

**NEAR EAST UNIVERSITY  
GRADUATE SCHOOL OF SOCIAL SCIENCES  
APPLIED (CLINICAL) PSYCHOLOGY MASTER PROGRAM**

**MASTER PROJECT**

**RECIDIVISM AMONG INDIVIDUALS WITH  
ANTISOCIAL PERSONALITY DISORDER**

**MEHMET HASGÜL**

**20071111**

**SUPERVISOR  
DR. DENİZ KARADEMİR ERGÜN**

**NICOSIA  
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**ÖZET****Antisosyal Kişilik Bozukluklarında Yeniden Suç İşleme Eğilimi****Hazırlayan: Mehmet HASGÜL****Haziran, 2014**

Bu çalışmanın amacı antisosyal kişilik bozukluğu için yeniden suç işleme eğiliminin etkilerini gözden geçirerek ve ilgili risk faktörlerinin araştırılmasıdır. Yineleyici suç, saldırganlık ve psikopati antisosyal kişilik bozukluğu olan bireylerde sıklıkla bir arada bulunmaktadır. ASKB olgularının başkalarına zarar vermenin yanında kendi kendilerine zarar verme davranışında da bulunduğu gözlemlenmiştir. Bu bozukluğa sahip olan kişilerde şiddet davranışı ilk olarak aileye yöneliktir. Madde kullanım öyküsünün tekrar suç işlemede önemli bir etken olduğu ortaya çıkmıştır. Yapılan çalışmada cinsiyet farklılıkları ön plana çıkmıştır. Erkek mahkûmların kadınlara oranla 3-4 kat daha fazla yineleyici suç işlediği tespit edilmiştir. Ayrıca ASKB olan kişilerin demografik özelliklerinde çeşitli benzerlikler saptanmıştır. Bu benzerliklerin başında daha önce şiddet suçu işlemiş olması, eğitim düzeyi düşük ve daha önce hem adli hem psikiyatrik öyküsü olması gelmektedir. Ayrıca kötü yaşam koşulları, genç yaş ve antisosyal kişilik bozukluğu yineleyici suçu tetikleyen faktörler olarak yer almaktadır. Prospektif çalışma sonuçlarına göre terapiye dâhil edilen grupların yeniden suç işleme oranlarında anlamlı bir azalma tespit edilmiştir.

**Anahtar Kelimeler: Antisosyal Kişilik Bozukluğu, Psikopati, Yineleyici Suç, Yeniden Suç İşleme Eğilimi**

**ABSTRACT****Recidivism Among Individuals with Antisocial Personality Disorders****Prepared by: Mehmet HASGÜL****June, 2014**

The aim of this study is reviewing the effects of recidivism on ASPD and searching related risk factors. Recidivism, aggression and psychopathy are generally found together among the individuals with ASPD. It was observed that ASPD cases also tended to damage themselves in addition to damage others. Antisocial individuals reflect their violent behaviours firstly to their family members. Substance use experience was found as an important risk factor for recidivism. Gender differences also came into prominence in this study. It was determined that convicted males were 3-4 times more prone to recidivism than convicted females. Moreover, it was found that people with ASPD had similar demographic characteristics. Most common similarities are listed as commitment of violent crime in the past, lower education level, having both criminal record and psychiatric disorder in the past. Factors such as bad life conditions, young ages and ASPD are also listed as factors that triggered recidivism. Prospective study findings revealed that a meaningful decrease was determined at the recidivism rate of the groups who were included into therapy program.

**Key words: Antisocial Personality Disorders, Psychopathy, Recidivism**

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Mehmet Hasgöl

Nicosia, June 2014

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## **1.INTRODUCTION**

Violence (Dursun, 2011) is a term that conveys meanings of “stoppage”, “hardness”, and “rigidity”. Some definitions of the violence term emphasize on irritability, intensiveness, wrathfulness; whereas others focused on actions such as offensive acts, giving damage, rape, using force. World Health Organization (WHO), defines the term of violence as the intentional use of physical force or power, threatened or actual, against oneself, another person, or against a group or community, that either results in or has a high likelihood of resulting in injury, death, psychological harm, maldevelopment, or deprivation ( WHO, 2002; Dursun, 2011 ).

The most obvious expressions of violence behaviour were observed in the form of physical and sexual violence. Anger, violence and aggression are found as mostly related with antisocial personality disorder. Studies conducted by Hare also verify those findings. Hare (1991, psychopathy and recidivism) conducted studies and then testified a relationship between criminal behaviour and antisocial personality disorder. It was found that people who have antisocial personality disorder began to commit criminal acts at earlier ages, exhibited more criminal acts and violence crimes when compared with other criminals who were not diagnosed with antisocial personality disorder. Studies also pointed out an excessive frequency for sexual crimes among antisocial people. Studies proved that people with psychiatric disorder were more tended to commit sexual crimes. Nowadays, the prevalence of violence

crimes shows an increase and violence crime commitment age shows a decrease (Cantürk & Cantürk, 2004; Hare, 1991 ).

Recent studies pointed out that people with psychiatric disorder exhibited less violent behaviours when compared with the general of society, despite previous studies mentioned psychiatric disorder as a serious risk factor for violence. The rate of aggressive behaviours exhibited by psychiatric patients was found more than 60%. Despite psychiatric disorders do not have the same potential for the risk of aggressive behaviour; probably they show an increase in parallel with the increasing prevalence of violent behaviours in society ( Öncü et. al., 2002 ).

Personality disorders became o focus of concern in last years. The main reasons of this popularity were identified as increasing prevalence of the personality disorders, occurrence of violence at domestic relationships and social adjustment problems in relation with personality disorders. Personality disorders are classified under the 3 main groups. Antisocial personality disorders are found in Cluster B classification of personality disorders ( Doğan, 2009 ).

Antisocial Personality Disorder (ASPD) is characterized as a complaint which does not cause any impairment in comprehension skills and basic perceptions and thought structure. It generally appears in the form of antisocial behavioural patterns that damages interpersonal and family relationships. It is accepted as a chronic and persistent mental disorder that gives discomfort to society rather than patient's himself. ASPD has been a focus of concern for the other disciplines for thousands of years beside medical science, because of the damage that is given society. It is hard to observe people who want to shape their environment according to their own rules, attempts to use other people for their own purposes, do not hesitate to give damage when they were prevented and whose behaviours are in harmony with their personality ( Heilbrun & Heilbrun, 1985 ).

Studies investigated the aetiology and clinical characteristics of ASPD revealed that some people who were diagnosed with ASPD had psychosocial developmental pathologies, biological impairments such as brain damage and it was also proposed



that differences in psychological factors were related with the severity of antisocial characteristics in behavioral context ( Perdeci et. al., 2010 )

This study aims to investigate risk factors related with recidivism of individuals who have antisocial personality disorder diagnosis. Findings that will be obtained soon may be useful for the treatment programs which aim to prevent recidivism. This study also aims to investigate predictors of criminal behaviour including violence as well.

