Psychoanalysis became the main theoretical approach and remained so until the 1960s when it gradually was replaced by the social learning perspective of Albert Bandura and Gerald Patterson.

In the last 30 years, two key frameworks in the contemporary understanding of conduct disorders have emerged. Uri Brofenbrenners Ecological Systems Theory has contributed to insight into the role of different environmental systems in development and maintenance of conduct disorders. Developmental psychopathology has helped to integrating previous theories and perspectives, and has contributed to the understanding of how biological, cognitive and environmental factors can accumulate to increases the risk of a pathological outcome.

The historical perspective demonstrates that theoretical explanations are critical to not only explaining the cause of conduct disorders, but also the treatment and interventions in the medical, educational and justice system. Historically, treatments of conduct disorder have drawn upon psychoanalysis, individual psychotherapy, and behaviour and cognitive orientated interventions. Today the most successful treatment draws upon a variety of theoretical backgrounds and the historical developments and understanding of conduct disorder.

Table of contents

1	INTRODUCTION	1
1.	1 The aim of the thesis.	2
1.	2 Research Problem	2
1.	3 Definition of key terms	4
	1.3.1 Conduct Disorder	4
	1.3.2 Oppositional Defiant Disorder	5
	1.3.3 Delinquency	5
1.	4 Structure of the thesis.	6
2	METHODOLOGY	8
2.	1 Critical Realism	8
2.	2 Historical research	10
	2.2.1 The phases of historical research.	10
	2.2.2 Primary and secondary sources of historical data	11
2.	3 Text Analysis	12
2.	4 Reliability and validity of the data	12
2.	5 Summary	13
3	THE HISTORICAL BACKGROUNDS OF CONDUCT DISORDERS	15
3.	1 The historical context of behavioural disorder.	15
3.	2 Early biological explanations of conduct and delinquency.	16
3.	3 Early psychological and environmental explanations	19
3.	4 Treatment in the educational and justice system.	22
3.	5 Summary	24
4 ′	ΓHEORETICAL EXPLANATIONS OF CONDUCT DISORDERS	25
4.	1 Psychoanalytic theories.	25
4.	2 Social Learning theory	28
4.	3 Eysnecks biosocial theory of crime.	31
4.	4 Cognitive theories.	32

	4.5	Personality theories.	34
	4.6	Ecological Systems Theory	36
	4.7	Developmental psychopathology	38
	4.	7.1 Moffitts' dual taxonomy	40
	4.8	Summary	41
5	INI	DIVIDUAL AND CONTEXTUAL FACTORS IN THE DEVELOPMENT OF	
C	OND	UCT DISORDERS.	42
	5.1	Biological factors.	42
	5.2	Individual functional factors.	44
	5.3	Hereditary	46
	5.4	Gender	47
	5.5	The family	48
	5.6	Peer influences as a contributing factor.	50
	5.7	The school	51
	5.8	Summary	52
6	CL	ASSIFICATION AND PREVALENCE	54
	6.1	The initial classification of mental disorders.	54
	6.2	The developments of conduct disorders as a diagnostic category	55
	6.3	The occurrences of conduct disorders in the general population.	58
	6.4	Comorbidity	60
	6.5	Assessment	61
	6.6	Summary	63
7	IN	TERVENTION AND PREVENTION	64
	7.1	Individual focused interventions.	64
	7.2	Family interventions	66
	7.3	Multi modal interventions.	68
	7.4	Interventions and prevention in the education system.	69
	7.5	Summary	71

8	SU	MMARY AND CONCLUSION	72
	8.1	The historical context of conduct disorders	72
	8.2	The theoretical foundations of conduct disorders.	74
	8.3	The changing diagnostic criteria.	76
	8.4	Final words	78
В	ibliog	graphy	79

1 INTRODUCTION

"Our youth today love luxury. They have bad manners, contempt for authority, disregard older people. Children nowadays are tyrants. They contradict their parents, gobble their food and tyrannize their teachers." (Attributed to Socrates. 469 - 399BC; cited in Watson 1970:242).

Throughout history, older generations have perceived problems in the behaviour and actions of children and adolescence. However, while some rebellious and deviant behaviour is a part of normal human development, there are some children and adolescences whose behaviour falls outside what is considered as normal. In these cases behaviour can reach extremes that causes significant problems for themselves, their peers, family and teachers. These individuals are marked by chronic oppositional behaviour towards authority figures, and in the more serious cases, violation of the basic rights of others. Their behaviour can have long-term consequences, impacting upon their ability to live successful and happy life as adults. They are at a high risk for developing a wide range of social and emotional problems, and having martial, occupational and legal problems as adults.

Although these behaviours are not new phenomena and have a historical foundation, it was not until 1968 that conduct disorders became a medical diagnosis. Since then it has became one of the most extensive researched child and adolescence medical condition as well as one of the major reasons while a child or youth will be referred to an mental health facility (Thomas 2010).

1.1 The aim of the thesis.

The aim of this thesis is to identify the historical origins of conduct disorder and to trace its development to its contemporary understanding. Conduct disorders is of prime importance to the work of the educational psychologist thus this thesis contributes to the field of educational psychology through providing a psychological and educational historical analysis of conduct disorder. This in turn will give educational psychologists and other mental health workers an in-depth comprehension of both the contemporary and historical understanding of conduct disorders, providing insight to the social and cultural context that shapes the knowledge and treatment.

Due to the fact that the school makes up the largest arena in a child's life outside the home, it is essential that teachers, educational psychologist and other mental health workers have a sound knowledge about conduct disorders, what causes them and how they can be treated. Significant to the nature of conduct disorder is that the school is the place where the child frequently encounters demands and regulation. Subsequently, children with conduct problem are very visible in the school. Successful intervention and prevention requires funding and often a change in systematic perspective, thus knowledge is also important on an administrative level.

1.2 Research Problem

The history of conduct disorder is relatively new in the field educational psychology. However if one takes a historical approach one can identify conduct disorder as arising out of the historical understandings of delinquency and juvenile crime. To understand the

significance of the development of conduct disorder for the individual student and educational psychology one has to understand the historical and psychological origins of the term.

Perceptions on the cause and treatment of conduct disorders have changed throughout history. Initially the focus was directed toward the individual where the problem was seen to exist within the person. The contemporary understanding of conduct disorders are characterized by a holistic approach, were the problem is a result of the interaction between the child's individual characteristics and the environment. Perception of the origin of the problem defines the treatment the disorder, subsequently, to fully understand the best practise it is necessary to understand the underlying theories.

From this premise, three problems can be identified that are in need of research. First, is the question of the historical context:

What is the historical foundation of conduct disorders?

Second, is the theoretical understanding:

What are the major theoretical explanations of conduct disorders and how are they reflected in the causal explanations and interventions?

The third question is how the theoretical development has influenced the diagnostic categories:

In what degree and kind have the theoretical understanding of conduct disorders developed, and how is this development reflected in the causal explanations and treatment of conduct disorder?

1.3 Definition of key terms

Fundamental to understanding the nature and boundaries of conduct disorders are the differences and similarities between Conduct Disorder, Oppositional Defiant Disorder and Delinquency, thus is essential to define these terms. Key to establishing working definitions are in the diagnostic manuals used in the mental health system.

1.3.1 Conduct Disorder

Conduct disorders are a diagnostic category within medicine. There are two diagnostic manual used by the mental health services: The World Health Organisation (WHO) that publish The International Classification of Diseases (ICD) and the American Psychiatric Association (APA) that publish the Diagnostic and Statistical Manual (DSM). The first clinical diagnosis of conduct problems appeared in 1968 in DSM-II and in 1969 in ICD-8 under the name "Behaviour disorders of childhood". In 1980 the disorder separated in DSM-III into two different diagnoses, Oppositional Defiant Disorder and Conduct Disorder to distinguish between two different clusters of symptoms.

The essential features of Conduct Disorder are concentrated around the violation of basic rights of others or major age-appropriate societal norms. The behaviour can be group into four main categories that together make up the diagnostic criteria: Aggressive behaviour that may cause or threatens to physical harm other people or animals, behaviour causing loss or damage to property, deceitfulness or theft, and serious violations of rules. The behaviour must have been evident for at least 12 months and cause significant impairment in daily living (APA 1994).

1.3.2 Oppositional Defiant Disorder

Oppositional Defiant Disorder shares many of the features of Conduct Disorder, but without the physical aggression and the seriousness of conduct. The main features of Oppositional Defiant Disorder are negativistic, defiant, disobedient and hostile behaviour towards authority figures. Individuals suffering from Oppositional Defiant Disorder are characterised by the frequent occurrence of loosing their temper, blaming other for their own mistakes, being easy annoyed and actively refusing to comply with request from adults. This has to be a recurrent pattern that has to be present for more than six months before a diagnosis can be given (APA 1994).

There is still disagreement whether Oppositional Defiant Disorder and Conduct Disorder are qualitatively or quantitatively different from each other (WHO 1992). However, in DSM-IV, Oppositional Defiant Disorder is viewed as a less severe version of Conduct Disorder, meaning that everyone that receives a diagnosis of Conduct Disorder would have met the criteria for Oppositional Defiant Disorder at a previous stage. If the individual meet the criteria for both diagnoses, the diagnosis of Conduct Disorder takes precedence over Oppositional Defiant Disorder (APA 2000; Earls & Mezzacappa 2002). Taking the position that Oppositional Defiant Disorder and Conduct Disorder differs in degree and not kind, this thesis will use the term "conduct disorders" to encompass both Conduct Disorder and Oppositional Defiant Disorder.

1.3.3 Delinquency

Juvenile delinquency refers to offences conducted by a child or youth. The offences can include criminal activities and status offences, the latter is acts that violate the norm for the specific age group, for example running away from home, truancy from school etc.

(Shoemaker 2009). Some delinquent activities are includes as criteria of conduct disorders, but not all individual suffering from conduct disorders are necessary delinquent. However, delinquents have been used to describe antisocial youth longer than the diagnosis of conduct disorder have existed, so the term is frequently used in earlier literature as well as the literature from criminology.

1.4 Structure of the thesis.

This thesis is structured into eight chapters, including the introduction and conclusion. The first chapter introduces the purpose, nature, structure and limitations of the thesis. The second chapter outlines the methodology, covering the philosophical framework and subsequently the methods employed in this thesis. This chapter will give an overview of the method of historical research, as well as the steps involved in the research process in order to ensure validity and reliability of the research process.

The next chapter presents the historical context from that the diagnosis of conduct disorders grew out of. This chapter takes a closer look at the early work in criminology and psychiatry, with emphasis on how delinquency and antisocial behaviour were explained and treated. Underpinning treatments and explanations are the theories behind conduct disorders. Thus chapter 4 examines the different theoretical perspectives such as cognitive theory and social-learning theory and how these theories structure the development of perception and treatment of conduct disorder.

The identification of individual and contextual factors in the development of conduct disorders is the subject in the fifth chapter. To some extent these factors reflects the theories in chapter four, however the chapter differs with its focus on research findings. The chapter is

structured into biological, individual and environmental factors that can be understood both individually and in interaction with on another, acknowledging the intermingled nature of the factors.

Chapter six is concerned with the diagnosis of conduct disorders. The section is aimed at explaining how conduct disorders have been included as a medical disorder, and how diagnostic criteria have changed throughout the history. It looks at the process of assessing conduct disorder and the different tools available for this purpose. This section also includes a part on the prevalence of conduct disorders and the presence and implications of any comorbid disorder such as Attention Deficit Hyperactive Disorder (AD/HD) and affective disorders.

The final chapter analyses the interventions and preventions of conduct disorders. It traces how interventions have developed through time, and how they are influencing the theoretical background and causal explanations. The chapter examines the different forms of interventions, how they target different areas and environments, as well as what is identified to be the most efficient form of contemporary interventions.

2 METHODOLOGY

The identification and application of a methodology and a philosophical framework to inform and guide the method of research are the defining properties of scientific inquiries. Identification of the background assumptions of the researcher are necessary to inform the reader of the worldview that guides the research. The framework provides the theoretical background shaping philosophical assumption for what can be known about the world, and how certain one can be that this knowledge is true and real. The methods building from philosophical traditions, determines how knowledge is generated, and subsequently what the knowledge consist of. This has particular relevance for this thesis as the perception of conduct disorder and its treatment is dependent upon how one perceives the individual in relation to the social, cultural and physical world.

Thus, the aim of this chapter is to provide the philosophical and methodological background for this thesis. It will outline the ontological, epistemological and philosophical assumptions that provide the foundation for the methodology of research. The chapter is divided into two parts: The first section is concerned with the philosophical foundation that this thesis is build on; it will look at notion of paradigms, how they are defined and how they apply to this research. The second part will examine the methodology of historical research as it is applied within this thesis: the steps of the research process; what sources of data are used; and how the validity and reliability can be assured.

2.1 Critical Realism

To inform the reader of methodology it is necessary to first establish the underpinning philosophical commitments of the research. This has been described by Guba and Lincoln

(1994) through the concept of paradigms, which is the researchers basic value system or worldview.

This thesis is guided by the paradigm commitment of critical realism, the ontological position belonging to the postpositivism paradigm. It can be viewed as a compromise between relativism that defines reality as only apprenhendable in the form of mental and social constructions, and naïve realism that assumes that reality is objective and located outside the individual. Critical realism assumes that reality is real and external to the individual, but is approached through subjective individuals. This implies that knowledge can be extracted but only in a probabilistic sense and must be exposed to examination. It allows room for structural influences as well as the individuals' responsibility for it's own behaviour, which makes it particular useful in studying human behaviour in its natural setting (Clark 2008). Another advantage of critical realism is that its ontology does not limit the methods employed in the research; hence it can be used with a wide range of scientific methods, both quantitative and qualitative.

Epistemological assumptions are concerned with the relationship between the scientist and the research object, or the "knower" and "what can be known" (Guba & Lincoln 1994). The epistemological position under the post-positivistic paradigm is a compromise whereby objectivity is an ideal rather than reality and that findings that are verified and replicated while probably true, but always open for falsification (to be proven wrong). The post positivistic paradigm makes extensive use of peer reviews and the if knowledge "fit" in what is already known about the subject to help determine the validity (Guba & Lincoln 1994).

Under the post-positivistic paradigm guiding this thesis, both qualitative and quantitative methods can be employed. To a certain extent the methods are manipulative and experimental, but in contrast to classical positivism the aim is to falsify hypothesis rather than verifying them (Guba & Lincoln 1994). Rather than go into an indepth description of all the different methods that can be applied underneath this paradigm, the next section will focus on historical research methodology that is employed in this thesis.

2.2 Historical research

Historical research refers to the systematic investigation of past events. The historical foundation of educational psychology has determined its development and present understanding of the field. Historical research exposes the influence of the social, philosophical, intellectual and cultural context in determining conceptions of educational psychology and also challenges us to keep evolving our understanding. Thus, as a research methodology it is particular suited to understand contemporary social phenomena (Saucier Lundy 2008). Conduct disorders are relative newly constructed diagnoses with its diagnostic criteria based on behaviour issues. This makes historical research particular useful in the investigation of the historical context, to broaden the contemporary understanding of the topic.

2.2.1 The phases of historical research.

Historical research can be divided into five distinct phases. The first phase is the identification of the topic. Next is the formulation of a research problem and questions. The third phase is the data collection phase, where the amount of time spent on the third phase will dependent on the availability of resources on the subject of interest. The fourth phase is the analysis of the data and answering the research questions and the fifth phase is writing up a report (Saucier Lundy 2008). However, the separate phases are not necessarily chronological. Rather it is a cyclic process, where the completion of one phase makes it necessary to back to a previous phase. During the course of this thesis, especially in phase three and four, the data collection and data analysis stage were intermingled as the analysis of data sheds some light on additional data needed. Since the research is a dynamic process, it was also been necessary to go back to phase two and adjust the research question upon the completion of the data collection and analysis.

The data used for analysis in historical research can encompass a wide range of objects as well as written records. In the case of this thesis, all the data used is in the form of textbooks and journal articles, which can be divided into primary and secondary sources.

2.2.2 Primary and secondary sources of historical data.

Primary sources are records of information that are created by people directly influenced by the historical event of interest. This can include eyewitness accounts, reports, journal articles, maps, test scores, diaries, music, plays etc. Primary sources can be roughly divided into four areas; written records or documents, quantitative records (numeric), oral records and relics. Written records or documents is the biggest category and can be further divided into two groups based on the intention of the writer: Intentional documents are written to serve as a record of the past, which can include things like a yearbook. Unpremeditated documents refers to documents that is written to serve a immediate purpose without the writer expecting it to be used as a record of the past (Gall et al. 2007). The availability of primary sources is dependent of the era and subject that is studied, and in some instances not available at all, and the researcher would have to turn to secondary sources.

