Graffiti – For Joy and Confirmation

Motivational aspects, triggering and inhibiting factors, and emotional satisfactions in graffiti:

The creative-interactive dimension of vandalism

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Anki Nordmarker

Doctoral Dissertation in Psychology Department of Psychology University of Gothenburg (2016-12-02)

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To Tobias, Patrik, and Filip Live every day like it is the most important day in your life, and make it a Masterpiece.

Doctoral Dissertation in Psychology, 2016

Abstract

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The purpose of the present dissertation is to achieve a deeper understanding about what motivates young people to commit vandalism in general and scrawl-graffiti in particular, and what this propensity provides in the form of satisfaction and/or further motivation. The present thesis consists of two experimental studies, one questionnaire study, and one interview study, of a total of 515 participants (287 male, 219 female, 9 missing gender). The experimental studies show that alcohol and frustration in combination increases the risk for vandalism to occur, and also the degree of vandalism, destructivity and aggression. The questionnaire study demonstrated that impulsiveness presents a significant personality trait related to vandalism in general, as well as to scrawl-graffiti, but whereas vandalism is predicted by impulsiveness, scrawl-graffiti is predicted by motor non-planning impulsiveness. Further, the interview study indicated that there are distinctions between vandalism, graffiti and scrawl, where vandalism is assessed as destructive behavior, often conducted in an affective and destructive mood, while graffiti is interactive and creative, conducted in a creative mood. Scrawl might be destructive or creative, depending on the context, how it expresses itself, and whether or not it is created in a vandalism mood or in a graffiti mood.

Additionally, The Equity Control Model of Vandalism (Baron & Fisher, 1984) was used as an explanatory model to understand the complexity of vandalism. The model was complemented with two new primary moderators; *Personality traits* and *Emotional state*, and a new dimension of vandalism; *the Creative-Interactive dimension of Vandalism*, and finally resulted in an extended Equity Control Model of Vandalism (e-ECM 2016).

Keywords: vandalism, scrawl, graffiti, personality traits, frustration, motivation, joy, flow, satisfaction, the extended Equity Control Model of Vandalism (e-ECM 2016)

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Populärvetenskaplig sammanfattning

Bakgrund

Vandalism är ett vanligt förekommande fenomen i dagens samhälle. Begreppet används för att belysa förstörelse av annans egendom och omfattar allt från nedskräpning till mordbrand. Forskning om vandalism har tidigare i huvudsak bedrivits inom sociologi och kriminologi – där man sökt utröna kontext. orsaker och konsekvenser. vandalismtypologier har utkristalliserats av vilka Cohens vandalismtypologi är den mest använda. Den belyser sex olika typer av vandalism: (a) förvärvande vandalism, (b) taktisk vandalism, (c) ideologisk vandalism, (d) hämndlysten vandalism, (e) lekfull vandalism, och (f) illvillig vandalism; var och en med sina speciella motivationsfaktorer, från lekfullhet till hämndlystnad och aggression. En generell teoretisk genomgång visar att vandalism motiveras av såväl negativa känslor (frustration, ilska, hämndlystnad och leda) som av nyfikenhet, lekfullhet och glädje. Faktorer som grupptryck, kreativitet, kommunikation och upplevd orättvisa bör också beaktas. Vandalism – eller skadegörelse – utförs till övervägande del (85–95 procent) av unga män, det når sin höjdpunkt i mitten av adolescensen och alkohol är en frekvent variabel i samband med skadegörelse.