## **2. PERSONALITY DISORDERS**

Personality structure will become personality disorder if it loses flexibility, integration and creates stress and inadequacy feeling in social and occupational functioning. Although it is known that personality disorders of adult people had so many reasons, factors involved in personality disorders are based on developmental impairments in infancy and childhood ( Erdem et. Al., 2010 ).

General characteristics of personality disorder are exhibiting maladaptive behaviours while responding environmental stressors and sometimes exhibiting unpleasant behaviours towards others. Personality disorders occur as a result of rigid, poor, and maladaptive defences, childhood abuse, negative family characteristics that include over protective and intervening child care, genetic and environmental factors. Moreover, expected characteristics of childhood and adolescent period such as hopelessness, despair and boredom also accompany with the symptoms of personality disorders. ( Erdem et. Al., 2010 ).

Prevalence and frequency of personality disorders show variations according to societies and social classes. It was reported that people from lower sociocultural and economic level prevalently lived in urban. Prevalence rate varies between 10-20% in developed societies. It was reported that males have 4-5 times more personality disorders than females. If we ignore the methodology of the study conducted before, it can be reported that life-time prevalence of personality disorders was about 6-9.8% ( Moran, 1999; Huss, 2008 ).

## **2.1 History of Antisocial Personality Disorder**

Psychopathy is a term that derived by the combination of traditional French, German and American psychiatry. Italian novelist Lambroso (1876) used the term of born criminal ( Herpetz & Sass, 2000 ).

Antisocial personality has been an ongoing issue since the beginning of mankind history. However this issue became attractive for the authorities at the end of 19th century. In the past, various terms such as psychopath, sociopath, asocial or dissocial were used for defining those patients. When the concept of psychopathy used in Germany for the first time, it was defined as aggressiveness or irresponsibility. Afterwards, well known French psychiatrist Philippe Pinel used term of “mania without delusions”. Benjamin Rush is the first person who identified antisocial behaviour as mental disorder. J.C. Prichart reformulated this term by using moral insanity term. Later on, the term of psychopathy was used in order to point out this issue as a result of hereditary deficiency and the term of sociopath was also used to attribute the aspect of antisocial behaviours that related with society ( Buzina, 2012 ).

### **3.ANTISOCIAL PERSONALITY DISORDER**

Antisocial personality disorder is a psychological disorder which is related with sociopathy and psychopathy. The main characteristic that makes sociopathic person different than a psychopathic one is pathology, in other words difference of symptoms. Psychopathy is a more severe disorder than ASPD. In psychopathy, in addition to symptoms of sociopathology, immoral behaviours are also observed. Sociopathy is the informal name of the psychological disease that named as antisocial personality disorder. According to diagnostic statistical manual of APA, antisocial personality is defined as a pervasive pattern of disregard for and violation of the rights of others since childhood and adolescence period ( Öztürk, 2004 ).

Main problem of personality disorder is based on ego ideals and inadequate social superego development. This incidence motivates them to sublimate themselves, being a self-seeking person and desire to control other people just for satisfying themselves. Poor tolerance for being inhibited, egocentrism, impulsivity, aggression, antisocial acts, inability to take a lesson from past experiences, immaturity in interpersonal relationships, poorly integrated sexual responses, inability to delay pleasure and urgent need for taking pleasure are the most obvious structural characteristics ( Öztürk, 2004; Doğan, 2009 ).

Antisocial individuals are disloyal people who have no sensitivity about crime and criminality. They only think for themselves and they do whatever they want to do. Most of them are emotionally incapable; despite some of them have intellectual

capacity. They have no insight about their own behaviours and they can't evaluate themselves according to the viewpoint of other people. They are generally unsuccessful at occupational activities and applications. They want their expectation to be realized urgently. They can only adapt themselves to a place where they can operate their superiority. They have poor tolerance for alcohol. By the influence of alcohol they become more aggressive and destructive. Alcohol using disorders are most prevalently observed among the antisocial individuals ( Moran, 1999; Erdem et. Al., 2010 ).

Antisocial people quickly lose their sympathy to their role models and they engage into destructive behaviours. Inadmissibility, untrustworthiness and irresponsibility of them increase as they grow up. They rarely or slightly feel any kind of regret. Their temperament rarely changes and they have rebel attitudes towards authority and society. They may be very destructive when they felt disappointed. They are generally proud of committing criminal acts and the severity of those acts. All those characteristics motivate them to be jailed at young ages. Hyperactivity, hostility, aggressive behaviours and difficulties in social adjustment are the characteristic that take place in their biography ( Perdeci et. al., 2010 ).

There is a general impression about antisocial people is they had higher levels of intelligence. However, detailed observations revealed that their intellectual capacity was very superficial. Despite they get normal or high scores from the psychometric intelligence tests, they don't reflect this skill on their behaviours. They are generally aware of their mistakes and incapability, however they fail to control their behaviour and obey limitations of reality. Antisocial Personality disorder was coded by American Psychiatrists Association in DSM-IV-TR diagnostic manual under the title of "axis-II, personality disorders type B". Diagnostic criteria of ASPD are listed as following:

- There is a pervasive pattern of disregard for and violation of the rights of others occurring since age 15 years, as indicated by three (or more) of the following:

- Failure to conform to social norms with respect to lawful behaviors as indicated by repeatedly performing acts that are grounds for arrest.
- Deceitfulness, as indicated by repeated lying, use of aliases, or conning others for personal profit or pleasure.
- Impulsivity or failure to plan ahead.
- Irritability and aggressiveness, as indicated by repeated physical fights or assaults.
- Reckless disregard for safety of self or others.
- Consistent irresponsibility, as indicated by repeated failure to sustain consistent work behavior or honor financial obligations
- Lack of remorse, as indicated by being indifferent to or rationalizing having hurt, mistreated, or stolen from another
- There is evidence of Conduct Disorder with onset before age 15 years.

ICD-10 declares that antisocial, asocial, psychopathic and sociopathic people could be evaluated under the same title ( Öztürk, 1993; Öztürk, 2004 ).

### **3.1. Characteristics of Antisocial Personality Disorder**

According to DSM, conduct disorder which occurs before the age 15 years has a pattern that includes at least three of following symptoms: criminal acts, deception, impulsivity, aggression, irresponsibility and lack of remorse. Failure to conform to social norms with respect to lawful behaviours is accepted as the main criteria for adults. More than a half of males who serve time in prison are included in this definition. A vast majority of those people begin to commit criminal behaviours at

earlier ages, have persisting antisocial behaviours and they are characterized by rigid and insensitive personality pattern. A study conducted on a sample consist of adults who had ASPD diagnosis reported that people both diagnosed as antisocial and committed violence crime had higher physical and verbal aggression level than the people who did not commit violence crime. They were also found as more prone to have higher anger level and substance addiction risk. Another study that conducted on an adolescent sample reported that participants of higher violence group tended to have higher scores from Antisocial Attitude Scale than the participants of lower violence group. Furthermore, participants of higher violence group reported as physically, verbally more aggressive and had higher levels of impulsivity ( Erdem et. Al., 2010 ).