Secondary sources are sources where the events or articles are described by a third person, not directly involved in the event. It can also be the case that the event is described a long time after the event took place. Secondary sources can be created from primary sources, secondary sources or a combination of the two (Saucier Lundy 2008).

This thesis, as of most historical research, employs a mix of primary and secondary sources. Where it has been possible, primary sources in forms of books and journal articles have been

drawn on. However, often due to availability, secondary sources like textbooks and other sources citing the primary source has been used instead. Whether primary and secondary sources are used, they have to be critically examined to ensure that they are valid and reliable (Gall et al. 2007).

2.3 Text Analysis

The data in this thesis is primary and secondary sources of text, which subsequently requires text analysis. This is employed through the process of extracting the meaning of the text, where the meaning derives from and is dependent upon the historical, cultural, social and ideological context. Rather than try to identify the "true" meaning, the process of text analysis aim at extracting all interpretations, which are then considered and scrutinized to arrive at the most likely understanding. Text analysis is critiqued for not being objective, in the sense that the researcher brings with them their own values and background into the interpretation. However, no text can be read outside it social context, and through being awareness of the researchers subjectivity and worldview can lead to a robust analysis (Lockyer 2008). In addition to identifying the meaning in the text and being critically aware of the researchers role in text analysis, the text itself has to be scrutinized to ensure validity and reliability, which is the topic in the next section.

2.4 Reliability and validity of the data

This thesis employs both external and internal criticism in the establishing the validity of the data and thus this thesis. External criticism refers to the establishment of the authenticity of

the source (Gall et al. 2007). This involves scrutinizing the source to make sure it is what it says it is. In the case of when a secondary source is citing a primary source, external criticism is necessary to make sure the citation is correct (Johnson & Christensen 2008). In this thesis, most of the sources are books or journal articles; hence the authenticity of the source is usually not an issue. However, an effort has been undertaken to ensure that all citations in secondary sources are correct, using primary sources where it is possible.

The step after external criticism is internal criticism. This involves judging the accuracy of the information derived from the sources (Johnson & Christensen 2008). Internal criticism is more complex than external criticism and involves several aspects: Positive criticism is to make sure that the meaning derived from the text is the correct one. This includes to check for "vagueness", that appears when words and phrases have not been defined properly, leading to different people and sources putting different meaning onto it. Connected to this is also "presentism" - to think that the meaning of word was the same in the past as it is today. After the criteria for positive criticism is satisfied, the researcher now moves to negative criticism, which involves the establishment the reliability of the document. Three methods are used for negative criticism: Corroboration, which involves checking two original documents to see if they contain the same information. Second method is "sourcing" – meaning to check for where, when and by who the data was created. This enables the researcher to make judgements of the reliability out from the relation of time and place. Third is "contextualization" that involves checking where and when the event took place, so one can place the event in the wider context, and to give a reference point for the accuracy of the information (Johnson & Christensen 2008).

2.5 Summary

The research in this thesis is guided by a postpositive paradigm that includes the ontology of critical realism and a modified dualistic view of epistemology. Under this view, reality is

external to the individual and knowledge can be extracted with a degree of certainty. Research is influenced by the values of the researcher and objectivity is an ideal that is strived for, but not guaranteed.

The choice of paradigm determines what kind of research methodology that can be utilized. This thesis has employed the use of historical research that involves five distinct phases. These are employed in a cyclic matter, where one step in the process may make it necessary to go back to a previous step. The data in this thesis is the form of text, and text analysis is used to derives its meaning. There has been used a mix of primary and secondary source, mainly made up of journal articles and textbooks. To ensure the reliability and validity of the sources, they have been subjected to external and internal criticism.

3 THE HISTORICAL BACKGROUNDS OF CONDUCT DISORDERS.

The aim of this chapter is to provide an overview of the historical background for the development of conduct disorders. Three distinct periods can be identified:

The first period establishes the historical context of conduct disorders. This period is marked by the growing realisation that childhood and adolescence were a distinct phase of development. Consequently interventions began to be implemented when the youth exhibited social and emotional problems. The second period spans the stage from 1910 to 1968 when behaviour disorders were first included in the medical classification system. In this period there was an increasing recognition of the role of both psychological and environmental factors in shaping behaviour and hence a change in the perception and treatment of antisocial youth. The third period is from 1968 until today and is marked by a rapid growth of knowledge and a change to a holistic perspective on conduct disorders and the individual.

3.1 The historical context of behavioural disorder.

Child and adolescence disorders are dependent of the recognition of childhood as a developmental stage. Prior to the 20th century, children were largely treated as miniature adults. Children had economic value, and worked on farms and in factories, generating food and income to the family (van Drunen & Jansz 2004). Around the mid 19th century this started to change. Childhood begun to be recognized as a time for play and leisure and there was an increased focus on the upbringing of the child. This is referred to as "The child study movement". The increasing interest in children among both professionals and laymen led to several books written about the development and cognition of children (van Drunen & Jansz 2004). At the turn of the century, the developmental phase of childhood was supplemented by

adolescence. In 1904, Stanley Hall published the book "Adolescence". This book marked the beginning of the recognition of adolescence as a distinct developmental period (van Drunen & Jansz 2004).

Thus by the end of the 19th century the perception of children had changed as factory acts increasingly effective legislated against child labour. Children lingering in the streets subsequently became an influential social problem. In addition changing political and social conditions meant that children were seen to need knowledge and skills for the new requirements of a national economic and political democratic structure (van Drunen & Jansz 2004). Thus, compulsorily schooling was introduced as an instrument of social control to keep the children of the streets, as well as to satisfy the growing economical and political needs of the new nation state. This lead to that truancy officers were employed to make sure that the children actually stayed in school (Laurence & McCallum 2003). At the same time "Status offences" was introduced to give authorities increased power when the children was not breaking the actual law (Costello & Angold 2001).

With the acceptance of childhood and adolescence as a developmental stage and the establishment of compulsory schooling, the cause of delinquency became a focus. The initial research towards this came from the establishing field of criminology.

3.2 Early biological explanations of conduct and delinquency.

The initial explanations of behavioural problems are founded at the beginning of the 19th century when the neuroanatomist Gall came up with the concept that the brain was divided into faculties. Each faculty represented physical properties and personality characteristics

within an individual. The magnitude of ones faculties could be read by measuring the bumps and lumps on people's skulls. A bump or a dump would be proportional to the space of the faculty, so thereby through measuring of these bumps or depressions in the skull, one could make statements of individuals' properties. The analysis that was conducted is referred to as phrenology. Phrenology grew in popularity during the 1800s and had an impact on both the pathology of psychology as well as education (Hergenhahn 2005). Phrenology lay the foundation for biological determinism that would be the leading line of thought surrounding delinquency and crime through the 19th century and the start of the 20th century (Burkhead 2006).

The extension of phrenology to the search of crime came through Caesar Lombroso. Lombroso was an Italian physician who was dedicated to the study of prison inmates. Through examination and biopsy of inmates' skulls and bodies Lombroso believed to have indentified distinctive physical features that made it possible to distinguish the criminal man from ordinary men. Lombroso referred to this as the science of "Criminal Anthropology". In 1876 Caesar Lombroso published the first edition of a "Criminal Man" (Lombroso et al. 2006). A wide range of different characteristic of the criminal was described in the years to follow by Lombroso and his students. Red hair, cauliflower ears, protruding jaw and big eyebrows were all identified as physical marker of a criminal (Lombroso et al. 2006).

The "Criminal man" came out in five editions, each edition more comprehensive than the previous one. Lombroso expanded his theory on crime to account for different types of criminals. He added to the "born criminal", the "insane criminal", the "hysterical criminal" and the "occasional criminal" among other categories (Lombroso et al. 2006). He also provided explanations of crime and ideas for prevention. Lombroso included children in his study, and found the same physical "abnormalities" among the child offenders as he had found with the adult criminals. Lombroso thought that all children were born immoral but children could be "educated", in the sense that living with honest people would overcome their criminal tendencies. This only accounted for a part of the children, others were born criminals and not susceptible to reform and these should be prevented born by prohibiting sexual intercourse for alcoholics and offenders (Lombroso et al. 2006).

Biological explanations lay dormant for a while, but gained new life again in 1939 with the a study published by the American anthropologist Enerst Hooten (Burkhead 2006). He studied an extensive numbers of criminals and compared them with a smaller sample of non-criminals. Measuring physical traits like skull size and the length of nose bridge, Hooten found small but significant differences on the majority of these features. He concluded that the criminal population was inferior, without specifying what was implied with inferior or how it was measured. Hooten study was comprehensive and well financed, but has been heavily critiqued afterward. He was also criticised for arguing for a "pure racial type" (Burkhead 2006).

In 1949 William Sheldon published his work on juvenile delinquency and the correlation with physique and concluded that delinquency was related to a specific (mesomorph) body type. Sheldon divided body type into four different categories; mesomorphs (muscular, athletic physique), endomorphs (soft and round), ectomorphs (tall and lean) and a balanced physique (when not clear what category they belonged to)(Burkhead 2006; Shoemaker 2009). This finding was replicated in 1956 by Glueck and Glueck in their book "Physique and Delinquency" (Glueck & Glueck 1956). Glueck and Glueck compared a sample of 500 persistent delinquent and 500 "normal" youth and also found that delinquency was in correlation with a mesomorph body type (Glueck & Glueck 1956). It should also be noted that Glueck & Glueck was friends with Enerst Hooten that later have being accused for having a racist agenda (Burkhead 2006).

Even if there was research like the ones conducted by Hooten, Sheldon and Glueck published up through the 20th century, biological determinism to a large extent lost its popularity as explanation for delinquency as psychological and environmental explanation gained hold. A reason for this was the gaining popularity of psychoanalytic theory that influenced lot of professionals working with child and youth.

3.3 Early psychological and environmental explanations

Sigmund Freud developed the psychoanalytic theory at the end of the 19th century. Psychoanalytic theory explained the cause of mental illnesses in terms of unconscious processes that came through in an interaction with the environment. It offered an alternative to the deterministic biological view that had coloured the European thinking around delinquency and antisocial behaviour. Together with the larger mental hygiene movement and developmental psychology, it shifted the focus from the physical health of the child to the psychological health (Ludvigsen & Seip 2009).

The application of psychoanalytic theory in the work with antisocial children did not come directly from Freud himself. The psychiatrist William Healy is credited with being the first person to apply psychoanalytic theory in the work with antisocial children as well as methodological studying them. Healy was first educated as a physician, but during his post grad studies in neurology in Europe he was introduced to Freud's psychoanalysis. On return to the United States he started the first child guidance clinic in the country. The clinic was a research and treatment facility connected to the Chicago Juvenile Court (Snodgrass 1984). Healy drew on psychoanalytic ideas in his work with children as well as he expanded these ideas with experiences and thoughts from his own work. In 1915 he pulished the book "The individual delinquent" where Healy also introduced his multifactor theory of delinquency. Healy identified three major causes for delinquency amoung children: Metal abnormality, defective home conditions and abnormal physical conditions (Snodgrass 1984). The book was based upon casestudies of individual delinquents and with its dynamic view of the human personality, it in many ways represented a new perspective in thinking around the individ and behaviour (Fink 1938).

Europe was lagging behind U.S in the changing perspective in thinking around delinquency, but in 1925 the Austrian August Aichhorn published his book "Wayward Youth" which the

psychoanalytical principles were applied to the cases of delinquent and antisocial children (Aichhorn 1925). Aichhorn believed that children were born asocial in terms that they wanted immidiatly sensory gratisfaction. Later through education and conditioning from the society they learned to choose long term goals over short term gratisfaction. His view of the cause of antisocial behaviour is expressed as following:

"If we regard all behaviour as the result of psychic forces in the psychoanalytic sense, then we must think of dissocial behaviour, too, as so determined, and we can express the desired formula thus: dissocial behaviour indicates that the psychic processes which determine behaviour are not functioning harmoniously" (Aichhorn 1925:38).

When the "psychic processes" was malfunctioning this could be traced back to an experience in the child's upbringing. Aichhorn thought about the work with delinquent children as reeducating them and himself as an educator. Only if he thought there was a physical or mental illness that was the cause, he would refer them to a psychiatrist (Aichhorn 1925). While seeing antisocial behaviour as a result of psychic processes, Aichhorn did not out rule the role of the environment in the contribution to delinquency. He believed that some children was predisposed to delinquency, but believed that an unfavourable environment was necessary to bring it out (Aichhorn 1925).

At the same time as Aichhorn was running his school for delinquent children in Austria, Alexander Sutherland Neill founded the "Summerhill" school and child guidance clinic in England. Neill also based his work with antisocial child and adolescence on psychoanalytic ideas. He believed that delinquency was caused by repression of natural drifts and the imposing of moral standards that was impossible for the youth to live up to (Neill 1926). Summerhill school was run on democratic ideals, and a strong believe in if the children was not told off, there would be no need to engage in deceitful behaviour (Neill 1926). The Summerhill school remains famous for its controversial views of education and is still popular today.

While a lot of prominent child and youth researcher in the 1920 had a psychoanalytical background, not everyone had a set theoretical position. In a journal article by Wile in 1929, he argued for a diverse approach where the treatment is fitted to the symptoms, subsequently

advocates a model that identify multiple causes for conduct problems instead of one underlying cause. According to Wile belonging to any specific school or discipline was limiting the viewpoint one could take (Wile 1929).

One who did not belong to the psychoanalytic school was Cyril Burt. In 1925 he published the book "The young delinquent" (Burt 1925), which was a comprehensive book about the cause and the treatment of delinquent youth. Burt did not take a psychoanalytic stance, but rather had a more elective approach to working with delinquents. While Burt acknowledges "Hereditary Conditions" as contributing factor to delinquency, he refutes the idea of a born criminal. Instead he acknowledges the genetic contribution to a predisposition, but believes that the environment the determining factor (Burt 1925). He explains the finding that there is more delinquent youths in families with criminal parent as

"The suggestion is plain; the child, after all, may be suffering quite as much from the vice or the bad management brought into the home by a dull or an immoral parent, as from any dullness or immorality that he himself might have inherited" (Burt 1925:56-57).

In illustration, while Healy had attributed 0.5 % of his sample to poverty as the major factor, Burt found in his sample of delinquent youth in London poverty as the major factor in half the cases (Burt, 1925). Burt divided environmental factors into two main categories, the home and the ones outside the home. He further divided the home into four sub-sections: poverty, defective family relationships, defective discipline and vicious home (Burt, 1925).

Burt was also involved with intelligence testing and reports that in his London sample the average intelligence among the delinquent is 90 percent of what it is in the normal proportion (Burt, 1925). He concludes in "The Young Delinquent": "Of all the psychological causes of crime the commonest and the gravest is usually alleged to be a defective mind. The most eminent authorities employing the most elaborate methods of scientific analysis, have been led to enunciate some such belief" (Burt 1925:296). This was in line with the common census at the time as historically "feeble-mindless" had been linked to criminality and juvenile delinquency (Fink 1938).

In the early 1900 the Binet intelligence test was translated and introduced in America by Henry Goddard. He concluded in 1914 after have done research on delinquent youth in his training school, that 25 % of them was "mentally defective" and it was in the nature of "mentally defective" to be delinquent (Fink 1938). A lot of the extreme figures could be attributed to faulty tests, but there was a strong improvement in the development of the I.Q. tests at the start of the 20th century. By the 1925 the test start to become more reliable, and psychologist as Burt had a strong belief in and put a lot of emphasis on them. (Fink, 1938).

By the end of the 1920s the understanding of the causal factors involved in the development of delinquent youth included both environmental and psychological factors. While the psychoanalytic approach was mainly concerned with the unconscious processes, most mental health workers took both domains into account in the research and treatment of delinquent youth. The changes that was happening in the understanding of antisocial behaviour were to a degree parallel with the treatment of the delinquent children in the both justice and educational system, which will be looked upon in the next section.

3.4 Treatment in the educational and justice system.

The legal system had through the 19th century largely treated children as adults, but towards the end of the century, as reflective of the changing of perception of young people in the theoretical literature, this started to change. In England, the Children Act was introduced in 1908 and opened for a more humane treatment of children. From then on

[&]quot;...no child under fourteen may now be sentenced to imprisonment; and no young person between fourteen and sixteen may be so sentenced unless the court certifies that he is of so unruly a character that he cannot be detained in a place of detention provided under this Act" (Burt 1925:106).

The shift in focus from punishment to rehabilitation was further build up under through the establishment of the juvenile courts. They operated under the conception of *parens patriae*, the responsibility of the state to act as a parent in the best interest of the child (Weijers 2004). The main treatment at the time was removal from the home and in the new Children Act four institutions was named where children might be sent: Prison (if over 16 of age), place of detention, industrial schools and reformatories (Burt 1925). The seriousness of the crime should reflect the choice of intervention, with the more serious and persistent of the offenders send to reformatories and then jail (Burt 1925). This change from punishment to rehabilitation also became evident in the education system.