En av de vanligast förekommande formerna av vandalism är klotter och/eller graffiti – mer precist TTP-graffiti (tags, throw-ups och pieces) – som introducerades i Europa under 1980-talets första hälft. Diskussioner förs huruvida klotter och graffiti är samma sak och om graffiti ska ses som vandalism eller konst. Förespråkarna och utövarna av graffiti menar att det är konst medan lagen säger att det är vandalism – så länge det är placerat på ett olovligt ställe. I fördjupade interviustudier med graffitiutövare framkommer en mer nyanserad bild, där man belyser att det estetiska värdet av målningen i viss mån blir avgörande för om den skall räknas som konst eller vandalism. Medan vandalism i allmänhet kan förklaras utifrån aggression, frustration, hämnd och nyfikenhet, har studier om graffiti visat att graffitiutövares drivkrafter är: (a) intresse för konst, (b) en längtan efter uppmärksamhet, respekt och status och (c) de positiva känslor som uppkommer i samband med aktiviteten. Graffitiutövarna själva beskriver målandet som en meningsfull aktivitet som genererar status, respekt, uppmärksamhet och tillhörighet. Man får använda sin förmåga, sin talang och utmana sig själv och andra. Aktiviteten i sig ger en fysisk kick och en adrenalinrush samt skänker känslor av stolthet och glädje.

Klotter/graffiti utförs till övervägande del (90–95 procent) av unga män i 12–20-årsåldern. Det når sin höjdpunkt vid 14–16 års ålder och efter 20 är det bara ett fåtal som fortsätter – och då ofta som lagliga graffitiutövare.

Föreliggande avhandling

Syftet med föreliggande avhandling var att få en djupare insikt i och förståelse för vad som motiverar unga personer att begå skadegörelse, med ett fördjupat fokus på deltagande i graffiti. En viktig uppgift under arbetets gång har varit att få klarhet i vad som räknas som graffiti respektive klotter, en annan har varit att få klarhet i om graffiti har samma bakomliggande drivkrafter som övrig skadegörelse.

Bakomliggande faktorer så som personlighetsdrag har studerats, liksom tankar, känslor och erfarenheter relaterade till klotter, graffiti och övrig skadegörelse. Könsperspektivet har belysts liksom alkoholens och frustrationens inverkan. Slutligen har resultaten belysts utifrån *The Equity Control Model of Vandalism* – ECM (Baron & Fisher, 1984) och en kompletterande modell presenteras; *The Extended Equity Control Model of Vandalism (e-ECM 2016)*.

Avhandlingen består av fyra av varandra oberoende men kompletterande studier: två experimentella studier där alkoholens och frustrationens inverkan på destruktivt, vandalistiskt beteende studerats, liksom kreativitet, förändringsbenägenhet, optimism och personliga egenskaper i relation till skadegörelse; en enkätstudie där deltagande i graffiti, klotter och annan skadegörelse studerats i relation till personlighetsfaktorer såsom impulsivitet, affektivitet, optimism och egenskattad emotionell intelligens; samt en intervjustudie där erfarenhet, tankar och känslor relaterade till graffiti, klotter och annan skadegörelse studerats, liksom likheter och skillnader mellan graffiti, klotter och skadegörelse.

Resultat

Resultaten från de två experimentella studierna visar på att alkohol i kombination med frustration ökar graden av skadegörelse, destruktivitet och aggressivitet, medan alkohol och frustration var för sig inte ger denna effekt. I den experimentella situationen uttrycker kvinnorna en högre grad av skadegörelse, destruktivitet och aggressivitet än män, vilket väcker en del frågor då det i samhället är en klar majoritet av män bland de som ertappas för skadegörelse.

I enkätstudien framkommer att impulsivitet är en stark personlighetsfaktor såväl vad det gäller skadegörelse i allmänhet (från

nedskräpning till mordbrand) som klotter-graffiti (från klotter på bilder och böcker, till klotter på möbler och väggar, till klotter och graffiti på väggar, tunnlar och tåg etc.), dock skiljer det sig i typen av impulsivitet, där non-planning impulsivity predicerar skadegörelse, medan klotter-graffiti prediceras av motor impulsivity. Männen rapporterar högre grad av skadegörelse än kvinnorna, medan kvinnorna rapporterar högre grad av klotter-graffiti än männen. Ett intressant resultat i sammanhanget är att medan 41 procent av kvinnorna anger att de deltagit i klotter-graffiti, anger bara 8 procent att de deltagit i skadegörelse. De motsvarande siffrorna för männen är 30 procent (klotter-graffiti) respektive 27 procent (skadegörelse). En möjlig förklaring är den bedömning av vad klotter, graffiti respektive vandalism är som deltagarna gjort, att den skiljer sig åt mellan könen och att kvinnorna därmed hamnar högre på klotter-graffiti än männen. En annan förklaring kan vara hur man bedömer klottret i relation till skadegörelse, hur destruktivt man anser att klottret är.