### **3.2.Prevalence**

Prevalence of ASPD is related with certain variables such as age, sex socioeconomic status. Review of literature revealed that females had lower level of psychopathy when compared with males. Despite males and females manifest similar symptoms, they differ in terms of expression of aggression. For instance, a man may express his psychopathic violence pattern in a street fight while a woman prefers to express her own aggressive urges by applying violence to the family members. Findings obtained by the application of The National Comorbid Survey which refers DSM-III-R criteria on a sample in USA revealed that 5.8% of males and 1.2% were under the risk of having antisocial personality disorder during the whole life time. 1994 edition of DSM-IV reported that 3% of males and 1% of females had the diagnosis of antisocial personality disorder ( Huss, 2008; DSM IV ).

Studies investigated prevalence of ASPD by using different diagnostic methods reported that prevalence of ASPD was between 0.05% and 15%. A study conducted in the year of 1988 in USA revealed that prevalence of ASPD was about 3% and 4%. Recently, it is estimated that prevalence of ASPD in USA was 3% among males and

less than 1% among females. It is thought that sexual differences were sourced by the higher prevalence of minimal cerebral dysfunction and attention deficit and hyperactivity disorder among male children. Studies conducted with antisocial children revealed that those children were mostly grown up by extended families. Probably, existence of crowded male child population in the family contributes to development of antisocial behaviour while existence crowded female child population has contrary effect on antisocial behaviours. Antisocial personality disorder is generally diagnosed between the ages of 26 and 40. It is more prevalent among young adults when compared with people older than 45 years old. Sociocultural factors which have important role in the aetiology of the disorder affect the prevalence. Urbanization is another important risk factor. ASPD is more prevalent in ghetto. Prevalence may increase to 75% among the prisoners. Moreover, it was observed that only 1/3 of conduct disorder cases evolved to antisocial personality disorder. Because of this, antisocial personality disorder can not be diagnosed before the age 18 years. Persistent criminal behaviour is an important criterion which is necessary for diagnosing ASPD among adults. Hence, about 2/3 or 3/4 of convicted males who served time in prison fit to criteria of ASPD. The most common characteristics of ASPD are listed as violence, traffic crimes, inconsistency at work and marital disagreements. Psychopathy which is known as old and more inclusive concept emphasize on personality trait that motivates someone to commit crime, especially crimes about involuntary sensibility and interpersonal abuse. A group of Canadian researchers claimed that psychopathy had two factors and the first one was criminality and the second one was pathological interpersonal relationships. They criticised current definition of ASPD since it described only one of those two factors. It is clear that only a small group of convicted people can be diagnosed as ASPD when we evaluate those people according to the two dimensional definition. Current definition of ASPD is useful since it is based on certain behavioral determiners. However it is not reflected so much on precise evidences of criminality ( Moran, 1999; Black et. Al., 2010; Langevin & Curnoe, 2010 ).



Prevalence of ASPD is strongly related with variables such as age, sex and socioeconomic status. A study conducted in South Africa revealed inconsistently lower antisocial rates despite the higher levels of psychopathy ( Loots & Louw, 2011).

Studies revealed that ASPD was more prevalent among the individuals who have lower socioeconomic status. It has a very consistent relationship with male sexuality and it is 5-7 times more prevalent among males than females. ASPD is significantly related with lower socioeconomic status and there is a negative relationship between ASPD and being well-educated. National Survey Tracks conducted a study on 5962 participants over 18 years old and rate of the people who have a personality disorder was found as 9.1%. The rate of borderline personality disorder and antisocial personality disorder in this study is estimated between 1.4% and 0.6%. ASPD can be determined and diagnosed in all societies. However prevalence of this disorder shows differences according to societies. Those differences are so obvious that they can not be related with the problems occurred at the environment and usage of diagnostic tools. Those differences provide powerful evidence about the effect of social factors on ASPD. The most important evidence is from Eastern Asia. In Taiwan, ASPD rates were found as unexpectedly lower which was found between 0.03% and 0.14% for the samples in both urban and rural. It was also observed that prevalence of ASPD was lower in Japan. However, lower prevalences of ASPD are not observed in all Eastern Asia countries. A study conducted in Caucasia revealed that there was no relationship between ASPD and ethnicity/race, education level. Prevalence of ASPD was found as higher in South Korea, where the alcoholism was also prevalent. Prevalence of ASPD is also higher in socially less integrated Asia contexts. ASPD may have various prevalences among societies which have similar cultures. For instance, it was reported that criminal populations had lower rates of psychopathy in Scotland. Another important incidence that proves the role of social factors on ASPD is increasing ASPD rates in Northern America. Epidemiological Field Study (EFS) revealed that life-time prevalence of ASPD in last 15 years among the young people was increased two times more. Significant increases in short term

can be explained by the variables related with social environment. Rates found in Taiwan are quite far away from Western societies ( Ak & Sayar, 2002 ;Öncü et. al., 2002; Hwu et. Al., 1989 )

Cultural differences and rapid increase of ASPD prevalence bring the idea that assumes social pathology played a key role in this disorder. There are studies that revealed aggression and antisocial behaviours were more prevalent among black people than Indians. Social structures may either trigger or reduce the risk factors related with mental disorders. Lower prevalences in Taiwan may be related with high integrity in traditional Chinese families. These kind of families represent the values almost completely opposite to ASPD risk factors. Father is powerful and authoritarian, children have high expectations and loyalty to family is rewarded. Children grown by the families that put quite limitations have lower risk for ASPD. Conversely to popular opinion, prevalence of ASPD cannot be explained by poverty. Robins could not find a relationship between lower socioeconomic status and sociopathy free from father's criminality. If family functioning is good, there will be no relationship between poverty and crime. Vailent et. Al. conducted a long-term follow up study and they reported that people who were grown up in a poor environment worked so much to earn income and did not interest in criminal acts. This finding is also supported by another result provided by Robin. In this study, it was found that children of dysfunctional families had more risk for being member of a gang. Increase in criminality and ASPD rates in western societies occurs along with higher levels of prosperity. Probably, the main reason behind the increased ABPD prevalence is family dysfunction. Tendency to ASPD is more prevalent than tendency to antisocial behaviour's itself. If underlying impulsive characteristics can be kept in family and social structure, they will not cause any dysfunction. Manifest antisocial behaviour only occurs in cases of family dysfunction or social dissolution ( Ak & Sayar, 2002; Hwu et. Al., 1989; Öncü et. al., 2002 ).