At the end of the 19th century, it was considered the schools duty to make polite and honest citizens and the school was often hold responsible for the children's behaviour in and outside the school. The success of the school, teachers and educational system was measured to what degree this was fulfilled (McGeorge 1985). The main tool used in shaping character and to develop knowledge was discipline. This was enforced in a military manner through frequent use of corporal punishment (McGeorge 1985). At the start of the 20th century this was changing and in 1907 Bagley published the first book on classroom management. This book separated "routine factors" like confusion, from "judgment factors" like inattention. The routine factors could be fixed through drilling the students, but judgment factors while required the teacher to give the individual student attention. However, the next twenty years the focus was still on discipline and military style drills, and it was closer to the mid 20th century before there were changes evident in the educational system in the treatment of behaviour problems (Brophy 2006).

Up until 1930 the job of educational psychologist was predominately intelligence testing to stream children into different classes based on their ability (Ludvigsen & Seip 2009). The teachers were first and foremost concerned with the academic purpose of schoolwork, and the mental health of students was not considered part of their job. This changed through the mental hygiene movement with an increased focus on the mental health of the students. Teacher was now expected to respond to children emotional as well as academic needs (Clarizio & McCoy 1970). In a report from 1938 the South African educationalist Malherbe

argues for a more individual treatment of problem children and to discontinue the use of corporal punishment, suggesting that it leads to increased resentment and aggression in the children (Malherbe 1938). In 1950s this thinking caught on and as it will appear in chapter 4 a lot of these changes came again from people that had been influenced by psychoanalytic theory in their work.

3.5 Summary

As it has been outlined in this chapter, multiple factors have contributed to and influenced today's view of antisocial children. While Conduct Disorders itself is a new disorder, it has its origins in the treatment of delinquent children in the 19th century. Delinquency came about through the establishment of childhood and adolescence as developmental periods, and as a result of children roaming the streets. The invention of status offences increased the power to the authorities and made it possible to treat the children as they were criminals before they had committed any criminal offences. While biological determinism influenced early criminology, the combination of psychoanalytic theory, together with methodological research opened for a more balanced view on behaviour problems. Hence, by the end of the 1920, most research and treatment took into account both psychological and environmental factors. The treatment of the antisocial children in the justice and educational system, was to a large degree a reflection of the current theories about their cause and with the introduction of the juvenile courts opened for a more humane treatment of child and youth. As it will become more apparent later in the thesis, the discussion that went on in this early history of conduct disorders have been repeated up through the years and is evident in the contemporary perspectives. The next chapter explains the underpinning theoretical positions that supplied the biological, psychological and environmental explanations of conduct disorders.

4 THEORETICAL EXPLANATIONS OF CONDUCT DISORDERS.

This chapter seeks to provide insight in the theories that has shaped the understanding and interventions of conduct disorders. From the field of psychology theories are understood as ways to describe, explain and predict changes over time in an abstract model that is a replica of the real phenomena. Thus the theories do not explain the reality in its whole, but only the parts that is chosen to be representative. Through the establishment of childhood and adolescence as developmental periods and the increasing perceived problem of delinquency, antisocial behaviour started to be regarded as a medical problem. Up through the 20th century there was an increasing amount of research on the cause of antisocial behaviour, and subsequently a large growth in theories aimed at explaining antisocial behaviour.

4.1 Psychoanalytic theories.

Psychoanalytic theory changed the perception of psychopathology, and had consequences on the research and treatment of delinquency and was the main framework in the work with antisocial youth up until 1960-1970. A lot of this success can be attributed to Anna Freud's work with children and the development of ego-psychology. Ego-psychology as a derivation of psychoanalytic theory, became the dominant direction in child psychiatry in many nations and was influential in shaping the way antisocial behaviour in youth are perceived (Ludvigsen & Seip 2009).

Ego psychology is developed from psychoanalytic theory and divides the human mind into three parts: the Id, Ego and Superego, each serving a distinct function. The Id is the unconscious part of our mind. It is made up of our biological needs and wants, instinctual wishes and sexual desires. The Id is present at birth and gives us psychological energy and motivation to act. The Ego is the conscious and rational part of our mind; it is here that logical thoughts take place. The Ego is battling with the needs of the Id and the demands of the external world. The third part, the Superego develops later in human life, and represents the social-moral component of a person's life. It is made up of the moral codes that are passed onto us through our upbringing from our parents, religion and the rest of the society. However, the Superego is more an ideal than a reality and the Ego have to balance the demands of the Id with the Superego. If people act against their Superego, guilt and worry is often the result (Muuss 1996).

For a person to be well functioning, the Ego, Id and Superego have to be in balance. Delinquency is often explained in psychoanalytic terms as Id dominant behaviour, meaning that the individual are concerned with biological need and wants without thinking about the consequences of their actions. Since the different parts are of the mind are developed at different stages in our childhood, a psychoanalyst will often trace behaviour later in life to unresolved conflicts in the childhood (Muuss 1996).

Some practical applications of ego-psychology in the work with antisocial children, came through the work of Fritz Redl. He published numerous books and article based on his work in residential home, summer camp and educational setting. Redl's book "Mental hygiene in teaching" (1959) was aimed at teachers and offered theories for explanation of problem behaviour in schools and practical tip on classroom management. In this book four types of techniques were identified to use with students prone to acting out their frustrations or personal problems: supporting self-control, task assistance, reality and value appraisal. These techniques were meant to reduce frustration and increase self-esteem in children inclined for antisocial behaviour, and became valued classroom management techniques (Brophy 2006).

Psychoanalytic theory was fading, but still present in the 1970s with the focus apparent through textbooks. In Clarizio & McCoys "Behavior disorders in school-aged children" (1970) delinquent youth was categorized into three different groups: "the sub-cultural delinquent" "psychopathic delinquent" and "neurotic delinquent". The psychodynamic origins of the terms are clearly evident through categories as the "neurotic delinquent", which was also referred to as "weak ego" delinquent and theories where delinquency in children of middle class is viewed as an attempt to achieve masculinity (Clarizio & McCoy 1970).

This dominance of psychoanalytic approaches in classroom management became critiqued at the start of 1970. Educators felt that the mental health professionals made unreasonable demands of teachers as they were expected to teach and act as a counsellor at the same time. The teachers themselves had not the training or time to be concerned with the unconscious life of their students as the psychoanalytic approach demanded, thus the more direct and effective approach of behaviour management became increasingly favoured (Clarizio & McCoy 1970).

The cause of the decline of the popularity of psychoanalytic theory in the treatment of conduct disorders, is thought not to be because the hypothesis had been proven wrong, but rather from the lack of empirical support and effective interventions (Rutter & Giller 1983). At the same time as psychoanalytic theory lost it popularity, a new direction towards social learning theory, takes hold much on the basis of its empirical support and effective measurable intervention.

4.2 Social Learning theory

An important part in understanding how the environment contributes to the development and maintenance of antisocial behaviour came from the theoretical insights of social learning theory. Social learning theory came into the picture at the same time as the popularity of the psychodynamic approach started to decline. The foundation of social learning theory came through the work of the psychologist Albert Bandura, which during the 1960s conducted a series of experiments where he investigated the effect of imitation learning on children. In these studies the children first watched a tape of an adult that either behave prosocial or aggressive in a playroom. Afterwards the children were let into the same playroom, with the same toys and their behaviour was observed. Bandura found that the children who had been watching the tape where the adults behave in an aggressively, imitating the adults behaviour and behaved aggressive themselves to the point were they were coping the exact actions of the adult (Bandura 1969).

Bandura developed the study further to investigate the effect of punishment and reward had on the imitation of behaviour. In the new study, there were two experimental conditions: In the first condition, the adult role models were rewarded for their antisocial behaviour. In the second condition the role models were punished for their antisocial behaviour. Bandura found that only those children who watched the first conditioned, imitated the antisocial behaviour afterwards, emphasising the important role rewards play in shaping human behaviour (Bandura 1969).

The initial work of Bandura made way for numerous studies on the effect of imitation on aggression. However, the experiments were done in laboratories and did not always transfer over to real life settings (Rutter & Giller 1983). Thus, Patterson and colleagues at the Oregon Social Learning centre started to use field studies to look at how the social learning processes applied to the family setting and how this could help explaining antisocial behaviour. This lead to the development of social interactions perspective on antisocial behaviour (Patterson 1975, 1982).

Patterson and colleagues developed the "performance theory" of coercive family processes (Patterson 1982). The theory suggests that there are a number of factors in the parenting style that in interaction with the child leads to an unfavourable outcome. Of special importance was the "coercive cycle". This is when parents put demands on children in a negative and hostile way. The child reacts with aggression, which in turn leads to increased hostility from the parents' side. At this point the parents threatens the child with consequences if their demands are not followed up. The child responds with increasing anger, and the parents subsequently back off, feeling that the demand is not worth the trouble it is causing. In this way aggression become a learnt behaviour, where the child comes to understand that if the situation escalates far enough the parent will back down (Patterson 1982). The parent and child can engage in coercive processes from when the child is as young as 24 months stressing the importance of early interventions (Snyder et al. 2003).

As the coercive process gets reinforced, it becomes internalized and generalised by the child. When the child encounters new situations and environments, they bring their reaction patterns with them. Patterson and colleagues (1989) outlines a developmental progression for antisocial behaviour: In early childhood, poor parental discipline and monitoring lay the foundation for antisocial behaviour through the coercive process. The behaviour responses become internalized and the child bring them with them it into middle childhood. In the middle childhood, the child has trouble meeting the demands of the school. This might lead to poor academic result and lacking motivation, which again will reinforce the cycle (Patterson et al. 1989). Fuelling the process is the rejection from prosocial peers, making the child seek acceptance in deviant peer groups. This provides the children with antisocial role models, and there is a direct link between the association with deviant peers and increase in delinquency (Snyder et al. 2003). One of the consequence of the developmental model is that middle childhood would be a sensitive period to target for interventions, to prevent affiliation with deviant peer groups and drug use (Snyder et al. 2003).

In the book "Coercive family process" (Patterson, 1982) there are propose four family management variables that are supposed to account for the individual differences in antisocial behaviour. These include: (1) house rules (2) monitoring, (3) contingencies, and (4) problem solving, negotiation and crisis management. These variables can explain a lot of the differences that previously had been attributed to factors like broken homes. Patterson further suggests that the effectiveness in how the families manage across these variables are dependent on number of crises and stress the family experience in their daily life (Patterson 1982). The same parents that have problems with managing these factors are also found not to reinforce wanted behaviour. The consequence might be to much focus on negative behaviour, and the child being negative reinforced for unwanted behaviour, in the long run leading to the children receiving more attention towards negative than positive behaviour (Patterson 1982; Patterson et al. 1989).

Compared to other theories regarding antisocial behaviour, one of the advantages with social learning theory, is the relatively ease in testing the specific components of the theory in experimental designs (Snyder et al. 2003). This makes it suitable to develop intervention where one alters the specific components of the interaction. Parent Management Training has proven to be one of the more effective interventions in treating conduct disorders and is based on social learning theory. In Parent Management Training the parents undergo education around the processes that are going on in the family, and with help and advice are able to turn these around. (Burke et al. 2002). Parent Management Training will be discussed further in chapter 6.

Patterson's theory is referred to as "interactional analysis". It applies theoretical learning principles to the interactions between individuals. It does take into account the role of genetic in the development of antisocial behaviour, but places less importance on it than other theories (Patterson 1982). The next theory that is explored is also based on learning theory, but puts a stronger emphasis on the biological make-up of the individual.

4.3 Eysnecks biosocial theory of crime.

Classical learning theory suggests that humans learn through the principle of classical conditioning. In short, this refers to that the pairing of a neutral event with an aversive event will lead to the neutral event changing over time to become aversive. Hans Eysenck is famous for his use of classical learning theory in combination with biology to explain crime and antisocial behaviour. Starting from the point of view that humans are selfish beings, the question for Eysenck was not so much why people commit crimes as why they don't. His theory proposes that classical conditioning both apply when social behaviour is learnt and to our consciousness (Raine 1997). Through our upbringing the environment reacts to our selfish deeds, for example as when a child that steals a cookie will receive a reprimand. In the future, when the child sees a cookie again and wants to steal it, the uncomfortable feeling from the last experience comes back and prevents the child from doing it again. Thus, correctly socialized individuals do not commit crimes because a related previous negative experience has conditioned them not to (Raine 1997).

Eysenck further proposed that a genetic factor in people whom display antisocial behaviour affects their central nerve system, which in turn have consequences for their personality and behaviour (Raine, 1997). The level of arousal in the central nerve system can be measured through resting heart rate and the skin ability to conduct electricity. Several studies shows that antisocial people have lower levels of arousal compared to the control groups. As a consequence they will need stronger stimuli for the classical conditioning to have the same effect as in people with normal levels of arousal (Raine 1997). Following from this, criminals raised by normal parents will have low levels central nerve system arousal and be hard to condition, but criminals raised by antisocial parents will have normal levels of arousal since they are learning antisocial behaviour (Raine 1997). Eysenck's biosocial theory have received mixed support, with a lot of criticism for putting to much emphasis on the biological differences in determining social behaviour (Burkhead 2006). However, it is still an important line of research and probably would provide more answers in the future as gene technology continues to improve.

Both Pattersons interactional analysis and Eysenck biosocial theory is based on proven learning theoretical principles that behaviour is learned through reinforcement. Behaviour theory in its most radical version, state that all behaviour is a result of the individuals' response to an external stimulus. This view of human nature has been critiqued for being mechanical and manipulative, and put a lot of responsibility for the antisocial youths behaviour on the parents. Today, behaviour theories are often combined with cognitive theories, which also became increasingly popular during the 1960 and 70s, and offered an alternative to behaviour theory.

4.4 Cognitive theories.

As it was described in chapter 3, cognitive processes as intelligence were identified to have a causal relationship with delinquency and antisocial behaviour at the start of the 1900. At the time they knew little about cognitive structures to explain why and how this relationship occurred. It was not before the 1950-60 cognitive theories became more popular and attracted an increasing amount of research.

Cognitive theories are concerned with how human perceive and think about the world. They derived from cognitive psychology, a discipline within psychology that is concerned with human knowledge, processing and thoughts. This includes research on attention, memory, perception etc. (Neisser 2009). Cognitive theories suggest that behaviour is not only a result of stimuli and response, but that how we feel and think about a stimulus affects how we respond. Cognitive theories made an impact in many scientific directions as it opened up for scientific study of higher thought processes where earlier introspection had been the only method (Neisser 2009).

Social cognition is a subcategory of cognitive theories, which tries to describe the cognitive process involved in social interactions. Social-information-processing theory is a framework that has evolved in the last 30 years to explain the cognitive task of perception and problem solving, and the emotional task of integrating this information with the individual personal goals, motivational state and feelings (Dodge 1993).

According to the social-information-processing theory, the individual goes through five stages in the social information processing, which can be used to explain general patterns in deviant behaviour: The first stage of the social information processing involves encoding of social cues. Aggressive children are found to notice fewer cues and to be biased to attend towards the hostile cues compared to nonaggressive children (Dodge 1993). The second stage involves making mental representations of the encoded cues, here the individual make interference about causality, intent and generates expectations of future events. Antisocial children are found to display deficits in affective perspective taking and social perspective taking, leading them to think that other have hostile feeling and attention towards them. This is labelled "hostile attribution biased" and is frequently found in children and adolescence suffering from conduct disorders (Dodge 1993).

The third stage in the social-information processing is the response access. After the individual have attended the social cues and made some sort of interference about their intend, they make a choice of behaviour response based on schemas stored in the long-term memory. Aggressive children are found to be more inflexible in their choice of response, and to make more antisocial responses than non-aggressive children (Dodge 1993). The forth stag involves evaluation and selection of the proper response. The choice of response is based on an evaluation of the different outcomes if a specific choice is made. The outcome has to be evaluated on the basis on the effect on a wide range of domains, including interpersonal, intrapersonal and instrumental outcomes of the choice. Not only does children and youth value aggressive responsive more highly, but due to problems with impulse control, they might fail to evaluate the outcome of their choice altogether (Dodge 1993). The final step is

referred to as enactment, meaning the ability to act out chosen behaviour. Antisocial children are found to have more problems acting out prosocial behaviour, compared to their "normal" peers.

In a summary, the literature suggests that children suffering from conduct disorders have problems with all the stages in the social-information processing. This leads them to interpret behaviour as hostile and make more aggressive behaviour responses. As a consequence a lot of interventions have focused on helping these individuals with identifying feeling and to be conscious about planning and evaluating their response to behaviours from other people. As to why they have problem with social interactions, the answer might be found within their personality, an idea that is the topic of the next section.