I intervjustudien framkommer distinktioner mellan begreppen graffiti, klotter och skadegörelse, där skadegörelse beskrivs som ett destruktivt beteende som resulterar i förstörelse av egendom medan graffiti beskrivs som konst, som något positivt man tillför i miljön – eller som en av deltagarna säger "man förstör ju inte en vägg genom att måla på den". Klotter kan vara både destruktivt och kreativt, både skadegörelse och konst, beroende på hur resultatet ser ut och i vilket sammanhang det är utfört.

I intervjuerna framkommer också olikheter i känslor relaterade till graffiti, klotter och annan skadegörelse. Känslor relaterade till graffiti beskrivs som kontrollerat, fokuserat, blandat med hög arousal, adrenalin rush, glädje, lycka och eufori (*graffiti mood*), medan känslor relaterade till "destruktiv" vandalism beskrivs som mer affektiva, aggressiva och impulsiva (*vandalism mood*). Klotter, som enligt de aktiva kan vara både kreativt och destruktivt, kan genomföras i ett *graffiti mood* och/eller i ett *vandalism mood*.

En annan intressant aspekt som framkommit, relaterat till graffiti, är det som de aktiva beskriver av tankar och känslor som är direkt relaterade till själva utövandet – före, under och efter graffiti-målandet – vilket i stora drag starkt liknar det som Csikszentmihalyi (1992) kallar *flow*, en känsla av att vara ett med universum, där Självet expanderar och den psykiska energin bidrar till ökad självkänsla.

I ljuset av Reiss motivationsteori (2004) motiveras graffitiutövarna åtminstone av 6 av 16 ordinarie motivationsfaktorer, nämligen makt, oberoende, status, social kontakt, idealism och acceptans, som när de tillgodoses ger tillfredställande djupgående känslor av effektivitet, frihet,

egen betydelse, glädje, engagemang och självförtroende. I ljuset av Deci och Ryans *Self-Determination Theory* (2000), motiveras graffitiutövarna av såväl internt som externt driven motivation, dvs. dels för att det känns intressant och givande (intern motivation) och ger tillfredsställelse av de psykologiska behoven kompetens, samhörighet och autonomi, dels för att det ger andra typer av belöningar i form av uppmärksamhet, bekräftelse och status (extern motivation).

De resultat som framkommit i de fyra studierna har, tillsammans med den teoretiska genomgången och tidigare forskning inom området, belysts utifrån *The Equity Control Model of Vandalism* – ECM (Baron & Fisher, 1984), en modell som belyser komplexiteten i vandalistiskt beteende, såväl vad gäller samverkande, som utlösande och hämmande faktorer, liksom olika dimensioner av vandalism. Vidare har analyserna utmynnat i en utökad ECM – *The Extended Equity Control Model of Vandalism* (e-ECM 2016). Förutom tillägg om källor till frustration, har *personlighetsfaktorer* och *känslotillstånd* tillkommit som primära moderatorer, liksom en ny dimension av vandalism; den *kreativa-interaktiv dimensionen*, som täcker in *klotter-graffiti* (från klotter på bilder och i böcker, till klotter på möbler, toalettväggar etc. vidare till TTP-graffiti [tags, throw-ups and pieces]).