A study conducted with female prisoners revealed that women had less antisocial personality pattern (15.5%) than men (25% to 30%). Another study revealed rate of

exhibiting psychopathic patterns of the females who had conduct problems in their childhood was found as 12% where it was found as 50% for males. Zagon and Jackson (1994) applied Self-Report Psychopathy scale to the high school students and they found that girls scored less than boys. Other studies also revealed same findings about sexual differences.

### **3.3 Risk Factors**

People who have this psychiatric disorder are characterized by lack of empathy, poor social relationships, failure to tolerate distress. People who committed antisocial acts before the age 15 years such as elope, picking fight, tendency to use guns, starting a fire, telling lies, giving harm to the other people or their properties, form the risk group of antisocial personality disorder. Inadequate parental education level, fragmentation of family and using illegal income sources were predicted as significant risk factors of antisocial attitudes. In addition to those factors people who have behaviour patterns such as failure to maintain mutual interactions, inability to pay debts, recurring detentions, lack of conscience, indifference for the future form the risk group for the antisocial personality disorder. Alcohol and substance abuse history is also observed along with self-mutilation ( Kendi et. al., 1998 ).

### **3.4 Genetic Factors**

In early days there were poor evidences to prove the influences of genetic and structural factors. However recent studies provided important evidences to support existence of a relationship between genetic factors and antisocial personality disorder. Many studies investigated people with antisocial personality disorder revealed a relationship between sociopathy and having an alcoholic family relative from the first degree. It was also found that a big vast of antisocial adults had

antisocial family relatives. The most important risk factor that predicts antisocial personality disorder is having an antisocial parent. Electroencephalographic investigations revealed that antisocial people and their parents had significant brain damages. Namely, biogenetic factors and environmental factors collaborate with each other and provide a basis for the antisocial attitudes ( Öztürk, 2004; Ak & Sayar, 2002 ).

Previously, evidences were insufficient to support the influence of genetic and structural factors. But most of the recent studies provided findings that support genetic factors were efficient on antisocial personality disorders. Moreover, there are also controversial findings about the role of genetic factors in personality disorders (Vaillant, 1976; Öztürk, 1993 ).

Genetic and biological factors guide the course of newborn's future life by determining activity level, type of relationship with the environment, intelligence, sexual and aggressive behaviour differences. In the year of 1963 a personality profile study was conducted on a sample consisted of same sex monozygotic and dizygotic twins. Minnesota Multidimensional Personality inventory and High School Personality Inventory were applied to those participants. Monozygotic twins scored more similar results than dizygotic twins from 5 of 10 subscales in MMPI and 6 of 16 subscale of HSI. A study conducted in Denmark on a sample consisted of adopted children revealed that 14% of biological family relatives of people who were diagnosed as antisocial had obvious psychopathic personality pattern. Similar studies also revealed that adopted children who had not biological relatives diagnosed as ASPD did not increase the risk of having ASPD even they were grown up by criminal parents ( Lewis et. Al., 1985; Hales et. Al., 1986 ).

In many studies it was observed that a relationship between alcoholism and psychopathy among the first degree relatives of antisocial people. It was also observed that antisocial people had more antisocial family relatives than the control group. Increased alcoholism prevalence was observed among both biological and adopted relatives of alcoholic antisocials. It was reported that Alcoholism and ASPD

generally occurred together, while genetic disposition was independent from ASPD ( Hakansson & Berglund, 2012 ).

The biggest risk factor for ASPD is having a biological parent who has this disorder and genetic influence on ASPD has already proven. However, it is also known that a person who had a biological parent probably would have experienced a series of traumatic facts such as divorce, poverty, living in socially dissolved neighbourhood, inconsistent and harsh discipline, neglect and abuse. It is hard to tell that if existence of biological parent with ASPD played causal role, until this assumption would be tested in a statistical context.

Ongoing studies revealed that criminal, antisocial people and their family relatives had obvious electroencephalography (EEG) abnormalities which are indicators of severe brain damage. Despite the basic reason is not clear, ASPD is related statistically with attention deficit and hyperactivity disorder, milder neurological findings of childhood period and antisocial behaviour in adulthood ( Dinn & Harris, 2000 ).

Brain imaging studies conducted recently revealed that ASPD was related with prefrontal dysfunction. However, the same studies revealed controversial findings about frontal functioning. General opinion about this issue claims that orbitofrontal hypoactivity had not great lesioning. Neuropsychological studies revealed that individuals diagnosed with ASPD were unable to develop normal conditional responses against the fear provoking stimulus. It is thought that reduced conditioning provided a basis for tendency to antisocial behaviour. However, there are situations that fearlessness paved the way for adjustment. For instance antisocial individuals may be useful in battlefield. Antisocial patients generally have abnormal EEG results that indicate existence of a brain damage and slight neurological symptoms. A study revealed that adolescents who exhibit aggressive behaviours had decreased blood circulation in frontal lobes and lower glucose consumption in prefrontal lobe. Learning difficulties such as impairments in listening, reading, writing, problem solving and speech that observed among the antisocial children are indicators of

minimal brain damage. It was determined that, a half of antisocial individuals had an EEG symptom called as slow wave activity which was also common among children and adolescents ( Widiger & Corbitt, 1993; Dinn & Harris, 2000 ).

Many studies investigated the role of heredity in ASPD revealed that genetic predisposition had an important role in this disorder. Likelihood of having ASPD independent from the environment is meaningfully higher among the children of antisocial parents than the children of healthy parents. Antisocial behaviors independent from alcohol abuse is observed as more prevalent among the males who had an antisocial biological relative from the first degree. Nevertheless, it is hard to say that antisocial behavior was completely genetic and transferred by heredity. Phenotypical characteristics and tendencies specific to genotype are not known precisely. A serie of genotype may provide a basis for ASPD by combining with a serie of environmental factor and this combination might be expressed in the form of impulsivity, criminality, aggression, guiltiness and regret. Biogenetic researches revealed that in addition to genetic predisposition, ASPD occurred as a result of interacting with an environment that supports and reinforces the antisocial behavioral patterns. It is known that higher levels of intelligence worked as protective factor by presenting alternative ways. On the other hand, it is known that alcohol and substance abuse triggered and empowered antisocial tendencies ( Widiger & Corbitt, 1993).

In conclusion, biogenetic factors and environmental factors interact with each other and provide a basis for antisocial behavior. Thus, family history and experiences of the patient should be evaluated independently, biogenetic and psychosocial risk factors should be investigated carefully in order to develop preventive strategies (Widiger & Corbitt, 1993).