4.5 Personality theories

Research has found a strong connection between Conduct Disorder and Antisocial Personality Disorder. This is reflected through that one of the DSM-IV-TR criteria's for Antisocial Personality Disorder is the onset of Conduct Disorder before the age of 15 (APA 2000). Antisocial Personality Disorder has its origin in the theory of the psychopath, which has long history of being associated with antisocial behaviour and crime. The roots of the word "psychopath" can be traced to the expression of "moral insanity", which has its origins in phrenology that was looked at in chapter 3. Within the science of phrenology, a distinct faculty for morality can be indentified, and subsequently be faulty, resulting in moral insanity (Fink 1938).

Hervey Cleckley further elaborated on the notion of the psychopath in his book "Mask of sanity" (Cleckley 1955). The book first came out in 1941 and was released in five new

editions up to 1976, and additional revised versions in 1982 and 1987 (Burkhead 2006). Cleckley collected examples and case studies from his own practice, as well as in the general literature of what was thought to be the attributes of a psychopath at the time and made a list showing the typical characteristics of a psychopath (Cleckley 1955). Cleckley was not predominantly concerned with delinquency, but do suggest in his book that in some instances the traits for delinquency and psychopaths crosses over. The finding followed John Bowlby, which had also described psychopathic trait in young offenders in the mid 1940s. Bowlby worked with thieves early in his career and divided them into six categories dependent on the perceived cause. One of these categories was named the affectionless character and was thought to represent a latent psychopath (DeKlyen & Speltz 2001).

The link between antisocial behaviour in children and the adult psychopath was further established by Robins study "Deviant children grown up: a sociological and psychiatric study of sociopathic personality" (1966). The work is frequently referred to and valued as one of the most important studies in its era (Earls & Mezzacappa 2002). The study traced the psychiatric and social outcome of 524 child guidance clinic patients 30 years after their initial referral. It compared them with the outcome of 100 normal school children of same age, race, sex, IQ and social economical status. It was found in the study that the experimental group differed significant from the control group in terms of adult outcome. The more severe problems the child had on the initial referral, the more problems they experienced in adult life (Robins 1966).

The most striking finding in Robins (1966) study was the correlation between the child behaviour problems and adult Antisocial Personality Disorder, or sociopathic personality as it is labelled in the book. The study had extensive background information on the subjects and could determine which of the childhood factors that had the greatest predictable power over a negative adult outcome. Parenting, social economical status, academic results and substance abuse were all correlated with Antisocial Personality Disorder, but no single causal factor could account for the severity of the outcome. What Robins found, was a rather accumulative effect, where the number and persistency of childhood symptoms would determine the seriousness of the adult outcome in terms of psychiatric and social problems.

Callous-Unemotional traits (e.g. lack of guilt, absence of empathy, shallow and constricted emotions) have typically been associated with Antisocial Personality Disorder in adults since Cleckley first description of the psychopath. Recently researchers have also start looking for these traits in children and youth with behavioural problems. Frick & Dickens (2006) offers a review of the literature around callous-unemotional traits in children with behavioural problems. They found that the presence of callous-unemotional traits are associated with more severe and persistent forms of Conduct Disorder, and can be found in children as early as 3-4 years old (Frick & Dickens 2006). This suggests different causal processes involved in children with callous-unemotional traits versus children who do not have them, leading researchers to investigate if there is a separate group of children with Conduct Disorder that presents Callous-Unemotional traits, which develops Antisocial Personality Disorder as adults.

The main focus in the theories that have been mentioned so far has been around the individual and its immediate environment as an explanation for the cause of conduct disorders. However, not only the immediate environment affects the behaviour of the individual. As it will be discussed in the next section, also the wider context not directly in contact with the individual might play an important role.

4.6 Ecological Systems Theory

A broader account of the interaction of the environment and the developing child came in the theory of the "ecology of human development", first outlined by the Russian-American psychologist Uri Bronfenbrenner in 1979 (Bronfenbrenner 1979). The ecology of human development is defined as:

"The scientific study of the progressive, mutual accommodation between an active growing human being and the changing properties of the immediate setting in which the developing person lives, as this process is affected by relations between these settings, and by the larger context in which the settings are embedded." (Bronfenbrenner 1979:21).

From this perspective the individual is not only affected by the environment, but is actively affecting it through the mutual accommodation. An example would be the coercive cycle described by Patterson (1982) where an aggressive and oppositional child makes the environment responds in a more aggressive way, which again affects the child.

The reciprocal interaction between the individual and its environment takes place in several settings and systems. The systems are labelled as micro, meso, exo and macrosystem. These systems can best be described as circles surrounding the developing individual. The microsystems is the immediate environment which the individual is physical a part of. This can be the family, school class etc. The mesosystem constitute of the interrelation and interactions between the individuals' microsystems. A mesosystems influence on the individual is dependent on the amount of shared communication, values and bonds between the different microsystems. A well developed mesosystem can be more important to the contribution to the individuals' development than isolated mirosystems. The exosystem refers to a setting that does not involve the individual directly but is still affected by it. An example would be a teacher's home environment, when the teacher comes home from a hard day at work caused by an individual. All the underlying systems take place in a larger context referred to as the macrosystem. An example of the macrosystem would be the school system in a specific nation that affects the individual as well as it is affect by the individual (Bronfenbrenner 1979).

Ecological systems theory highlights the reciprocal nature of the interaction between the developing individual and its environments. It offers a holistic perspective on human behaviour and is especially suites as a perspective on antisocial behaviour. It offers a model for analysis that is useful in developing interventions, and it is one of the theoretical foundations behind Multi Systematic Therapy, one of the more promising interventions for Conduct Disorder, and will be further discussed in chapter 7 (Ogden 2002).

The multifaceted nature of conduct disorder necessitates a theoretical foundation that is broad enough to account for the complexity. Ecological systems theory together with developmental psychopathology, discussed in the next section, makes up the most popular perspective on antisocial behaviour and conduct disorders today.

4.7 Developmental psychopathology

Over the last three decades, developmental psychopathology has emerged as the key perspective on development and the cause and course of psychological illness (Rutter & Sroufe 2000). It rose as a reaction to the limitations of the traditional theories and concepts as they were applied during the 1970s. At that time the theories was too rigid and ambitious, trying to fit in too much in a universal theory. They did not put enough emphasis on biological processes and they had poor empirical basis. The developmental psychopathology perspective grew as a result of research around risk factors, attachment, cognitive processing, developmental disorders and lifespan development. The results from these as well as other fields highlighted the importance of viewing human development as a dynamic process (Rutter & Sroufe 2000).

Rutter & Sroufe (2000) identifies three key issues defining the developmental psychopathological approach. The first key issue is the understanding of causal processes, including how risk and protective factors operate. A risk factor is per definition a factor that leads to an increased possibility for a psychopathological outcome. While a risk factor like being male increases the change of developing antisocial behaviour, it is on its own uninformative of the nature of the risk. Thus, to make interference from risk factors to causal mechanism, these have to be studied over time and take into account both direct and indirect chain effects (Rutter 2003).

As it will be described in the next chapter, there are numerous factors identified that increases the risk of developing conduct disorders. These risk factors have an accumulative effect; meaning that the more factors that is present, the higher is the likelihood for a psychopathological outcome. However, there is uncertainty in how these factors adds up, if the relationship between them is linear, multiplies or is non-linear (Burke et al. 2002).

A protective factor can refer to something that influences an individual response to a risk factor, or it can be the opposite of a risk factor e.g. if low intelligence is a risk factor, high intelligence would be a protective factor. However, a protective factor is not the same as a pleasurable happening, for example can an stressful early in a persons life become an protective factor helping them deal with a more aversive event later in live (Rutter 1985). There is uncertainty around the relationship between risk and protective factors on how these influence each other. This is an area that requires further research in the further as it form the basis of a lot of interventions (Burke et al. 2002).

The second key issue of the developmental psychopathological approach is the concept of development as a dynamic process. In this process, the behaviour of the individual is reorganized through the interaction with the environment. Development is dependent on the influence of both genes and the environment, the relationship being complex, probabilistic and mutually interdependent. The development of an individual involves change, but also some sort of continuity as in the individual personal traits (Rutter & Sroufe 2000). The third key issue in defining the developmental psychopathological perspective is the continuities and discontinuities between normality and pathology. Most mental illnesses in this view are at an end of a floating continuum from what is considered normal. However, in some cases it can be a qualitative difference. For example one can be a little down or depressed, but not a little bit schizophrenic. Nevertheless, even if many disorders are on a continuum from normality, it might be necessary to make categories for clinical purposes (Rutter & Sroufe 2000).

The success of developmental psychopathology through the last three decades has had major impact on the explanations and classification of conduct disorders. The majority of the contemporary causal explanations in the next chapter have been developed under the umbrella of developmental psychopathology. The next section describes a taxonomy that has also been developed under this perspective and has had an effect on the classification of conduct disorders.

4.7.1 Moffitts' dual taxonomy

Terrie Moffitt proposed in 1993 a new dual taxonomy for conduct disorder based around the time of onset (Moffitt 1993). The first smaller group was labelled "early-onset life-persistent", suggesting that they develop Conduct Disorder before adolescence and continue their offending into adulthood. The second group was labelled the "adolescence-limited", suggesting they develop conduct problems during adolescence, but the problems diminish again when they reach adulthood. According to Moffitt (1993) the small group of early-onset children offends steadily through their lifespan, while the large adolescence-limited group are doing the majority of offending in adolescence. This taxonomy would explain the longstanding finding that the number of criminal offences in correlation to age peaks to the ten fold in late adolescence, before it drops in early adulthood.

The two different pathways are proposed to have different causal mechanisms behind them, and Moffitt developed two theories to explain the difference. The early-onset group are characterised by biological inherited predispositions, making parenting difficult with an antisocial outcome as result. The callous-unemotional trait subgroup discussed earlier could also fit in here. The adolescent-limited group on the other hand, commits delinquent acts as a result of a "maturity gap". This refers to the period after physical maturation, but before reach status as an adult. During this time they commit offences to establish their own independents and because of role models and reinforcement from peers. When the adolescence limited

group reaches adulthood they have no need to commit offences any more, and their antisocial behaviour ceases (Moffitt 1993). This taxonomy can also explain the finding that adult crime appears to be more heritable than juvenile delinquency, since adult crime would most likely be committed by the early onset group that has a stronger biological base (Moffitt 2003).

The dual taxonomy is now widely accepted and it became a part of DSM-IV in 1994 (APA 1994). A lot of the hypothesis that originally proposed in 1994 have been tested through the Dunedin Multidisciplinary Health Study by Moffitt and colleagues (Moffitt 2003). It provides a plausible explanation for a lot of earlier findings in the research on antisocial behaviour. However, many scientists feel that this is not enough and that further subdividing is necessary to provide more accurate categories to help research and interventions.

4.8 Summary

In the last 100 years the theories around antisocial behaviour have evolved to take into account the ever-increasing knowledge surrounding the topic. Biological and psychological theories have alternated in being the most popular framework for explaining antisocial behaviour and the discussion has shifted between the importance of nature and nurture. Psychoanalytic theories were the dominant force up to the 1960-70, when more learning orientated theories gained hold through its effective interventions and precise measurements of behaviour. In the last three decades developmental psychopathology have emerged as a key perspective with a fusion of biological, developmental and psychological views on conduct disorder. Within this framework, risk and protective factors plays a central role. However, how they operate and the relationship between them is not clear-cut and further research is needed to clarify this connection.

5 INDIVIDUAL AND CONTEXTUAL FACTORS IN THE DEVELOPMENT OF CONDUCT DISORDERS.

In the previous chapter the theoretical foundations that provide the framework for analysis on conduct disorders was examined. While historical theories have tried to explain antisocial behaviour as dependent upon a sole cause, contemporary research on conduct disorders is taking place under the developmental psychopathological perspective. Hence, most theories do no longer try to explain antisocial behaviour as arising out from single one cause or one factor. Rather it is a combination of environmental and biological factors that through an accumulative effect increases the risk for a pathological outcome.

This chapter will investigate contributing factors to the development of conduct disorders. It has been organised into three reciprocally interacting categories: biological, individual functional and environmental factor. These categories are open as often the factors will not fit into only one category, but will shift between them. Thus, this chapter conclude with Ecological systems theory that provides the framework for understanding how different factors located within different systems interacts with each other as well as with the individual.

5.1 Biological factors.

Biological factors have a long history in the explanation of antisocial behaviour. Initially, neurological factors were included as an explanation of the cause behind criminal and antisocial behaviour. Lombroso (1889) suggested that epileptic seizures were a major cause of

crime, subsequently the "epileptic criminal" was introduced as a distinct category in the fourth edition of a "Criminal Man" that came out in 1889 (Lombroso et al. 2006). Lombroso also created a category of people with "hidden epilepsy", describing people with epilepsy whom did not have physical seizures but still had "psychological seizures": "These psychological equivalents of physical seizures, marked by unpredictability and ferocity, concentrate the usual epileptic behavior into a brief caricature of crime." (Lombroso et al. 2006:247). At the start of the 20th century Lombrosos explanations were loosing popularity, being critiqued for being to mechanical and representing a deterministic view of human nature. However, the popularity of biological explanations have come and gone several times up through the history.

As it was described in chapter 4, one of the building blocks in Eysencks theory of crime is the research suggesting a difference in the central nerve system between people committing crimes and those who do not. Youth with Conduct Disorder are found to have a lower mean resting heart rate than "normal" youth, and a low resting heart rate have found to be predictive of later criminal behaviour in adolescence. On contrast, a high mean resting heart rate is correlated with anxiety, which again has shown to have a moderating effect on antisocial behaviour. Also a high mean resting heart rate in antisocial adolescence have been found to be predictive of a desistence of criminal behaviour in adulthood (Mezzacappa et al. 1997).

The frontal lobe area of our brain may prove important to the development of conduct disorders. Individual with damage to this area show a higher level of aggression and problems with impulsivity: both factors that can contribute to difficulties with social relations. Research has found cognitive impairments in adolescence with Conduct Disorder, which is similar to the characteristics found in adults with frontal lobe brain damage (Lueger & Gill 1990). Neurological deficits can be genetic or some neurological deficits might stem from pre and postnatal exposure to environmental toxins (Burke et al. 2002).

The brain is vulnerable to exposure to environmental toxins when it is developing and the effects of the exposure can increase the risk of violent and criminal behaviour. One of the

most dangerous and extensive researched toxins is lead. High levels of lead in the body is linked to lower I.Q., intellectual disabilities, shortened attention span, hyperactivity, reduced overall cognitive performance and antisocial behaviour (Carpenter & Nevin 2009). In most of the world, paint and petrol no longer contain lead, but people are still getting exposed to it through living near waste sites, highways with contaminated soil or houses containing old paint (Carpenter & Nevin 2009).

Cigarette smoke is another environmental toxin that can contribute to neurological deficits. Smoking during pregnancy is associated with a long list of negative effects, including structural changes to the brain and neurotransmitters of the foetus. The result can be a wide range of mental health problems, with both internal disorders like anxiety and depression and external disorders like conduct disorders are associated with exposure to prenatal smoking in the children (Ashford et al. 2008). Neurological deficits and damage can also contribute to conduct disorders in an indirect way through the impairment of individual cognitive functions looked at in the next section.

5.2 Individual functional factors.

In chapter 3, it was described how intelligence was associated with delinquency at the start of the 20th century. The connection between intelligence and delinquency was further expanded through the introduction of Wechslers' version of the I.Q. test in 1939. While Wechsler still believed in a general intelligence, he divided his test into two parts; one part designed to measure performance intelligence and one part to measure verbal intelligence with the two parts together make up the full score (Beres et al. 1999). As a result of this division, it was found that the discrepancies in I.Q. between children displaying antisocial behaviour and the "normal" population, could be attributed to deficiency in the verbal intelligence (Burkhead 2006).

Lahey et al. (1995) found that verbal intelligence was also associated with the persistence of conduct disorder, with high verbal intelligence correlated with decrease of Conduct Disorder symptoms over time. However, this association between intelligence and conduct disorders has recently been critiqued for not taking into the account the presents of AD/HD, with the link weakening when AD/HD was not present (Burke et al. 2002). However, there are other individual characteristics, which also play a role in the development of conduct disorders.

In chapter 4, it was described through the social-information processing theory how children and adolescence with conduct disorder made more aggressive and hostile interpretations of other peoples behaviour, and further made more aggressive responses themselves. People suffering from conduct disorders a more predisposed to "hostile attribution bias", which is to attribute other people's actions to negative causes and interpret their intentions as hostile when they are neutral. This is often accompanied with unpleasant feelings that further build up under the negative impression. This bias in the information processing increases the likelihood of a negative or aggressive response (Pettit et al. 2001).