Preface

This thesis is based on the following papers, which will be referred to in the text by their roman numerals:

- Norlander, T., Nordmarker, A., & Archer, T. (1998). Effects of alcohol and frustration on experimental graffiti. *Scandinavian Journal* of *Psychology*, 39, 201-207. doi:10.1111/1467-9450.00080
- II. Nordmarker, A., Norlander T., & Archer, T. (2000). The effects of alcohol intake and induced frustration upon art vandalism. *Social Behavior and Personality*, 28 (1), 15-28. doi:10.2224/sbp.2000.28.1.15
- III. Nordmarker, A., Hjärthag, F., Perrin-Wallqvist, R., & Archer. T. (2016). The roles of gender and personality factors in vandalism and scrawl-graffiti among Swedish adolescents. *PsyCh Journal* 5, 180-190. doi:10.1002/pchj.133
- IV. Nordmarker, A., Perrin-Wallqvist, R., & Archer, T. (manuscript). Graffiti in adolescence joy and confirmation. An interview study with young graffitists. *Submitted*

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1 Introduction

"It's a good feeling – like being an outlaw. Out there in the night with a couple of friends on your own. You're creating something wonderful and beautiful for others to enjoy. /-/ It's all about self-expression." (The Guardian, presented in Coffield, 1991, p. 67)

Vandalism represents a growing problem within contemporary society and spans a wide spectrum of behaviors, from littering to arson (Goldstein, 1996). Graffiti is a special form of vandalism and the concept springs from the Italian "graffito" meaning simply inscriptions or drawings (presented in Shannon, 2003). Graffiti in its original form has probably existed as long as human beings have communicated with each other, for example in cave paintings and the signs created by vagabonds. The modern TTP-graffiti culture (tags, throw-ups, and pieces) started in Philadelphia in the United States of America in the late 1960s and arrived in Europe in the early to mid-1980s.

Vandalism is often described as a destructive aggressive act, arising from negative, but even sometimes playful, emotions. Frustration and/or perceived inequity seem to be main factors in vandalistic destructive behavior and the goal is to achieve restoration of equity. According to Dollard and colleagues, "aggression is always a consequence of frustration" (Dollard, Miller, Doob, Mowrer & Sears, 1944/1998 p.1). They imply that aggression is produced invariably by frustration and that frustration generally leads to some form of aggression. Nevertheless, as civilized human beings, we learn early in life to suppress and restrain overtly aggressive behavior and to cope with frustration in different ways.

It seems reasonable to consider that a feeling of frustration may lead to some kind of aggressive and destructive act, toward a person or toward an object. But is vandalism always an effect of destruction or is it also a constructive solution to a frustrating situation?

In this theoretical introduction, vandalism in general and graffiti in particular will be discussed, as well as juvenile delinquency and antisocial behavior, all related to definitions, typologies, occurrence, and motivational factors. A psychosocial model of vandalism (ECM) is presented, as well as a brief presentation of human motivation based on a humanistic approach.

1.1 Vandalism – definitions and typologies

The concept "vandalism", commonly used to describe damage to property, springs from the Vandals – an ethnic, warlike and nomadic group that plundered Rome during the year 455AD. In an informal consensus, researchers have defined the concept in different ways such as: a) all forms of destruction of property, deliberate or not (Baughman, 1971), b) a conscious act intended to inflict physical damage that results in the loss of aesthetic or financial value of an object or property (Harrison, 1976), c) any destructive behavior from littering to arson (Ducey, 1978), d) "otherwise acceptable behavior in an inappropriate context" (Pitt & Zube, 1991, p. 1031) and e) a conscious act directed towards the destruction or damage of an object (or objects) belonging to another person or institution (Moser, 1992).

Different kinds of studies have been performed to study vandalism, its context, its causes and consequences, and different kinds of "vandalism typologies" have appeared. According to Goldstein (1996), the most frequently used typology in literature about vandalism is Cohen's vandalism typology (Cohen, 1973; 1984). It consists of six types of vandalism, each with its own causes and consequences. These are: 1) *Acquisitive vandalism* – to obtain property or money, like breaking a window to get what's inside. 2) *Tactical vandalism* – to reach other personal goals, like breaking a machine at work in order to get free time, or doing something illegal in order to get arrested. 3) *Ideological vandalism* – with political or social goals, like writing political slogans on a wall. 4) *Vindictive vandalism* – to gain revenge on an institution or a person. 5) *Play vandalism* – to get social confession through competition, like "who can break the most street lamps?" 6) *Malicious vandalism* – expressions of rage or frustration, like breaking public furniture or damage a car standing in the way, etc.