### **3.5.Comorbidity**

Aggressive behavior is frequently observed in many disorders as well as ASPD cases. Aggression is defined as behavioral pattern that aims to give damage to one's self or other people verbally, physically or psychologically. Alcohol or substance using disorder and antisocial personality disorder are known as two factors that trigger each other. In addition to this, a positive relationship between aggressive behavior and sleep disorders is also prominent (Algül, et. Al., 2009)

Self-mutilation is another symptom that observed in ASPD cases along with giving harm to other people. Suicide which is accepted as self-mutilation behavior is seen in 4-14% of general population of borderline personality disorder cases. Despite the positive relationship exists between self-mutilation behavior and very few studies has been conducted ever about it. It was reported in a -study that 99% of antisocial individuals who had high levels of aggression also mutilated themselves. In the same study it was determined that 40% of all participants with excessive aggression level had pathological disation about 45%. Those rates are consistent with the rates reported by literature. Self mutilation rate was found about 17-52% percent among the antisocial and non-antisocial prisoners. (Algül, et. Al., 2009)

A consistent relationship was found between antisocial behavior and adhd. Symptoms were determined as neuropsychological damages among the children and adolescents. A study conducted on adults also revealed a positive relationship existed between adhd and psychopathy ( Langevin & Curnoe, 2010 ).

It was observed that individuals who committed paraphiliac or sexual crimes had abnormalities in brain functioning. This abnormality is reported as temporal lobe brain abnormalities (Langevin & Curnoe, 2010).

Brain functioning imaginary technics and neuropsychological tests revealed that prefrontal dysfunction (particularly orbitofrontal) was related with psychopathic personality characteristics and antisocial behaviors. According to a research, the frequency of alexitimic symptoms among 193 antisocial individuals who applied to

GATA (Gülhane Military Medical Academy Hospital of Haydarpaşa) was determined as 69.4% ( Dinn & Harris, 2000; Ateş et. Al., 2009 ).



#### **4.PSYCHOPATHY**

Hare defined psychopathy as a socially destructive disease and psychopaths as the predators of human race. This concept is also defined as empathy disorder originated from mental problems. It has characteristics like social brain dysfunction, emotional discomfort and immature personality. Definition of psychopathy still constitutes a big issue in literature despite the existence of an agreement about the general characteristic of psychopathology. It's hard to evaluate factors which enable to relate terms of psychopathy with crime. Criminal behaviour is a supplemental characteristic of psychopathy. Antisocial personality disorder and psychopathy have similar meanings; however they are not synonyms ( Huss, 2008; Soderstrom, 2003 ).

Studies indicate that recidivism related positively with psychopathy. Meta-analysis of a study conducted in Netherlands with 5853 participants in the year of 2011 revealed that criminal behavior was related with child abuse or juvenile delinquency ( Ascher et. Al., ( 2011 ).

39 further analysis made by Morgan & Lilienfeld (2000) revealed that a powerful relationship existed between cerebral dysfunctions and antisocial attitudes (Dinn & Harris, 2000).

Psychopathy is diagnosed by using "Hare's Psychopathy Control List – Revised (PKL). This scale consists of items related with past criminal experiences. It evaluates related situations over 40 points in 20 category (Harris et. Al., 1991).

Another classification is made according to general quality of the violence applied by psychopaths. There are differences between instrumental and reactive violence. Instrumental violence is applied in purpose whereas reactive violence is committed as a result of emotions. For instance, if a man murders his wife after providing evidences that proves he was cheated by his wife, this murder is classified as instrumental violence. But, a murder committed by a man who unexpectedly witnessed that his wife was cheating on him is defined as reactive violence. Psychopaths person classified as a instrumental violence (Huss, 2008).

## **5.ANTISOCIAL PERSONALITY DISORDERS VERSUS PSYCHOPATHY**

Previously, emotional qualities such as egocentrism, deceptiveness, emotional deficit, egoism, lack of empathy, crime and regret had been effective factors for diagnosis and conceptualization of psychopathy. However, in the year of 1980 DSM-III came out and the term of psychopathy was replaced by the term of antisocial personality disorder which was characterized by frequent violation of public rules including behaviors such as lying, theft, inconsistent working behavior and traffic crimes. The most important cause of deviations in clinical diagnosis is complexity of personality traits ( Hare, 1996 ).

One of the most critical problems of DSM-III and its revised version DSM-III-R was lack of personality traits as a part of ASPD diagnosis. The main reason of this criticism was assessment of antisocial individuals who had different personality types, attitudes and motives in the same diagnostic category (Hare, 1996).

Distinction between psychopathy and ASPD has a very important place for mental health and justice system. However this distinction is not clear both in the mind of clinicians and the last edition of DSM-IV. As a result of this unfortunate obscurity, there is no difference between a clinician at the court who tells that suspected person meet the criterias of ASPD and another clinician that assumes the same suspect did not meet ASPD criterias. In that, both of them might be right. Because the first clinician might only referred formal diagnostic criterias whereas the second one might claim that suspected one did not meet personality traits that stated in related characteristics text of DSM-IV in addition to formal diagnostic criterias. Inability to

make a distinction between psychopathy and ASPD may give way to serious problems. For instance, most of the courts evaluate psychopathy as an aggravating factor rather than alleviating reason while determining the responsibility of accused people ( Hare, 1996 ).

Herpetz & Sass (2000) drew differential typology of personality disorders (figure 1) in order to make complexities in diagnostic criterias more sensible ( Herpetz & Sass, 2000 ).

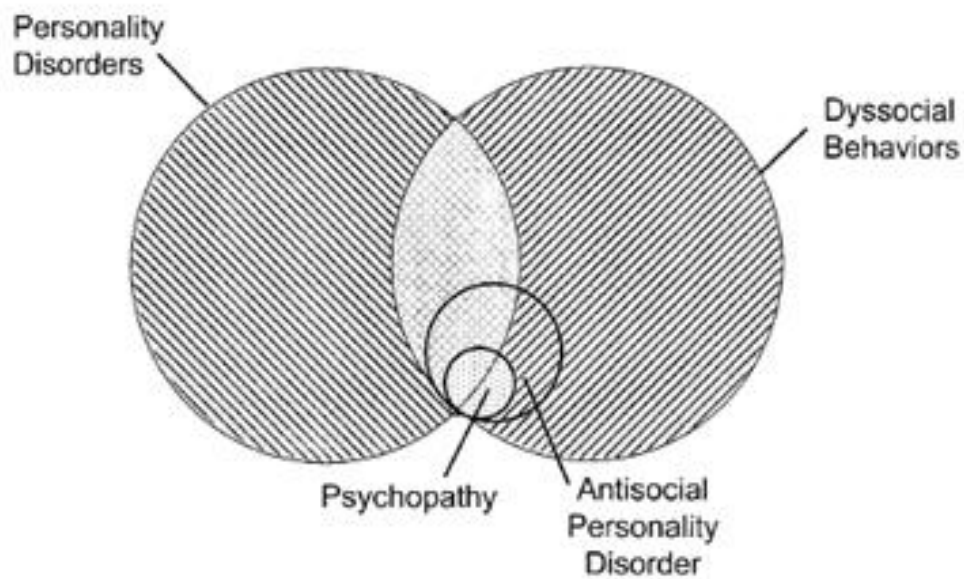


Figure 1. Differential typology of personality disorders: Personality disorder-antisocial personality- psychopathy-dyssocial behaviors. ( Herpetz & Sass, 2000, *Behavioral Science and the Law*, s:571)