Temperament is thought to be a stable characteristic of an individual with a genetic base. A difficult temperament is associated with parental difficulties and subsequently with the development of conduct disorders (Burke et al. 2002). However, the evidence is ambiguous with some studies finding no correlation. The lack of clear results can be an effect of the problems of defining and measuring temperament, and further research will help to clarify this point (Hill 2001).

Most of the issues that have been mentioned above are made up of stable genetically factors as well as environmental factors. The result is that it is hard to determine what is caused by biological differences and what is learned through the environment. This leads to the question about how much of conduct disorders can be attributed to hereditary factors on an overall basis.

5.3 Hereditary

Conduct disorders are considered to be "complex disorders" meaning that one single gene cannot be identified to cause the disorders. Rather, there are genes that increase the risk for an individual to develop conduct disorder given the right environment. The problem in determining the genetic contribution to conduct disorders lies in separating the influence of the environment (Simonoff 2001; Slutske et al. 1997). For example will parents who have being diagnosed with Conduct Disorder in childhood or adolescence have an increased risk for engagement in sub-optimal parenting. A factor that itself might lead to the development of conduct disorders in their children (Jaffee et al. 2006).

The influence of genetics have shown a stronger correlation with Antisocial Personality Disorder than Conduct Disorder (Simonoff 2001). This finding might have implications for the research on developmental pathways, supporting the growing evidence that some subtypes of conduct disorder a more likely to develop into Antisocial Personality Disorder than others (Frick & Dickens 2006). This has been supported by research that suggest childhood-onset Conduct Disorder is more hereditary than adolescent limited Conduct Disorder, thus strengthens the theory that there are different causes for the two developmental pathways (Moffitt 2003). On overall, Slutske and colleagues (1997) found moderate support for a genetic contribution over an environmental contribution in the development of Conduct Disorder (Slutske et al. 1997). However, the research on this topic is still inconclusive (Burke et al. 2002; Simonoff 2001).

In the next section the difference in prevalence and symptoms of conduct disorders between genders will be addressed. This is another matter where it is difficult to separate between the influence from nature and nurture.

5.4 Gender

Historically, conduct disorders have thought to be a condition that primarily affected males. Consequently, the majority of the research that have been conducted both in the psychiatry and criminology has been on boys (Burkhead 2006; Shoemaker 2009). However, Lombroso studied gender in the late 1800s as a variable when trying to understand the reasons of why people committed crime (Lombroso et al. 2006). In the first edition of the "Born Criminal" there was included a section on the relationship between female and crime. His research was mainly limited to prostitution, despite this being legal in Italia at Lombroso's time (Lombroso et al. 2006). In 1893 he published a separate book on the topic entitled "Criminal Women, the Prostitute, and the Normal Woman" that gained much influence at the time (Shoemaker 2009). Lombroso viewed females as a less developed than the males; this was apparently evident on the females smaller skulls and lighter brains. This perhaps led to Lombroso advocating the right for abortion and separation from their husbands, as this manipulation of the environment might then prevent them committing crimes related to unwanted children and abusive husbands (Lombroso et al. 2006).

After Lombroso's initial work there was not much research on antisocial behaviour among females before feminist writers took an interest in the topic during the 1970s (Burkhead 2006; Shoemaker 2009). Feminist theories focused on the power structures in society as an explanation why females exhibit less behaviour problems than males, and hypothesised that the differences would become less significant as females gained power in society. In later years, especially in the years after world war two, there has been an increase in delinquency and crime among females, supporting this hypothesis (Shoemaker 2009).

As a result of the historical context, most of the research around conduct problems has been carried out on boys and the models and explanations have been generalized to include girls (Keenan et al. 1999). However, this was based on the premises that Conduct Disorder was rarely found in females. Increased focus and research has shown that Conduct Disorder is a common condition in girls and associated with a range of unfavourable outcomes as early

pregnancy, increased mortality and antisocial personality disorder (Burke et al. 2002; Keenan et al. 1999).

Research shows more females have onset of conduct disorders in adolescence than in early childhood compared to males (Moffitt 2003). The lower rate of childhood-onset Conduct Disorder in girls has been explained by fewer risk factors might be present for females than males (Moffitt 2003). The difference between the genders has also been explained through the coercion theory (see chapter 4) in terms of childhood reinforcement of aggressive behaviour (Snyder et al. 2003). It is suggested that parents are less likely reinforce girls for oppositional behaviour, and more likely to value and frequently reinforce them for pro-social behaviour than boys. Girls' physical aggressions are also more likely to be ignored by their peers than boys (Snyder et al. 2003). However, more research is needed to say for sure whether there are different causal mechanism involved with girls than boys, but this is an important field of research in the future as we know that behaviour problems among girls is on the rise, and might require different interventions than those that are directed toward males.

So far the main focus in this chapter has been around factors that are primarily located within the individual. The next section will look at what factors in the environment are thought to contribute to the cause of conduct disorders. Here it is important to keep the ecological systems theory in mind. The individual is not a passive receiver of environmental influences, but also interacts with its environment.

5.5 The family

The family is significant environmental factor, which can either contribute to or prevent the development of conduct disorders. One of the longstanding findings around antisocial

behaviour is that the prevalence of conduct disorders is greater in families of low Social Economical Status (Burke et al. 2002; Lahey et al. 1995). Social Economical Status has been associated with antisocial behaviour since the beginning of the 1900. In chapter 3, Burt (1925) concluded that poverty was the major cause of juvenile delinquency in London in 1925. One can easy imagine the living conditions in London during the 1920 could force the youth to steal as way of surviving. However, the correlation is robust with poverty also being associated with antisocial behaviour among children in Norway in 2007. In the study by Sletten (2007) they used youths perceived notion of poverty as scale of measurement. They found a small but significant correlation between poverty and conduct problems, when other variables like educational level were accounted for. They hypothesizes that this effect is due to additional stress on the parents that affects their parenting skills (Sletten 2007). However, low Social Economical Status is associated with the onset of conduct disorders, but not the persistence of the disorders. Long term studies have found that factors like the parents mental health were more important in maintaining the youths antisocial behaviour than their social economical status (Lahey et al. 1995).

The concept of "Broken home" refers to a home were the original nuclear family headed by two parents, has ceased to exist either through separation, divorce, death or in some other way. It has at times throughout history been thought to be an important contributing factor in the development of antisocial behaviour (Shoemaker 2009). Contemporarily research into family structure suggests that divorce can contribute to Conduct Disorder, with the risk of developing conduct problems being double for children from divorced families (Maughan 2001). This might be because divorced parents typically have less time and resources available for the child, which can lead to decreased monitoring, inconsistent discipline and aggressive role modelling. Thus it is important to note is that rather than the physical structure of the family, it is the relationship between the family members that plays the major role (Shoemaker 2009).

Subsequently, significant to the development of conduct disorders is not only the structure of the family, but the order and running of the home can be contributing factors. In a two year long study Deater (2009) found that household chaos was associated with lower I.Q. and

conduct problems for children growing up, even when controlling for other variables as parents education and parenting style. Household chaos was here defined as noise levels, trafficking and generally order and routines and a standardized rating form measured the level of chaos (Deater 2009). As the authors note, this can be an important factor to take into consideration when developing interventions aimed at conduct disorders.

Discipline was also noted early in the history as being associated with delinquency (Burt 1925). The lack of, or to harsh or irregular discipline is related to the development of conduct disorders (Burke et al. 2002). It can be a thin line between harsh discipline and child abuse. The latter is linked to a wide range of internalized and externalized problems in children and adolescents including increase in antisocial behaviour and conduct disorders. This finding includes physical, emotional and sexual abuse. Abuse is associate with a range of emotional problems and personality problems, rather than specific conduct disorder (Maughan 2001).

The role of the family in the contribution to development of conduct disorders tends to diminish as the child grows older. In adolescence, peers play an increasingly important part and will be discussed in the next section.

5.6 Peer influences as a contributing factor.

The influences of peers have been thought to be a contributing factor in the development of antisocial behaviour since the early 20th century. Both Burt (1925) and Aichhorn (1925) listed peer influences as a significant contributor to the development of delinquency, where research has shown that children with deviant peers are more likely to engage in antisocial behaviour and antisocial children are more likely to be rejected by prosocial peers (Burke et al. 2002; Fergusson et al. 2007). This can partly explain why some youth and adolescent are attracted

to and join juvenile gangs since they can provide an acceptance they cannot find with prosocial peers. There is a linear effect between friends self-reported delinquency rate, where friends have reported similar increase in delinquent behaviour (Fergusson et al. 2007). However, some youth are more prone to the influence of deviant peers than other, and poor or inconsistent parental discipline, child impulsivity and peer rejection are all factors that increasing the risk of be influenced by deviant peers (Snyder et al. 2010).

There are also some differences between the genders in the influence of deviant peers. Early onset of puberty are associated with the likelihood of association with deviant peers for girls, but not for boys (Burke et al. 2002). A swedish study investigating the relationship between romantic relationships and delinquency also found that youth that was prone to delinquency, engaged in more delinquent behaviour when they at the same time were in a romantic relationship. This effect was stronger for girls than boys (Eklund et al. 2010). It was also found that opposite sex friendship was associated with more delinquent behaviour for girls, but not for boys. Thus, this points towards that for girls, being with a deviant boy is a risk factor for further antisocial outcome (Eklund et al. 2010). The most important place for children and adolescence to meet peers, is the school and the topic in the next section.

5.7 The school

The school is the biggest arena in a child's life outside the home and is especially significant to the work of the educational psychologist. In 1925 the school was included in "The young delinquent" as a contributing factor to child delinquency (Burt, 1925). Burt gives the example of school classes that can contribute to antisocial behaviour through being either to easy or to difficult, and subsequent would contribute to the child feeling bored or dumb and in the mood for mischief. The point of having individual suited education was elaborated by Malherbe (1938), which stressed the importance of having both the teaching methods and curriculum adjusted to the individual student. He further argued that the teacher must realize that failure

is the responsibility of the education system and not the child (Malherbe 1938). This is a rightful premise, well before its time and come to have increasing influence in the late 20th century.

For example, in the beginning of the 21st century the school climate was related to antisocial behaviour among students. The expectations, values and beliefs of the teacher, student and administrations were deemed important factors in the contribution to both academic success and the antisocial behaviour (McEvoy & Welker 2000). This highlights the importance of a systems perspective as well as an individual perspective when developing intervention aimed at antisocial behaviour in the school. Research shows that taken other variables into account, the school account for around 10 % of variation in disruptive and antisocial behaviour (Maughan 2001). A large part of this effect is at classroom level (Gottfredson 2001). These finding underscores the importance of knowledge about conduct disorder and problem behaviour, both among teachers and administration.

5.8 Summary

The focus in this chapter has been on risk and causal factors that might contribute to the development of conduct disorders. Different school of thoughts have produced different theories, which again have provided the framework for the research on causal factors. Throughout the chapter these factors have been divided into biological, functional and environmental, with some of the factors belonging to more than one category. Biological factors refer to an underlying genetic or environmentally caused deficit in the neurological system. This can produce problems with attention or aggression, which can be underlying factors in the development of conduct disorders. Also other aspects with the individual functioning are associated with an increased risk of the development of Conduct Disorder, and research has identified deficits in verbal intelligence, temperament, social information processing and executive functioning as contributing factors. Environmental factors were

early in the history identified as influential in the development of conduct disorders. Social economical status, parenting, peers, school, neighbourhood among others, have a direct or indirect effect on the outcome of the child or adolescence. In the start of a child life, parenting and discipline are the dominant factors, but when by the time the child reaches adolescence, peers and peer values starts to become more important, stressing the importance of monitoring the adolescence activities.

The research into causal factors in the development of conduct disorders has made significant progress in the last thirty years. The advancement of the developmental psychopathological framework and ecological system theory has provided a holistic way of looking at the individual and the environment. Risk and protective factors have become important concepts in looking at how different aspects with the individual and the environment interacts over time to produce certain outcomes. As the theories of what can cause conduct disorders have changed, so have the diagnostic criteria and the methods of assessment. This is the topic in the next chapter.

6 CLASSIFICATION AND PREVALENCE

Conduct disorders first appeared as a diagnostic category in 1968 under the label of "behaviour disorders". The classification as a disorder did not come about in a vacuum, but was a result of the culminated social, cultural and educational context. Subsequently, the categories changes with time, reflecting research advancing in the field. The first part of this chapter will look at the historical trajectory that led to the establishment of conduct disorder, identifying key contributing factors in it development toward becoming a distinct category and trace the changing criteria of the disorder over the last forty years.

The second part of this chapter will look at the prevalence of conduct disorders in the general population and the difference in these numbers between cultures and genders. It will also look at its co-occurrence with other disorders, especially AD/HD, anxiety and depression. Finally it will investigate how conduct disorders are assessed, some of the tools that is available for this purpose.

6.1 The initial classification of mental disorders.

The first attempt at classifying diseases can be traced back to 1853 when the International Statistical Congress requested William Farr and Marc d'Espine to make the International List of Causes of Death in Brussels in 1853. This list, as reflected in the name, served as an international standard for classifying causes of death for statistical purposes and did not include non-fatal diseases. However, during the 20th century there was an increasing demand for a universal list with both mortal and non-mortal diseases. Subsequently, in 1946 the World

Health Organization took the responsibility of the creation of the International Classification of Disease Six (ICD-6) (WHO 2010). The ICD-6 was a significant advancement over the previous version and included non fatal diseases, but became critiqued with time for being generally unsuitable for the classification of mental disorders (APA 1968). Thus, in the 1960s the World Health Organization prioritised the improvement of their classification of mental disorders. No changes where made before the release of ICD-7, but prior to the next revision they arranged several conferences with psychiatrists from all over the world, resulting in the publication of ICD-8 in 1969 (WHO 1992).

Also significant to the classification of conduct disorder was the American Psychiatric Association. In 1948, American Psychiatric Association started the work to make the first national standard system and the result was the Diagnostic and Statistical Manual over Mental Disorders (DSM) released in U.S. in 1952 (Shorter 1997). Members of American Psychiatric Association were on the committee of the World Health Organization to help improve ICD before the eight revision and at the same time American Psychiatric Association was making changes to DSM to make it more congruent with ICD-8 (APA, 1968). The result was that behaviour disorders of childhood was included in both manuals, but with slightly different categories.

6.2 The developments of conduct disorders as a diagnostic category.

With the publication of ICD-8 and DSM-II in 1968, conduct disorders became a classified mental disorder. Conduct disorders appeared in ICD-8 as "Behaviour disorders of childhood" in one category. In contrast, the DSM-II included 6 subcategories of behaviour disorders as following; - "Hyperkinetic reaction of childhood (or adolescence)" - "Withdrawing reaction of childhood (or adolescence)" - "Overanxious reaction of childhood (or adolescence)" -

"Runaway reaction of childhood (or adolescence)"- "Unsocialized aggressive reaction of childhood (or adolescence)" - "Group delinquent reaction of childhood (or adolescence)" (APA, 1968). The name "Conduct Disorder" was introduced in ICD-9, which was published in 1977. From the previous version, ICD-9 expanded its section on behaviour disorders from 1 to 10 categories. While ICD-9 was gaining worldwide influence, it did not have as big an impact as the introduction of American Psychiatric Associations' DSM-III.

Psychoanalytic theory had heavily influenced the DSM-II and the manual subsequently came under fire from several of sources that demanded more precisely defined diagnoses based on symptoms and not psychoanalytic theory (Shorter 1997). With DSM-III came the introduction of a symptom based multi-axel classification system. From then on disorders was established by fulfilling set criteria, which improved the validity and reliability of making diagnosis (Shorter 1997). In DSM-III the categories had changed significantly from DSM-II, the term Conduct Disorder is used as with ICD-9 and several subcategories are added; "Conduct disorder undersocialized, aggressive" replaced the "Unsocialized aggressive reaction of childhood (or adolescence)" and "Runaway reaction of childhood (or adolescence)" went into the category of "Conduct disorder undersocialized, nonaggressive". "Group delinquent reaction of childhood (or adolescence)" is split into two categories with "Conduct disorder, socialized, aggressive" and "Conduct disorder, socialized, nonaggressive".

In DSM-III, "Oppositional Disorder" first appears as an own category (APA 1980). In this manual Oppositional Disorder is referred to as a personality disorder with a different etiology than Conduct Disorder. This changes with the publication of the new revision, DSM-III-R, released in 1987. Here is Oppositional Disorder renamed to "Oppositional Defiant Disorder", which also is used today. From now on Oppositional Defiant Disorder is seen as a precursor to Conduct Disorder, with its diagnostic criteria based around hostile, defiant and negativistic behaviour, but without the major violation of the rights of others as seen with Conduct Disorder (APA 1987). In DSM-III-R, Conduct Disorder is reduced to include three categories: "Conduct disorder, solitary aggressive type", "Conduct disorder, group type" and "Conduct disorder, undifferentiated type". An additional feature is now the classification into "mild",

"moderate" and "severe" based on number of diagnostic features met, as well as how harmful the behaviour is to others (APA 1987).