## **6.RECIDIVISM**

Various dictionaries define lexical meaning of this word as following: tendency to sustain commit criminal acts; recurrence of crime or criminal behaviour; recommitment of an undesired behaviour. Physical violence behaviour is often observed in psychiatric disorder cases. Frequency, type and nature of violence depend on the psychopathological characteristics of the disorder. Violence behaviour is the one of diagnostic criteria stated in DSM-IV about antisocial personality disorder. Studies conducted in early years are far away to provide enough evidence to prove if psychiatric patients were more tended to commit crime more frequently than the general of society. However, studies conducted between the years of 1959 and 1979 reported that both hospitalized and discharged psychiatric patients committed either equal amount of crimes with general society or more crimes than the general of society. Almost all studies conducted about this issue pointed out the existence of a powerful relationship between antisocial personality and crime (Öncü et. al., 2002).

A study conducted on convicted people who were diagnosed with ASPD revealed that recidivism rate of male participants was 42%. Female participants had significantly lower rate of recidivism with 12.6% than males. Structure of psychopathy enables to estimate recidivism tendency of males. However content of this structure do not enable to estimate recidivism of females (psychopathy and female recidivism)

In many times, criminal behavior may occur as a result of seeking financial support to provide drugs. Additionally, criminal behavior is also common among the people who have mental disease. Convicted people are often the victims of alcohol or drug use including people who have excessive levels of personality disorder as well. Risk factors for recidivism can be increased as the literature would be reviewed. History of substance use is reported as an indicator of recidivism. Moreover, it was reported that people who committed crime before were more tended to recidivism. Bad life conditions, male gender, young ages and antisocial personality disorder are known as other risk factors for recidivism ( Hakansson & Berglund, 2012 ).

A follow up study was conducted in a jailhouse in Switzerland with the participation of 5122 people. Number of sample was decreased 4152 people because of certain reasons such as death, dropping out. This research took 2.7 years. Findings of this research indicated that 69% of those who were released committed a crime again and turned back to prison ( Hakansson & Berglund, 2012 ).

## **7. ANTISOCIAL PERSONALITY DISORDER AND RECIDIVISM**

Persistent crime pattern in antisocial behavior can be explained by static theory characteristics. This statistical theory is provided by observing childhood period. Existence of those characteristics such as male gender, lack of self-control, psychopathic personality, and problematic family background will reflect on their criminal destiny. Dynamic theory assumes that changes in life conditions had a direct influence on criminal behavior. According to social learning theory, recidivism and desistance have the same variation value to trigger criminal behavior ( Liem, 2012 ).

It is known that recidivism was related with previous criminal behavior and antisocial personality disorder. Aggressive attitudes and behaviors can be prevented by a good psychiatric supervision. According to classification of DSM-IV, violent behavior is accepted as a diagnostic criterion in certain psychiatric disorders. ASPD is one of those disorders. All studies examined this assumption revealed that antisocial personality disorder was more related with criminal behavior than any other disorder. Violent behavior is priorly reflected to family members by the individuals who have disorder. Estroff et. Al. reported that family members who exposed violence most prevalently were mothers ( Öncü et. al., 2002 ).

A study conducted in USA and Canada revealed that people with mental disorder who are exempted from criminal liability had the similar demographic characteristics. The most prominent similarities were found as male gender,

commitment of violent crime previously, lower educational level, having psychiatric disorder and criminal record in the past. Having criminal experience before was found about 33-75% averagely, having criminal record and hospitalization experience was found as 61%. A study conducted in Ireland revealed that 95% of those who were exempt from criminal liability committed violent crime. In Japan, it was found that 57% of those who were exempt from criminal liability were single and 82% had experience of being arrested. The same study also revealed that 88% committed violent crime and 57% of those crimes were murder ( Öncü et. al., 2002 ).

Turkcan et al. conducted a study in order to determine criminal liability and they found that 34% of participants committed crime in the past. In follow up study, 64 people diagnosed with ASPD in prison were followed for 5 years. 39% of those participants were re-arrested later because of violent crime ( Öncü et. al., 2002 ).

A study conducted in Grendon on 244 prisoners released from the jail that had personality disorders revealed amazing findings. 33.2% of the participants who released after serving 2 years in prison committed crime again. Recidivism rates in next 3 years after release were found as 20% for those who received therapy more than 18 months and 40% for those who received therapy 18 months or less (Lee & Phil, 2001).

In Netherlands, an extended study was conducted about recidivism of those who were diagnosed with ASPD. 52% of 517 participants who were discharged from hospital between the years of 1955 and 1980 re-committed crime in following five years. Studies revealed that individuals with ASPD were more tended to recidivism when compared with people who had other types of mental disorders ( Lee & Phil, 2001 ).

Meta-analysis applied to 5853 people who participated in 39 studies between the years of 1990 and 2010 revealed existence of a relationship between psychopathy and recidivism. According to findings of this this study, the most powerful between psychopath and recidivism was found in Canada rather than USA and Europe.



Another study investigated 3545 individuals who participated in 29 studies between the same years also revealed a meaningful relationship between psychopathy and violent recidivism ( Ascher et. Al., ( 2011 ).

This study was conducted in a mental health facility consists of participants who had psychopathy diagnosis between 1968 and 1978. Only the people who spent 2 years in this facility and participated in therapeutic community program were included in this study. At the end of follow process in 1988, 67 (40%) of 169 participants meet the criteria for violent failure. General findings indicate that violent recidivism was related with childhood aggression and antisocial behavior ( Hare, 1996 ).

## **8.TREATMENT OF ANTISOCIAL PERSONALITY DISORDER**

Certain paradigms claims that ASPD was incurable and treatment attempts would be harmful. First of all, emotional bond that is needed for an effective therapy should be maintained. Positive effects of psychotherapy were observed in previous studies. A study conducted by Skeem et. Al. provided important findings contrary to those paradigms. This study revealed that participants became less violent and antisocial after the they received therapy in sufficient dose ( Harris and Rice, 2002; Skeem et. Al., 2007 ).

Facilities that provide hospitalization for the treatment of psychopathic people are listed as private hospitals, regional secure units, intensive psychiatric care units, conventional psychiatric hospitals. Those patients are also controlled legally and punitively by the authorities because of their psychopathic nature and violent behavior. Psychiatrist provides treatment for those individuals when they were arrested, judged or hospitalized ( Harris and Rice, 2002 ).

Psychopathic people are generally accepted by private hospitals as a part of forensic custody. Private hospitals are ruled by Private Hospital Service in Wales and England and this service is responsible for the safety and surveillance of the hospitals. Because they are potentially very dangerous for society. The first private hospital was found in England in the form of home office by the year of 1948. Regional security units provide more forensic medicine services. Out patient care

services provide non-hospitalized treatment at the out of clinic. Out patient care services are generally in cooperation with forensic medicine facilities for patient care ( Harris and Rice, 2002 ).

Administrative staff of jailhouse has to provide health care service for the treatment of convicted people. However, most of those services are not available long-term therapies ( Harris and Rice, 2002 ).

The most common treatment method that used at treatment of personality disorders is prescription of neuroleptics, antidepressants, lithium, benzodiazepines, psychostimulants and anticonvulsants. There are studies that reported sedative neuroleptics were more effective. Neuroleptics have pacificatory effect on disturbing behaviors. They are prominently effective on permanent tension, anger and hostile attitudes. Lithium is generally preferred for treatment of psychopathic patient because of its preventive effect on explosive and emotionally instable behavior ( Harris and Rice, 2002 ).

Behavioral therapies and behavioral replacement technics are also used for the treatment of maladaptive behaviors. Cognitive technics aim to provide opportunity to patient for questioning their inappropriate or irrational thoughts and also provide opportunity to replace them with new cognitions. In cognitive therapy, therapist has to obey certain rules while guiding patient. Prison terms should be avoided in the content of the therapy. Therapy process should focus on to save antisocial patients from antisocial behaviors rather than meanings. Goal of cognitive therapy is making patient capable for understanding their problems and preventing their distorted perceptions about how other people saw him. Because antisocial people are disposed to blame others. They have less tolerance for disappointment ( Harris and Rice, 2002; Moley, 1988 ).

Psychotherapy has a very important place in treatment process. It helps those individuals to understand their emotions, maladaptive behaviors and the relationship between their mental state and behaviors. Therapeutic alliance plays an important

role in this process. Psychotherapy groups are also important factors in this process. Group therapy is provided for supporting and promoting education. Studies revealed that psychotherapy process of psychopathic and antisocial people was very hard since they were not under forensic custody. In addition to this, hospitalization duration of antisocial individuals is very short ( Harris and Rice, 2002 ).

## **9.CONCLUSION**

Antisocial personality disorder has been accepted as a mental disorder approximately for 200 years. Since then, aggression has been accepted as a behaviour pattern that observed in ASPD. Ateş et. al. proposed that in addition to criterion that emphasized disposition to aggression and violence, ASPD was also related with the intensity and pathological forms of aggression. Probability of exhibiting aggressive behaviour was found over 60% for the individuals who had a psychiatric disorder. Despite all of psychiatric disorder do not have the same potential for violent behaviours probably they spread in relation to the increase of violent behaviour and probably become more intense ( Öncü et. al., 2002; Ateş et. Al., 2009 ).

Recidivism is determined as to be related with previous criminal experiences. So many studies revealed that people who had ASPD were more tended to recidivism than other criminals. Male criminals form a big majority of risk group. Findings of this study supported the idea that claims ASPD increased the risk of recidivism. However, those findings cannot be interpreted as if every individual with ASPD tended to recidivism.

Social structures may increase the threshold of being effective for the onset of mental disorders. Hence, it can be thought that social pathology was effective on the rapid increase of ASPD in recent years. There are so many studies proved that genetic factors were also effective on ASPD. In conclusion, biogenetic factors provide a

basis for antisocial attitudes by the way of interacting with social factors. Because of this, in addition to family history and life experiences, biogenetic risk factors should be also evaluated carefully at the process of ASPD treatment ( Öncü et. al., 2002 ).

Another method that will be helpful to understand the influence of ASPD on recidivism is focusing on studies about genetic predispositions. Despite very few studies has been conducted ever, findings indicate that biological relatives of the individuals with ASPD also had patterns of psychopathic personality.

Preventing recidivism of individuals with ASPD is related with healthy prognosis. Early and accurate diagnosis will be effective for preventing violent behaviour. Health care services in jailhouses will contribute to prevention of recidivism. However, very few health services are active now because of inadequate opportunities in jailhouses. Patients with ASPD may be educated in jailhouse about improvement of problem skills which are socially acceptable by others and which motivate them not to give any harm to themselves. Skill improvement programme may include acquisition of vision, impulse control, effective communication, emotional regulation, tolerance for being prevented, indirect thinking, initiative, and delay in reacting and cognitive re-construction. Therapeutic methods such as understanding the importance of listening one's self, coping with the disturbance sourced by introspection and improving skills that enable them to question their feelings and thoughts may be helpful to individuals with ASPD. It is thought that the main purpose of those therapeutic methods was decreasing recidivism rate of individuals with ASPD. Group therapy is also an important factor in this process.

Individuals with ASPD are generally resistant to therapy and it is hard to treat them. In therapy process, improvement of social and moral behaviours by amplifying cognitive functioning should be regarded at first. Therapy process should be determined according to psychological development theory by regarding moral development history of patients.

**10.REFERENCES**

Ak, İ., Kemal Sayar, 2002. Antisozyal Kişilik Bozukluğunda Sosyobiyojik Etmenler. **Klinik Psikofarmakoloji Bülteni**. c.12. s: 155-158.

Algül, M. Alpay Ateş, Murat Gülsün, Ali Doruk, Ümit B. Semiz, Cengiz Başoğlu, Servet Ebrinç, Mesut Çetin, 2009. Antisozyal Kişilik Bozukluğu Olgularında Kendini Yaralama Davranışının Saldırganlık, Çocukluk Travmaları ve Dissosiyasyon ile İlişkisi. **Anadolu Psikiyatri Dergisi**. c.10. s:278-285.

Asscher, J.J., Eveline S. van Vugt, Geert Jan J.M. Stams, Maja Dekovic, Veroni I. Eichelsheim, Sarah Yousfi, 2011. The Relationship Between Juvenile Psychopathic Traits, Delinquency and (Violent) Recidivism: A Meta Analysis. **Journal of Child Psychology and Psychiatry**. c.52.s:11 1134-1143.

Ateş, A., Ayhan Algül, Murat Gülsün, Ömer Geçiçi, Barbaros Özdemir, Cengiz Başoğlu, Ümit Başar Semiz, Servet Ebrinç, Mesut Çetin, 2009. Antisozyal Kişilik Bozukluğu Olan Genç Erkeklerde Aleksitimi, Saldırganlık ve Psikopati İlişkisi. **Nöropsikiyatri Arşivi Dergisi**. c.46. s:135-139.