ICD-10 was released in 1992 and DSM-IV in 1994. Many of the changes prior to DSM-III were incorporated in ICD-10, including the addition of Oppositional Defiant Disorder and the symptom bases diagnostic system. This is a reflection of the close cooperation between American Psychiatric Association and World Health Organisation on mental diseases. The introduction of DSM-IV brought a couple of modifications. Conduct Disorder is now classified after the age of onset, reflecting the research on childhood-onset versus adolescence-limited taxonomy that was discussed in chapter 4 (APA 1994). In DSM-IV an additional category was added, "Disruptive behaviour disorder NOS" for children and youth with behaviour problems that did not meet the specific criteria for Conduct Disorder or Oppositional Defiant Disorder (APA 1994). The latest addition of DSM, the DSM-IV-TR was released in 2000 and included no new changes, keeping the categories from DSM-IV (APA 2000).

Despite the close cooperation between the two classification systems, there are some differences. In ICD-10 there is separation between socialized and unsocialized conduct disorder (WHO 1992). The age of onset is not used for classification in ICD-10, but rather recommended that the clinician take this into account when doing the assessment (WHO 1992). In ICD-10 there are additional categories of mixed disorder of conduct and emotion as well as conduct and hyperkinetic disorder, taking into account that Conduct Disorder is often found in comorbidity with other diseases that will be looked at in section 6.4. One of the consequences of the difference between the diagnostic manuals and as of the changing criteria in general, is that it makes it difficult to get an accurate measurement of the prevalence of the disorder, the topic in the next section.

6.3 The occurrences of conduct disorders in the general population.

As it was described in the previous section are classification systems under constant development and review. The estimated number of people whom suffer from conduct disorders is dependent on the diagnostic criteria of the time. Slight changes in the criteria, can lead to large differences in the prevalence of conduct disorders in a population. General population estimates varies from 1 to 10% (APA 2000). Thus, this was evident in Lahey and colleagues' research of the prevalence that found inconsistent results. They conclude in their review with:

"Relatively little can be concluded about the prevalence of DBD (Disruptive Behaviour Disorders) at this time. A wide range of diagnostic definitions, assessment instruments, informants (and combinations of informants), and adjustments for functional impairment have resulted in a range of prevalence estimates that is to broad to summarise" (Lahey et al. 1999:36).

Nevertheless, a median was calculated to be 2 % for Conduct Disorder and 3.2 % for Oppositional Defiant Disorder (Lahey et al. 1999).

Despite the problems with getting an accurate reading of the prevalence of conduct disorders in the population, there are some trends that can be indentified with relation to age, gender and ethnicity. With age the usual trend is that as the child gets older the amount of defiant and oppositional behaviour decreases but the seriousness of the antisocial behaviour increases. Statistics regarding delinquency and age supports this, showing a peak of delinquent activities in late adolescent. Juvenile offence appears to peak around 17-18 years of age for males and 13-14 years of age for females and then decline sharply afterwards (Shoemaker 2009). The same pattern was observed in a national sample of British youth, with a increase in Conduct Disorder for boys around 11 years and for girls around 12 years of age (Maughan et al. 2004). In the same study the prevalence of Oppositional Defiant Disorder was reported to drop with age, explained by the fact that in DSM-IV, Oppositional Defiant Disorder is excluded in the presence of Conduct Disorder.

In relation to gender, differences in the prevalence of Conduct Disorder is found in most studies, with some reporting a 4 to 1 ratio of boys over girls (Lahey et al. 1999). As it was discussed in the previous chapter, early-onset Conduct Disorder is rare in females, but adolescence-limited being more prevalent (Keenan et al. 1999). However, Frick (1998) argues that most girls suffering from Conduct Disorder do not fit into the two existing categories of childhood-onset and adolescent-limited that is in today's classification system, but that they rather belong to a third category named delayed-onset. The reasoning behind it is that girls with Conduct Disorder fit the description of the early-onset group, except that their symptoms do not usually show before adolescent (Frick 1998). Other authors argue that the gender difference in the prevalence of Conduct Disorder can be explained in terms of DSM Conduct Disorder symptoms are predominant things that males do, so it does not pick up on antisocial behaviour in girls (Angold & Costello 2001). When it comes to the presence of Oppositional Defiant Disorder the gender difference is not as clear-cut, with some studies reporting no difference in the prevalence at all.

Through studying the prevalence of conduct disorders between countries and ethnicity, it might be possible to shed some light on the cause of Conduct Disorder and Oppositional Defiant Disorder. It can also inform whether conduct disorders is a global phenomenon or limited to western culture where the diagnosis was invented. Several studies have found differences in the prevalence of conduct disorders between different ethnicities. In a British study of the prevalence of DSM-IV mental disorders among adolescence, they found a lower occurrence of Oppositional Defiant Disorder among Asian children than white (Ford et al. 2003). In a study from United States, looking at the prevalence of Conduct Disorder among Asians, Pacific Islander and Native Hawaiians, they found Asians three times less likely to have Conduct Disorder than Caucasian. The same study found that Pacific Islander and Native Hawaiians were two and a half times more likely that Caucasian to get diagnosed with Conduct Disorder (Sakai et al. 2008). While this study looked at the rates of Conduct Disorder among Asians living in United States, Leung and colleagues looked at the prevalence of the common DSM-IV disorder in a sample of adolescent youth in Hong Kong. In their study they found lower rates of Conduct Disorder (1.9 %) than reported elsewhere, but higher rates of Oppositional Defiant Disorder (6.9%). However, it is difficult to determine if this represent a real difference in the occurrence of disorders between countries or rather

methodological differences (Leung et al. 2008). In addition, measurement of the prevalence of is often complicated by the presence of other disorders, which frequently occur with conduct disorders and is the topic for the next section.

6.4 Comorbidity

The occurrence of multiple diagnoses within the same individual is referred to as comorbid disorders and it can have consequences for diagnoses, treatment and prognoses of diseases. Children and adolescence with conduct disorders have a high chance of also having classification of Attention Deficits/Hyperactive Disorder (AD/HD), depression and anxiety disorder. As noted earlier, comorbidity can have consequences for classification, as reflected in the differences of categories between ICD-10 and DSM-IV.

Comorbidity can also act as a mark of severity of the disorder as in the case with AD/HD. Children with combined AD/HD and conduct disorders shows more Conduct Disorder/Oppositional Defiant Disorder symptoms than children with a "pure" conduct disorders (Angold & Costello 2001). Furthermore, AD/HD is associated with an earlier onset of Conduct Disorder, which is correlated with a more severe outcome and increased risk of adult antisocial personality disorder (Loeber et al. 2000). In a developmental model, AD/HD precedes the development of Oppositional Defiant Disorder and Conduct Disorder. The relationship between AD/HD and Conduct Disorder is complex, and further studies are likely to share more light on the connection.

Depression is frequently found in children and youth suffering from conduct disorders. This is unexpected when taken into account the difference in symptoms between conduct disorders and depression; conduct disorder marked by aggression and opposition, and depression by

sadness, lack of energy and apathy (APA 2000). Despite this discrepancy major depression has been found in up to 50% of clinical referred youth suffering from Conduct Disorder, and Conduct Disorder been found in up to 30 % of the youth suffering from major depression (Wolff & Ollendick 2006). There are two major hypothesises in regards to the relationship between these two disorders. The first is that the manifest of conduct problems causes the development of depression that is a reaction to the social failure these children and adolescence experience. The contra hypothesis is that the children and youth develop depression first, and that subsequently the conduct problems are a reaction to the internalized feelings these children experiences. An alternative explanation is that both disorder share risk factors that lead to the development of both Conduct Disorder and depression (Wolff & Ollendick 2006).

Anxiety disorder is also associated with Conduct Disorder, with the relationship being a paradox. It has been reported that children with anxiety disorder are less likely to develop conduct problems later in life, but children who already have Conduct Disorder are at increased risk at developing anxiety disorder (Loeber et al. 2000). Substance abuse is also linked to Conduct Disorder, which can increase the likelihood of the development of anxiety and depression. Altogether there is a dynamic interplay between the factors leading to the separate disorders and they all have to be taken into account when developing a treatment plan, highlighting the importance of a thorough assessment process.

6.5 Assessment

A diagnosis made on the basis of a classification system like ICD-10 and DSM-IV, should only be a part of a more holistic assessment process. A thorough assessment needs to use multiple of sources of information, in diverse contexts with use of the correct instruments. Comprehensive assessments will give a more complete picture over the situation, and are used

to design the correct interventions. This involves using teachers, parents and the child itself to inform of the functioning at home, school and leisure activities.

Frick et al. (2010) provide an overview of the key research findings and the consequences these have for the assessment of conduct disorders. Research findings are divided into 4 areas: Core symptoms and subtypes; common comorbidities; correlates with potential causal roles; multiple developmental pathways. They recommend that the initial assessment should be checking for core symptoms as described in DSM or ICD, the number of symptoms and the severity. The second step is to check for symptoms of the presence of other disorders as well as substance abuse. As discussed previously, any comorbid disorder will have an impact on the prognosis and treatment required. The third step is to identify potential causal factors. Some of these were discussed in chapter 5 and include the child/youth's intellectual functioning, learning style and social skills, as well as, the home environment, parenting style and monitoring. The final step is to map the developmental pathway of the disorder. As discussed earlier, there is evidence for distinct pathology for different developmental pathways as well it also affects prognosis and treatment. This step should also include an assessment of the presence of callous-unemotional traits.

It is outside the scope of this thesis to give a throughout description of all the different assessment tools, but a few will be mentioned because of the popularity of use and to serve as example. A diagnostic structured interview that has widespread use is the Diagnostic Interview Schedule for Children (DISC-IV). This instrument was first developed to help establish the prevalence of DSM-III-R disorders among children and youth. It is tied up to the diagnostic criteria set by DSM, and today there is three version available, one for interviewing the child, the parents and an experimental version for interviewing teachers (Kamphaus & Frick 2005). Another frequently used tool for assessment in Achenbach's Child Behaviour Checklist (CBCL). This is the parents rating form of a wider package of empirically based assessment system developed by Thomas M. Achenback (Achenbach & McConaughy 1987). Since CBCL is not based on the DSM criteria, but rather on factor analysis of clinical symptoms it does not give a diagnosis, but gives a reliable indication of aggressive and delinquent behaviour.

6.6 Summary

This chapter have investigated some of the contributing factors that led up to the establishment of conduct disorder as a medical diagnosis. Since the inclusion of behavioural disorder in the DSM and ICD in 1968, the defining criteria's and subcategories have changed several times. In 1980, Oppositional Defiant Disorder appeared for the first time as a subcategory of conduct disorders. As a consequence of the changing criteria it has been difficult to establish the prevalence of Conduct Disorder and Oppositional Defiant Disorder in the population. The presence of Conduct Disorder and Oppositional Defiant Disorder in children and youth are frequently accompanied by comorbid disorders, particularly AD/HD, anxiety disorder and depression. AD/HD is associated with an earlier onset and more severe outcome. The occurrence of comorbid disorders has complications for the treatment and assessment of conduct disorders.

As knowledge and methods in research develops, one can expect to see further changes in the classification of conduct disorders. As mentioned earlier, Moffitt (1993) taxonomy with the distinction between early-onset and adolescence-limited Conduct Disorder was included in DSM-IV. In the future one might expect to see further subdividing of the categories on the basis of the presence of callous and unemotional traits as well as rule breaking versus aggressive behaviour. There is also issues surrounding whether Oppositional Defiant Disorder is qualitative or quantitative different from Conduct Disorder. Eventually, changes to the diagnostic criteria will have consequences for the understanding on how to treat and prevent conduct disorders, which is the topic in the next chapter.

7 INTERVENTION AND PREVENTION

Over the previous chapters it has been shown that conduct disorders are a heterogeneous category with a complex and at times ambiguous diagnosis. Thus, it can appear that the only thing that is common to people suffering from Conduct Disorders are the diagnostic criteria. The disparity of factors that contribute to and maintain conduct disorder makes interventions difficult to design and implement. Despite the fact that conduct disorders are hard to treat and prevent, there has been a lot of progress in the development of interventions in the latest 20 years. Research has been concentrated around the factors that contribute to the development and maintenance of conduct disorder. In turn this have has been applied to develop more efficient programs for intervention. Today the more efficient programs target multiple aspects with both the individual and the environment and are implemented at school and home.

The aim of this chapter is to provide an overview of contemporary interventions and prevention in relation to conduct disorders. It will start with the individual focused interventions before moving on to interventions aimed at the family. The section after that will look at multi modal interventions, this includes Multi Systematic Therapy that has shown a lot of promise in the treatment of serious cases of conduct disorder. The finale section will be on intervention and prevention in the educational system, a place that is both well suited to and in high demand for interventions targeting antisocial behaviour.

7.1 Individual focused interventions.

As it has been described chapter 4, children with conduct problems are often lacking the cognitive skills to make friends and maintain friendship. They also have a tendency to attribute hostile intentions to neutral situation and people (Burke et al. 2002). Based on these

finding there is multiple programs design to develop these specific cognitive skills. The programs based on these principles are often referred to as Cognitive Behaviour Skills Training (CBST) (Frick 1998) or Problem-solving skill training (Kazdin 2001). There are many different versions of CBST programs available to therapist, but they all share some common ideas. They are all based on both cognitive theory and behaviour theory. They usually put emphasis on how the person approach a situation, what thought process are involved and help to put in place a step by step formula to help solve interpersonal problems. The therapist works closely with the client and pro-social behaviour is learned through modelling, role-playing, practicing and direct reinforcement (Kazdin 2001). CBST programs have showed result in reducing aggressive and antisocial behaviour in youth at home and school and since they are directed towards the individual children or youth, they don't require as much parental cooperation or involvement as the family orientated approaches (Kazdin 2001).

However, there are some limitations to CBST programs; without the input from parents and other adults, children has problems with the generalization of the skills to new situations and environments. CBST also put high demand on the cognitive abilities of the child or adolescence, resulting in that it works better with older, more cognitive mature and well functioning youth. The improvement found has also been too small to take the child or youth out of the impairment range (Frick 1998). Even so, CBST have an exciting further, especially as a part of a more comprehensive treatment.

As well as cognitive deficiency in individuals with conduct disorders there are also evidence that suggest there are neurobiological deficiencies that contribute to the development of the disorders. Psychopharmacologic interventions do not seek out to treat Conduct Disorder and Oppositional Defiant Disorder direct, but instead target some of the symptoms of the disorders (Burke et al. 2002). Stimulants used to treat AD/HD have shown promising results in improving symptoms in children with Conduct Disorder. This might not be surprising since there is up to 70 % of comorbidity between AD/HD and conduct disorders (Burke et al. 2002). Stimulants have shown to reduce many of the primary symptoms associated with Conduct Disorder as well as some of the secondary symptoms associated with the

comorbidity of AD/HD and Conduct Disorder. Through reducing the symptoms of AD/HD, research has also found that other interventions become more efficient and that the children have less academic and social problems at school (Frick 1998). As with the treatment of AD/HD there are a lot of individual differences in the reaction to stimuli medication thus caution is prudent. These types of medication also have side effects and should be given out with care only in those cases it sure to improve their functioning. As with the other individual approaches, medication should be used as a part of a more comprehensive treatment.

In people with conduct disorders only a part of the contributing factors can be found within the individual. Often the family interactions play an important part in creating and maintaining the behaviour; hence interventions must be directed on more than an individual level.

7.2 Family interventions

As described in chapter 5, harsh parenting, inconsistent discipline and lack of monitoring have for a long time being associated with conduct disorders and delinquency. Taking the importance of parenting into account, there is no surprise that the treatment that has the largest amount of empirical support behind it is Parent Management Training (PMT) (Kazdin 2001). PMT is based on the principles of social learning theory and operant conditioning, as discussed in chapter 4. There are several different kinds of PMT programs, but all are building on the same platform: Through a series of sessions the parents get taught the basics of behavioural theory. They learn how to interpret, define and observe behaviour. Modelling and instruction are used to teach new parenting skills such as reinforcing positive behaviour and the use of mild punishment such as time out and loss of privileges for unwanted behaviour. The systematic use of reinforcement and punishment shapes the behaviour of the child. In addition, PMT would frequently include programs for reinforcing academic and social progress at school, sometimes in cooperation with the teacher (Frick 1998).