Buzina, N., 2012. Psychopathy – Historical Controversies and New Diagnostic Approach. **Psychiatria Danubina**. c.24. s: 134-142.

Cantürk, G., Nergis Cantürk, 2004. Suçlu Profili. **Adli Tıp Dergisi**. c.18. s:2: 27-37.

Dinn, M.W., Catherine L. Harris, 2000. Neurocognitive Function in Antisocial Personality Disorder. **Psychiatry Research**. c.97. s: 173-190.

Doğan, Ş.. 2009. Kişilik Bozuklukları. **Klinik Gelişim Dergisi**. c. 22. s:4-8.

Dursun, Y., 2011. Şiddet nedir. **Felsefe ve Sosyal Bilimler Dergisi**. c.12 s:1-18.

Erdem, Barbaros Özdemir, Cemil Çelik, Adem Balıkçı, Türker Türker, Kemal Nahit Özmenler. 2010. Antisosyal Kişilik Bozukluğu Olgularının Şiddet Suçu Niteliğine Göre Mizaç ve Karakter Özellikleri. **Klinik Psikiyatri Dergisi**. c.13. s:113-118.

Hales, R., Allen J. Frances, Robert Pasnau, 1986. **Review Of Psychiatry**. c.10. s:447-565.

Hakansson, A., Mats Berglund. 2012. Risk Factors for Criminal Recidivism – A Prospective Follow-up Study in Prisoners with Substance Abuse. **Bmc Psychiatry**. c.12. s:113-118

Harris, G., Marnie E. Rice, Catherine A. Cornier, 1991. Psychopathy and Violent Recidivism. **Law and Human Behaviour**. c.15. s: 625-636.

Hare, R.D. 1996. Psychopathy and Antisocial Personality Disorder: A Case of Diagnostic Confusion. **Psychiatric Times**. c.13. s:244-251.

Heilbrun, A.B, Heilbrun, M.R 1985. Psychopathy and Dangerousness: Comparison, Integration and Extension of Two Psychopathic Typologies. **British Journal of Clinical Psychology**. c.3. s: 181-195.

*Herpetz, C.S., Hennig Sass, 2000. Emotional Deficiency and Psychopathy. Behavioral Science and the Law*. c.18. s:567-580.

Huss, T. M. , **Forensic Psychology: Research, clinical practice and applications**. Wiley, John and Sons, incorporated Publisher. 2008.



Hwu, Yeh, Chang, L.Y., 1989. Prevalence of Psychiatric Disorders in Taiwan Defined by the Chinese Diagnostic Interview Schedule. **Acta Psychiatrica Scandinavica**. c.79. 136-147.

Kendi, Ö., Atlas Bogenç , Yaşar Bilge, Kemalettin Acar, İbrahim Tunalı ,1998. İki Antisosyal Kişilik Bozukluğu Vakasının Adli Tıp Yönünden Değerlendirilmesi. **Ankara Üniversitesi Hukuk Dergisi**. c.8 s:164-169.

Krug, G.E. , Dahlberg, L.L., Mercy, J.A., Anthony, B., Lozano, Z., Lozano, R World Report on Violence and Health. World Health Organization. 2002.

Langevin, R., Suzanne Curnoe, 2010. Comparison of Psychopathy, Attention Deficit Hyperactivity Disorder, and Brain Dysfunction among Sex Offenders. **Journal of Forensic Psychology Practice**. c.10. s: 177-200.

Lewis, D., Moy, Jackson, Aaronson, Restifo, Serra, Simos, A., 1985. Biopsychosocial Characteristics of Children Who Later Murder: A Prospective Study. **American Journal of Psychiatry**. c.10 s: 1161-1167.

Liem, K. 2012. Homicide Offender Recidivism: A Review of the Literature. **Aggression and Violent Behavior**. c.18. s:19-25.

Loots, S., Louw, D., 2011. Antisocial Personalities, Measuring Prevalence Among Offenders in South Africa. **South Africa Crime Quarterly**. c.36 s: 31-36.

Moran, P., 1999. The Epidemiology of Antisocial Personality Disorder. **Social Psychiatry and Psychiatric Epidemiology**. c.34. s:231-242.

Öncü, F., Hüseyin Soysal, Niyazi Uygur, Füsün Özdemir, Solmaz Türkcan, Doğan Yeşilbursa, Gazi Alataş, 2002. Zorunluk Klinik Tedavi Sonrası Yineleyici Suç

İşleyen Adli Psikiyatri Olgularının Tanı ve Suç Niteliği Açısından Değerlendirilmesi. **Düşünen Adam Dergisi**. c.15. s:132-148.

Öztürk, O. 1993. Dünya Sağlık Örgütü: **ICD-10 Ruhsal ve Davranışsal Bozukluklar Sınıflandırması, Klinik Tanımlamalar ve Tanı Kılavuzları**. bs.Ankara: Türkiye Sinir ve Ruhsağılığı Derneğı.

Öztürk, O. 2004. **Ruh Sağılığı ve Bozuklukları Cilt.11**.bs.İstanbul: Nobel Tıp Kitapevi.

Perdeci, Z., Murat Gülsün, Cemil Çelik, Murat Erdem, Barbaros Özdemir, Özdağı, Selim Kılıç, 2010. Aggression and The Event-Related Potentials in Antisocial Personality Disorder. **Bulletin of Clinical Psychopharmacology**. c.20. s.300-306.

Soderstrom, H. , 2003. Psychopathy as a Disorder of Empathy. **European Child & Adolescent Psychiatry**. c.12. s:249-252.

Topçu, Ç., Özgür Erdur-Baker, Yeşim Çapa-Aydın, 2010. Temel Empati Ölçeğı Türkçe Uyarlaması: Geçerlik ve Güvenirlik Çalışması. **Türk Psikolojik Danışmanlık ve Rehberlik Dergisi**. c.4. s:174-182.

Tutuk, A., Derya Al, Selma Doğan, 2002. Hemşirelik Öğrencilerinin İletişim Becerisi ve Empati Düzeylerinin Belirlenmesi. Cumhuriyet Üniversitesi, **Hemşirelik Yüksek Okulu Dergisi**. c.6. s:36-41.

Vaillant, G.E., 1976. Natural History of Psychological Health. **Archives of General Psychiatry**. c.33 s: 535-545.

Widiger A.T., Corbitt M.E. 1993. Antisocial Personality Disorder Proposals for DSM-IV. **Journal of Personality Disorders** c.7. s: 63-77.

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Mehmet Hasgül was born in Gaziantep 1989, attended to Akyol Primary School and graduated from Gaziantep High School.

In 2007, he started NEU- Psychology undergraduate education program. He first started at English preparation school and entered the department after. He completed his bachelor studies by submitting his group thesis on " TRNC The Prevalence Of Pathological Gambling In Girne ".

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