A lot of research has been conducted on the efficiency of PMT and a few factors have been identified that has consequences for the outcome. PMT works best with younger children, it does not have the same success in treating adolescents (Kazdin 2001). Some of the reason of this might be the importance of peer influence in the adolescent years as well as then the reaction patterns within the family is highly ingrained and hard to change. PMT also put a lot of demand on the parents of the children; they have to attend to a multiple of session to learn quite complex material. Sometimes the same factors that are contributing to the development of the disorder can stop the parents from attending the sessions or limit the effectiveness of the program.

The problems within the family of antisocial children can be so extensive that there is a need for family therapy before they can attend a program like PMT. There are several versions of family therapy available with most of them are building on systems theory, the concept that the family is more than it individual members. Functional Family Therapy combines family systems intervention with the social learning perspective (Schoenwald & Henggeler 1999). It builds on the principle that the antisocial behaviour serves relational functions within the family. The treatment focuses on establishing clear communication between the family members, help to solve interpersonal problems and identifying behaviour they would like others to perform. Behavioural techniques are used to reinforce the wanted behaviour (Kazdin 2001). Several studies have shown that Functional Family Therapy is efficient in improving communication and relationships within the family, and the result is less contact with the police for the youth (Kazdin 2001). However, the most promising interventions are the ones that target several aspects with the youths functioning and environment and will be looked at in the following section.

7.3 Multi modal interventions.

Taken into account the complex nature of conduct disorders, it is natural to find that the most effective treatment is the one that is tailored to the individual child or youth and targets several sides of the child functioning and environment (Frick 1998). This is especially important with the older and more severe cases of Conduct Disorder who have shown little progress with only one form of treatment. Through targeting several different contexts, one can help the child generalize from context to context and help to internalizing the behaviour.

A form of interventions that builds upon the principle of multimodal treatment and has had a lot of positive results is Multi Systematic Therapy. Multi Systematic Therapy is a package of treatments designed to suit the individual and family. The program targets adolescence between 12 and 17 years with severe conduct problems, substance abuse and delinquency. The intervention is usually intense, lasting typically around 3-5 months. In this period the Multi Systematic Therapy team might have daily contact, either by phone or face to face and is available 24 hours a day, 7 days a week (Ogden 2002).

The success of the Multi Systematic Therapy program lies in its flexible approach. It is adjusted to the individual and can be tailored to target the academic, social and cognitive functions at the same time or put the emphasis where it is needed the most. This requires a throughout assessment of the situation and the environment of the adolescence. Multi Systematic Therapy employs a variety of techniques and methods; the previous mentioned Functional Family Therapy as well as Parent Management Training is components that can be utilized. Multi Systematic Therapy takes into account how the behaviour in different environment is mutually interactive and builds on Bronfenbrenners ecological systems theory. Within this framework, the conduct problems is understood as a problematic interactions between or inside the child and youths social arenas (Nordahl & Manger 2005). The program is characterized by that all practical problems that can effect the treatment is a part of the therapist responsibility. In addition the therapist also have an educating role, where the therapist teaches the parents techniques in how to manage the adolescence (Nordahl &

Manger 2005). However, the flexibility of the program requires the therapist implementing it to be highly trained and skilled to ensure success (Frick 1998).

In application to the field of educational psychology an awareness of the numerous causes and interventions for conduct disorder is necessary when addressing conduct disorders in the school, both on a systematic and on an individual level.

7.4 Interventions and prevention in the education system.

The school makes up a large proportion of a child or youths day, and is a place where the children experiences both social and academic demands. Some children spend most of their school day being oppositional and defiant to the teacher and refuse to participate in task and assignments. This behaviour changes the task of teaching from academic purposes to behavioural management, making it harmful not only to the student exhibiting the behaviour but also the rest of the students in the class (Robinson & Ricord Griesemer 2006). Some of the children and youth also engage in more severe delinquent behaviour during the school day, which might involve fighting and bullying and even drug and weapon dealing (Gottfredson 2001). With an increasing demand for full inclusion in the classroom there is additional pressure on the teachers to accommodate to and manage a wider range of students (Robinson & Ricord Griesemer 2006). All together this places a high demand on the classroom management skills of the teachers.

As being the place were children spend most of their time outside the home and where one has the opportunity to reach all of the children independent of background, the school is a prime area for programs aimed at preventing conduct problems. Numerous programs have

been designed for implementation in the school. The programs can target the school environment and its administration, the individual students or both. There are specific programs to target bullying, drug use, social skills, classroom management and so on. Some of them have showed promising results, while other do not have documented effects. This has led several countries to put in place committees to research and recommend program implementation.

Several programs targeting different areas can be used within the same school as well. In New Zealand the Advisory Group on Conduct Problems released a report in 2009 evaluating programs aimed at children from 3 – 7 years of age (AGCP 2009). The Advisory Group on Conduct Problems report recommends a three-step prevention/ intervention process: level 1 is universal based prevention programs, these are school wide and is aimed at improving the milieu in general and targeting all classes and students. The level 2 programs are design to target those identified as being in risk of developing more serious conduct problems, while level 3 programs are highly intensive programs aimed at those who did not show improvement through the level 2 programs (AGCP 2009). The programs become gradually more complex and involve more areas in the child life.

The effectiveness of a program is dependent on the design and the implementation. Gottfredson (2001) found that a poorly implemented program not only did not achieve the results it was supposed to, but in fact contributed to a negative outcome. In Norway, the Ministry of Education (Utdanningsdirektoratet) published a report in 2006 evaluating different programs and making recommendations for implementation. They stressed that for a program to be effective the school has to feel a need for the intervention. Teachers, administration and parents all have to be involved, and a continued loyalty and maintenance towards the program were required for success (Larsen Bognes et al. 2006).

7.5 Summary

This chapter has provided an overview of the interventions that are used in the treatment of conduct disorders. The interventions are closely linked up to the theoretical foundations and the research on causal factors. Before the 1970s the common form of treatment was individual psychotherapy, which was both expensive and ineffective. However, in the last 30-40 years there has been a rapid development of the treatments of conduct disorders. Today the interventions are design to target specific areas within the individuals' functioning or environment. Examples are Cognitive Behaviour Skills Training that can help with social skill and Parent Management Training, which are design to help the parents becoming more efficient. It has been shown that treatments targeting multiple areas e.g. individual functions, family and school at the same time have the greatest chance of success, with Multi Systematic Therapy being a good example. However, the same factors that are indentified as being major causes for conduct disorder are also making it hard to implement an intervention. Problems within the families like marriage problems or substance abuse, makes it more likely that the participant in an interventional program will drop out before completion of the program.

8 SUMMARY AND CONCLUSION

It has become evident throughout this thesis that conduct disorders are complex disorders with no clear-cut cause or treatment available. The prevention and treatment of conduct disorders and behaviour problems is of major concern for teachers and other professionals in the education system. The historical perspective demonstrates that the theoretical underpinning and intervention of conduct disorders is dependent upon the social and cultural context of the time and is not infallible but open to continual critique and change. Conduct disorders themselves are complex and ambiguous disorders that requires a thorough understanding of the complexity surrounding them, thus allowing educational psychologist to give sound advice and guidance around conduct disorders.

The diagnosis of conduct disorder is bound up to the historical context. Thus for professionals, to fully understand a contemporary phenomena it is important to have a throughout understand of the historical context it arose from. Little has been written about the historical foundation of conduct disorder and the aim of this thesis has been to contribute towards this gap in the literature. This thesis has provided knowledge of the historical context, theoretical underpinning and the accompanying changing diagnostic criteria of conduct disorders.

8.1 The historical context of conduct disorders

The historical context of disorder is fundamental to understanding the contemporary perspective on conduct disorders. Initially the medical diagnoses of conduct disorders arose out from the research on delinquent and antisocial children. For this to take place three conditions had to be met. First, before the establishment of the child and adolescence

psychiatry, childhood and adolescence had to be recognized as distinct developmental periods. This happened largely through the legislation towards child labour and increased focus on upbringing and the development of children in the 19th century. Second, delinquency and antisocial behaviour had to be viewed as a problem for the public. The value placed on childhood, gave children spare time available, allowing children to linger in the city streets with no purpose. Compulsory education acted as a buffer towards this trend, but many children did not attend school and the "street-urchins" continued to occupy the public space. To increase the power of the authorities who where trying to keep the children off the streets, the concept of status offences was introduced. Third necessary condition is the change of perspective of criminality towards as a medical problem. Parallel to the increased focus on delinquency, attention to why people committed crimes was increasing.

With these conditions in place there was an emerging interest for scientific research on antisocial and delinquent children. The psychoanalysis, as introduced by Freud, became popular in both Europe and United States, and changed the focus of pathology to the psychological processes within the child. In this view, delinquency and antisocial acts were results of unconscious drifts within the individual. Healy, an American psychiatrist is credited to be the first to apply the psychoanalysis in the work with antisocial children. From the work at his child guidance clinic, Healy published "The individual delinquent" a book where he through case studies of delinquent children, identified environmental factors and psychological factors that could contribute to delinquency (Snodgrass 1984). By the 1930s, the research around delinquency had taken a large step forward. Causal factors like parenting, poverty and intelligence had been indentified, and both Europe and United States saw the establishment of numerous of child guidance clinics.

8.2 The theoretical foundations of conduct disorders

Understanding of conduct disorders have been historically and contemporary through theoretical frameworks. These frameworks shape the perception and treatment of conduct disorders. Psychoanalytic theory was the dominant approach to research on delinquency and antisocial behaviour up to around 1970. The behaviour was viewed as a result of internal drifts and conflicts, usually originating from an experience or pattern in the upbringing. The treatment was primarily individual therapy with the individual child or adolescence. Most psychoanalytic therapist was resultant to participate in empirical investigations of the treatment method and in the studies that was done, the children and adolescence showed little improvement. In addition this form of intervention was critiqued for being both expensive and time consuming (Rutter & Giller 1983).

The popularity of the psychoanalytic approach declined gradually, and in the period from 1940 to 1970 many theories that have contributed to the contemporary understanding of conduct disorders developed. Bowlby and Cleckley both linked delinquent children to psychopathically personality traits, this was further established by Robins famous study "Deviant children grown up: a sociological and psychiatric study of sociopathic personality" (Earls & Mezzacappa 2002). Today, this is reflected in the connection made between Conduct Disorder and Antisocial Personality Disorder in DSM-IV.

In the 1960s behaviour orientated theories increased in popularity. Eysenck developed his biosocial theory of crime, where both pro-social and antisocial behaviour is explained as learned through classical conditioning. However, the major shift in the thinking around antisocial children came through the work of Bandura on social learning and later from Patterson on interactional analysis. The research following from these theories shifted the focus of pathology from the individual to its environment. It demonstrated that a lot of antisocial behaviour is learned through role models and in interactions with family members. Social learning theories made way for new ways of register and measure antisocial behaviour

as well as the effectiveness of the interventions. Parent Management Training evolved from the work of Patterson and is considered one of the most effective interventions, reflecting the importance of parenting as either a contributor to or a preventer of the development of antisocial behaviour.

At the same time as the behavioural theories grew, with the focus on external stimuli, cognitive theories were developing focusing upon internal cognitive structures. In the area of social cognition, social information processing theory provided a useful framework in conceptualizing how internal cognitive structures plays an important part in our interaction with other people. This theory suggests that it was not only the actions of other people that determined how the individual would react, but the way the actions are interpreted by the individual plays an important part of in the response. Cognitive theories developed to combine with principles from behaviour/learning theories to create Cognitive Behaviour Skills Training. This intervention is directed towards the individual and helps to teach social skills, anger management and impulse control. While they are not highly effective on their own, they make a good supplement to other interventions (Frick 1998).

In the last 30 years, developmental psychopathology and ecological systems theory have emerged as the dominant frameworks for research and treatment of antisocial behaviour. In comparison to previous theories and frameworks, the contemporary approaches are more dynamic and holistic, taking into account a wider part of the child or adolescence environment, as well as psychological and biological factors. Within this framework, the terms risk and protective factors are widely used; a risk factor is a factor with the child or its environment that increased the risk for a pathological outcome. Protective factors are strengths within the child or its environment that helps to modify the present of a risk factor.

The psychopathological developmental framework and ecological systems theory are reflected in the contemporary approach to treatment of conduct disorders. It has become evident that most successful interventions are those who target multiple aspects of a child or youths functioning and environment. Methods of treatment can be selected and combined to

target the areas identified as most critical. These can be directed toward the child or adolescence biological, cognitive and academic functioning, as well the different environments of home, school and leisure. Multi Systematic Therapy stands out as an example of this category of interventions, which has had success in treating adolescence with serious conduct problems.

The multifactor nature of conduct disorders put a high demand on the extent of the assessment. The assessment process has to cover all the aspects of the child functioning and life, and check for any comorbid disorders that might be present. A close cooperation between school, home and the professionals involved is necessary to make sure that all the aspects and arenas in the child or youths life are covered. A holistic approach also requires resources and someone to have an overview over the situation. The efforts towards the school, the individual and the family needs to be coordinated so the people involved in the treatment are targeting their specific domain. This to ensure that all aspects are covered as well to make sure that there is not too much of an overlap between the people involved. Thus, the cotemporary theoretical framework for conduct disorders is the result of the consolidation and development of the application of historical theoretical frameworks.

8.3 The changing diagnostic criteria

Conduct disorder, as a diagnoses and category of disorder originated in 1968 when conduct disorder was included in American Psychiatric Associations "Diagnostic and statistic manual of mental disorders" for the first time and labelled "behaviour disorder of childhood" (APA 1968). The influence from psychoanalytic theory was evident, with most of the jargon deriving from psychoanalytic literature. Conduct disorder itself was not a static diagnosis as future changes demonstrate. In 1980 there were major changes to the category of conduct disorders, where for the first time there was a set diagnostic criteria that an individual had to fulfil to receiving a diagnosis. The disorder got divided into two parts; Oppositional Defiant

Disorder and Conduct Disorder based around two clusters of symptoms. Additional changes were made before the release of DSM-IV in 1992, with a further subdivision based on the time of onset was made into childhood and adolescence onset, and additional grading into mild, moderate and severe based on number of symptoms fulfilled were used.

The modifications to the category of conduct disorders between the initial inclusions in DSM-II in 1968 to the release of DSM-IV-R in 2000 represent advance in theoretical understanding that had been made up to then. A developmental continuum is identified with a scale beginning with Oppositional Defiant Disorder, moving to Conduct Disorder and ending in Antisocial Personality Disorder. These distinctions are based around what clusters of symptoms the child or youth displays, with Oppositional Defiant Disorder being centred on defiant and hostile attitude towards authority figures and the symptoms of Conduct Disorder around the violation of the rights of others. However, the relationship between the two disorders are not clear cut and further research will be needed to assert if there is a qualitative or quantitative difference between them.

In the DSM-IV an additional categorisation based on the age of onset was included, reflecting research supporting two different developmental pathways. Childhood onset (before the age of 10) is associated with a more severe form of Conduct Disorder with a stronger biological base. It is found to be more persistent, harder to treat and to have a stronger correlation with Antisocial Personality Disorder than adolescence onset Conduct Disorder. This link between Conduct Disorder and personality is further reflected in that a diagnostic criterion for Antisocial Personality Disorder is to be diagnosed with Conduct Disorder before the age of 15.

8.4 Final words

Through this thesis, it has become clear that conduct disorders are partly a social construction arising out from the theoretical framework and social context of the time. It is at times ambiguous diagnosis with criteria that can be argued are being both cultural and gender biased. This complexity and ambiguity challenges the educational professional to use the diagnoses as a guide to understand the child and must be viewed thoughtfully and critically. The historical perspective demonstrates that theories change rapidly as the knowledge surrounding the field grow. This has led to more efficient interventions and treatments. However it is important to be aware that our understanding today, is as in the past, limited to our own particular historical and contextual position in time. In the future one can expect further modification and alternation in the diagnostic criteria, as new research will add to the current understanding of the field. Thus conduct disorders is in essence a classification, where a classification is simply "a way of seeing the world at a point in time" (WHO 1992:3).

Bibliography

- Advisory Group on Conduct Problems (2009). Conduct Problems Effective Programms for 3-7 Years-old.
- Achenbach, Thomas M. & Stephanie H. McConaughy (1987). *Empirically Based Assesment of Child and Adolescent Psycopahtology. Practical Applications*. Newbury Park: Sage Publications.
- Aichhorn, August (1925). Wayward Youth. London: Imago publishing co., Ltd.
- American Psychiatric Association (1968). DSM-II Diagnostic and statistical manual of mental disorders, Second edition. Washington D.C.: American Psychiatric Association.
- American Psychiatric Association (1980). DSM-III Diagnostic and Statistical Manual of Mental Disorder, Third Edition. Washington D.C.: American Psychiatric Association.
- American Psychiatric Association (1994). DSM-IV Diagnostic and Statistical Manual of Mental Disorder, Fourth Edition. Washington D.C.: American Psychiatric Association.
- American Psychiatric Association (2000). Diagnostic and Statistical Manual of Mental Disorders, DSM-IV-TR Text Revisionpp. 888 p.). Available from http://RB6FC7TV6S.search.serialssolutions.com/?V=1.0&L=RB6FC7TV6S&S=JCs&C=TC0000079027&T=marc
- Angold, Adrian & E. Jane Costello (2001). The epidemiology of disorders of conduct: nosological issues and comorbidity. In J. Hill & B. Maughan (Eds.), *Conduct disorders in childhood and adolescence* (pp. 126-168). Cambridge: Cambridge University Press.
- Ashford, Janka et al. (2008). Prenatal Smoking and Internalizing and Externalizing Problems in Children Studied From Childhood to Late Adolescence. *Journal of the American Academy of Child & Adolescent Psychiatry*, 47(7), 779-787.
- Bandura, Albert (1969). The role of modeling processes in personality development. In D. M. Gelfand (Ed.), *Social learning in childhood; Readings in theory and application*. Belmont: Brooks/Cole publishing company.
- Beres, Kristee A., Alan S. Kauiman & Mitchel D. Perlman (1999). Assessment of Child Intelligence. In G. Goldstein & M. Hersen (Eds.), *Handbook of Psychological Assessment (Third Edition)* (pp. 65-96). Amsterdam: Pergamon.
- Bronfenbrenner, Urie (1979). *The Ecology of Human Development*. Cambridge: Harvard University Press.

- Brophy, Jere (2006). History of Research on Classroom Management. In C. M. Evertson & C. S. Weinstein (Eds.), *Handbook of Classroom Management Research, Practise and Contemporary Issues*. New Jersey: Lawrence Erlbaum Associates.
- Burke, Jeffrey D. Ph D., Rolf Ph D. Loeber & Boris M. D. Birmaher (2002). Oppositional Defiant Disorder and Conduct Disorder: A Review of the Past 10 Years, Part II. *Journal of the American Academy of Child & Adolescent Psychiatry*, 41(11), 1275-1293.
- Burkhead, Dow Michael. (2006). *The search for the causes of crime: a history of theory in criminology*. New Carolina: McFarland & Company, Inc., Publishers.
- Burt, Cyril (1925). The Young Delinquent. London: University of London Press, Ltd.
- Carpenter, David O. & Rick Nevin (2009). Environmental causes of violence. *Physiology & Behavior*, 99(2), 260-268.
- Clarizio, Harvey F. & George F. McCoy (1970). *Behavior disorders in school-aged children*. Scranton: Chandler Publishing Company.
- Cleckley, Hervey M. (1955). The mask of sanity: an attempt to clarify some issues about the so-called psychopathic personality. St. Louis: Mosby.
- Costello, Jane E. & Adrian Angold (2001). Bad behaviour: an historical perspective on disorders of conduct. In J. Hill & B. Maughan (Eds.), *Conduct disorders in childhood and adolescence*. Cambridge: Cambridge University Press.
- Deater, Deckard (2009). Conduct problems, IQ, and household chaos: A longitudinal multi-informant study. *Journal of Child Psychology and Psychiatry*, 50(10), 1301-1308.
- DeKlyen, Michelle & Matthew L. Speltz (2001). Attachment and conduct disorder. In J. Hill & B. Maughan (Eds.), *Conduct disorders in childhood and adolescence* (pp. 320-345). Cambridge: Cambridge University Press.
- Dodge, Kenneth A. (1993). Social-Cognitive Mechanisms in the Development of Conduct Disorder and Depression. *Annual Review of Psychology*, 44(1), 559-584.
- Earls, Felton & Enrico Mezzacappa (2002). Conduct and Oppositional Disorders. In M. Rutter & E. Taylor (Eds.), *Child and adolescent psychiatry*. Maiden, MA: Blackwell Science.
- Eklund, Jenny M., Margaret Kerr & HÂkan Stattin (2010). Romantic relationships and delinquent behaviour in adolescence: The moderating role of delinquency propensity. *Journal of Adolescence*, *33*(3), 377-386.
- Fergusson, David M. et al. (2007). Protective and compensatory factors mitigating the influence of deviant friends on delinquent behaviours during early adolescence. *Journal of Adolescence*, 30(1), 33-50.

- Fink, Arthur E. (1938). *Causes of crime : biological theories in the United States, 1800-1915.* Westport, Conn.: Greenwood Press.
- Ford, Tamsin, Robert Goodman & Howard Meltzer (2003). The British Child and Adolescent Mental Health Survey 1999: The prevalence of DSM-IV disorders. *Journal of the American Academy of Child & Adolescent Psychiatry*, 42(10), 1203-1211.
- Frick, Paul J. (1998). Conduct Disorders and Severe Antisocial Behavior. New York: Plenum Press
- Frick, Paul J., Christopher T. Barry & Randy W. Kamphaus (2010). *Clinical Assessment of Child and Adolescent Personality and Behavior, Third edition*. Boston, MA: Springer Science+Business Media, LLC.
- Frick, Paul J. & Carrie Dickens (2006). Current Perspectives on Conduct Disorder. *Current Psychiatry Reports*, 8, 59-72.
- Gall, Meredith D., Joyce P. Gall & Walter R. Borg (2007). *Educational Research: An Introduction* (8 ed.). Boston: Pearson Education Inc.
- Glueck, Sheldon & Eleanor Glueck (1956). *Physique and delinquency*. New York: Harper & Brother.
- Gottfredson, Denise G. (2001). *Schools and Delinquency*. Cambridge: Cambridge University Press.
- Guba, E. G. & Y. S. Lincoln (1994). Competing paradigms in qualitative research. In N. K. Denzin & Y. S. Lincoln (Eds.), *Handbook of qualitative research* (pp. 105-117). London: Sage.
- Hergenhahn, B. R. (2005). *An introduction to the history of psychology* (5th ed.). Australia; Belmont, CA: Thomson/Wadsworth.
- Hill, Jonathan (2001). Biosocial influences on antisocial behaviours in childhood and adolescence. In J. Hill & B. Maughan (Eds.), *Conduct disorders in childhood and adolescence*. (pp. 103-125). Cambrigde: Cambrigde University Press.
- Jaffee, Sara R. et al. (2006). When parents have a history of conduct disorder: How is the caregiving environment affected? *Journal of Abnormal Psychology*, 115(2), 309-319.
- Johnson, Burke & Larry Christensen (2008). *Educational research: quantitative, qualitative, and mixed approaches.* (3 ed.). Los Angeles: Sage Publications Inc.
- Kamphaus, Randy W. & Paul J. Frick (2005). *Clinical Assessment of Child and Adolescent Personality and Behavior. Second Edition*. New York: Springer.
- Kazdin, Alan E. (2001). Treatment of conduct disorders. In J. Hill & B. Maughan (Eds.), Conduct disorders in childhood and adolescence. Cambridge: Cambridge University Press.

- Keenan, Kate, Rolf Loeber & Stephanie Green (1999). Conduct Disorder in Girls: A Review of the Literature. *Clinical Child and Family Psychology Review, 2*(1), 3-19.
- Lahey, Benjamin B. et al. (1995). Four-year longitudinal study of conduct disorder in boys: Patterns and predictors of persistence. *Journal of Abnormal Psychology*, 104(1), 83-93.
- Lahey, Benjamin B. et al. (1999). Developmental Epidemiology of the Disruptive Behavior Disorders. In H. C. Quay & A. E. Hogan (Eds.), *Handbook of Disruptive Behavior Disorders* (pp. 23-48). New York: Kluwer Academic/ Plenum Publishers.
- Larsen Bognes, Torill M. et al. (2006). Principles and strategies for implementation.
- Laurence, Jennifer & David McCallum (2003). Conduct Disorder: the achievement of a diagnosis1. *Discourse: Studies in the Cultural Politics of Education*, 24(3), 307 324.
- Leung, Patrick et al. (2008). Prevalence of DSM-IV disorders in Chinese adolescents and the effects of an impairment criterion. *European Child & Adolescent Psychiatry*, 17(7), 452-461.
- Loeber, Rolf et al. (2000). Oppositional Defiant and Conduct Disorder: A review of the Past 10 Years, Part I. *Journal of American Academy of Child and Adolescent Psychiatry.*, 39(12), 1468-1484.
- Lombroso, Cesare, Mary Gibson & Nicole Hahn Rafter (2006). *Criminal man*. Durham, NC: Duke University Press.
- Ludvigsen, Kari & Asmund Arup Seip (2009). The establishing of Norwegian child psychiatry: ideas, pioneers and institutions. *History of Psychiatry*, 20(1), 5-26.
- Lueger, Robert J. & Kenneth J. Gill (1990). Frontal-lobe cognitive dysfunction in conduct disorder adolescents. *Journal of Clinical Psychology*, 46(6), 696-706.
- Malherbe, E.G. (1938). Delinquency as an Educational Problem. In N. E. F. C. W. N. Z. etc.) & A. E. Campbell (Eds.), *Modern trends in education : the proceedings of the New Education Fellowship Conference held in New Zealand in July 1937*. Wellington: Whitcome & Tombs.
- Maughan, Barbara (2001). Conduct disorder in context. In H. Jonathan & B. Maughan (Eds.), *Conduct disorders in childhood and adolescnence* (pp. 169-201). Cambridge: Cambridge University Press.
- Maughan, Barbara et al. (2004). Conduct Disorder and Oppositional Defiant Disorder in a national sample: developmental epidemiology. *Journal of Child Psychology and Psychiatry*, 45(3), 609-621.
- McEvoy, Alan & Robert Welker (2000). Antisocial Behavior, Academic Failure, and School Climate: A Critical Review. *Journal of Emotional and Behavioral Disorders*, 8(3), 130-140.

- McGeorge, Colin (1985). *Schools and socialization in New Zealand 1890-1914*. University of Canterbury.
- Mezzacappa, Enrico et al. (1997). Anxiety, Antisocial Behavior, and Heart Rate Regulation in Adolescent Males. *Journal of Child Psychology and Psychiatry*, *38*(4), 457-469.
- Moffitt, Terrie E. (1993). Adolescence-limited and life-course-persistent antisocial behavior: A developmental taxonomy. *Psychological Review*, *100*(4), 674-701.
- Moffitt, Terrie E. (2003). Life-Course-Persistent and Adolescence-Limited Antisocial Behavior. In B. B. Lahey, T. E. Moffitt & A. Caspi (Eds.), *Causes of Conduct Disorder and Juvenile Delinquency* (pp. 49-75). New York: The Guilford Press.
- Muuss, Rolf E. (1996). Theories of Adolescence. New York: McGraw-Hill.
- Neill, Alexander Sutherland (1926). The problem child. London: Herbert Jenkins.
- Neisser, U. (Ed.) (2009) Grolier Multimedia Encyclopedia.
- Nordahl, Thomas & Terje Manger (2005). *Atferdsproblemer blant barn og unge*. Bergen: Fagbokforl.
- Ogden, Terje (2002). Multisystemisk behandling av atferdsproblemer teori og forskningsgrunnlag. *Tidsskrift for ungdomsforskning, 2*(2), 39-58.
- Patterson, G. R., Barbara D. DeBaryshe & Elizabeth Ramsey (1989). A Developmental Perspective on Antisocial Behavior. *American Psychologist*, 44(2), 329-335.
- Patterson, Gerald R (1982). *Coercive Family Process* (Vol. 3). Eugene: Castalia Publishing Company.
- Patterson, Gerald R. (1975). A Social learning approach to family intervention. Eugene, Or.: Castalia.
- Pettit, Gregory S. et al. (2001). Perceptual and attributional processes in aggression and conduct problems. In J. Hill & B. Maughan (Eds.), *Conduct disorders in childhood and adolescence*. (pp. 292-319). Cambrigde: Cambrigde University Press.
- Raine, A. (1997). Classical conditioning, arousal, and crime: A biosocial perspective. In H. Nyborg (Ed.), *The Scientific study of human nature: tribute to Hans J. Eysenck at eighty* (pp. 122-141). Oxford: Pergamon.
- Robins, Lee N. (1966). Deviant children grown up: a sociological and psychiatric study of sociopathic personality. Baltimore, Md.: Williams & Wilkins.
- Robinson, Sheri L. & Sarah M. Ricord Griesemer (2006). Helping Individual Students with Problem Behavior. In C. M. Evertson & C. S. Weinstein (Eds.), *Handbook of classroom management : research, practice, and contemporary issues*. Mahawah, N.J.: Lawrence Erlbaum Associates.

- Rutter, M (1985). Resilience in the face of adversity. Protective factors and resistance to psychiatric disorder. *The British Journal of Psychiatry*, 147(6), 598-611.
- Rutter, M. & L. A. Sroufe (2000). Developmental psychopathology: Concepts and challenges. *Development and Psychopathology, 12*(03), 265-296.
- Rutter, Michael (2003). Crucial Paths from Risk Indicator to Causal Mechanism. In B. B. Lahey, T. E. Moffitt & A. Caspi (Eds.), *Causes of Conduct Disorder and Juvenile Delinquency*. New York: The Guilford Press.
- Rutter, Michael & Henri Giller (1983). *Juvenile delinquency : trends and perspectives*. Harmondsworth: Penguin.
- Sakai, J.†T. et al. (2008). Conduct disorder among Asians and Native Hawaiian/Pacific Islanders in the USA. *Psychological Medicine*, *38*(07), 1013-1025.
- Saucier Lundy, Karen. (2008). *Historical Research. The Sage Encyclopedia of Qualitative Research Methods. Sage Publications*. Thousand Oaks, USA: Sage Publications.
- Schoenwald, Sonja K. & Scott W. Henggeler (1999). Treatment of Oppositional Defiant Disorder and Conduct Disorder in Home and Community Setting. In H. C. Quay & A. E. Hogan (Eds.), *Handbook of Disruptive Behavior Disorders* (pp. 475-493). New York: Kluwer Academic/ Plenum Publishers.
- Shoemaker, Donald J. (2009). *Juvenile delinquency*. New York: Rowman & Littlefield Publishers, Inc.
- Shorter, Edward (1997). A history of Psychiatry. From the Era of the Asylum to the Age of Prozac. New York: John Wiley & Sons, Inc.
- Simonoff, Emily (2001). Genetic influences on conduct disorder. In J. Hill & B. Maughan (Eds.), *Conduct disorders in childhood and adolescence* (pp. 202-234). Cambridge: Cambridge University Press.
- Sletten, Aaboen, Mira (2007). Utsatt familieliv- dårlig råd og problematferd blant ungdom. *Tidsskrift for ungdomsforskning*, 7(1), 53-75.
- Slutske, Wendy S. et al. (1997). Modeling genetic and environmental influences in the etiology of conduct disorder: A study of 2,682 adult twin pairs. *Journal of Abnormal Psychology*, 106(2), 266-279.
- Snodgrass, Jon (1984). William Healy (1869-1963): Pioneer child psychiatrist and criminologist. *Journal of the History of the Behavioral Sciences*, 20(4), 332-339.
- Snyder, James J., John B. Reid & Gerald R. Patterson (2003). A Social Learning Model of Child and Adolescence Antisocial Behavior. In B. B. Lahey, T. E. Moffitt & A. Caspi (Eds.), *Causes of Conduct Disorder and Juvenile Delinquency* (pp. 27-48). New York: The Guilford Press.

- Thomas, Christopher R. (2010). Oppositional Defiant Disorder and Conduct Disorder. In M. K. Dulcan (Eds.), Dulcan's Textbook of Child and Adolescent Psychiatry.
- van Drunen, Peter & Jeroen Jansz (2004). Child-rearing and education. In P. van Drunen & J. Jansz (Eds.), *A social history of psychology* (pp. 45-92). Oxford: Blacwell Publishing.
- Watson, Dorothy (1970). Confirmation and the Adolescent. The Furrow, 21(4), 242-247.
- Weijers, Ido (2004). Delinquency and law. In J. Jansz & P. van Drunen (Eds.), *A Social history of psychology* (pp. 195-219). Oxford: Blackwell Publishing.
- Word Health Organization (1992). The ICD-10 Classification of Mental and Behavioural Disorders Clinical descriptions and diagnostic guidelines
- World Health Organization (2010). History of the development of the ICD.
- Wile, I. S. (1929). The orientation of conduct disorders. *The Journal of Abnormal and Social Psychology*, 23(4), 434-441.
- Wolff, Jennifer & Thomas Ollendick (2006). The Comorbidity of Conduct Problems and Depression in Childhood and Adolescence. *Clinical Child and Family Psychology Review*, *9*(3), 201-220.