Other typologies mentioned by Goldstein (1996), quite similar to Cohen's, are Martin's typology (1959) consisting of three kinds of vandalism – predatory, vindictive and wanton vandalism; Thaw's typology (1976) also consisting of three kinds of vandalism – hostility-directed acts, acts of thoughtlessness and acts of carelessness; and finally Zeisel's typology (1977) consisting of four kinds of vandalism – namely malicious vandalism (see Cohen), misnamed vandalism – accidental breakage rather than destructive intent, non-malicious property damage – for example writing lines on the ground to define a football goal, and hidden maintenance damage – damage as a result of bad planning of materials or design.

In a study concerning art vandalism (Cordess & Turcan, 1993), two degrees of vandalism appeared: "minor vandalism" and "major vandalism". Minor vandalism, such as scratching and scribbling with pencils, pens or lipstick or other "trivial" damaging behaviors, represents 90 percent of all art vandalism. These acts are accomplished surreptitiously by adolescents or school children, and the perpetrators are rarely apprehended. Major vandalism, like the slashing, stabbing, and shooting of canvasses, the smashing of sculptures or vases, and arson, account for the remaining 10 percent of art vandalism. These acts tend to be performed in public by perpetrators who show little inclination to avoid apprehension. A majority of these perpetrators are prosecuted, and there is therefore more information available about these individuals and these acts (Cordess & Turcan, 1993).

1.2 Motivational aspects of vandalism

The typologies described above inform us more about the distinctions between different kinds of vandalism than they do about what motivates the individual to perform vandalism. In Cohen's typology (1984), the vandalistic act is motivated by feelings of curiosity or playfulness (play vandalism), social frustration (ideological vandalism), revenge (vindictive vandalism) and rage, frustration or aggression (malicious vandalism). Coffield (1991) implies that there are four central motivational bases for vandalistic behavior; *financial gain, peer-group pressure, pleasure* and *excitement*. These factors are confirmed by Wiesenthal (1990) who also mentions *boredom* and *developmental stage* as causes.

Weinmayr (1969), from an ecological viewpoint, suggests that the root of vandalism is in the environment, not in the vandalistic individual himself or herself: "The real vandals in our society are the designers, specifiers, and installers who provide the opportunity for so-called 'vandalism' to occur" (Weinmayr, 1969, p. 286). Weinmayr implies that destruction is expression of a need and it occurs because the environment evokes *Curiosity* or *Irresistible Temptation* to change an object, or because there is *No-Other-Way-To-Do-It* (for a deeper explanation see Weinmayr, 1969). Vandalism of *Over-Use, Conflict* and *Leverage* are other motivations that are evoked by the environment (Weinmayr, 1969). These motivations cover 90 percent of vandalistic behavior; they are dependent upon the environment and can therefore be prevented by design. The other 10 percent are malicious and unaccountable (Weinmayr, 1969).

Allen and Greenberger (1978) and furthermore Allen (1984) suggest that there is a close affinity between creative and destructive acts and that vandalistic behavior may be an aesthetic experience, quite enjoyable for the perpetrator; as Allen says: "breaking can be beautiful" (Allen, 1984, p. 80). The cause of damage could therefore be a longing for something enjoyable and exciting to happen. Allen divides the sequence into three steps; before, during and after the vandalistic behavior. The aesthetics experienced *before* the action consist of a desire to change an object's structure and design, the aesthetics experienced *during* the action are visual and consist of a fast structural transformation of the object by using a new, unexpected and complex method, and the aesthetics experienced *after* the vandalistic action is the new interesting pattern of the object. If an object looks interesting enough to destroy – or change – the probability of destruction increases (Allen & Greenberger, 1978).

Another common motive for vandalistic behavior concerns communication (Daun, 1982; Cordess & Turcan, 1993), such as the expression of oneself and one's feelings (Coffield, 1991), expression of opinions (Cohen, 1984; Wiesenthal, 1990), a need to be recognized and reach acknowledgement and status (Donnermeyer & Phillips, 1984; Johnson, 2001; Hollari, 2003; Halsey & Young, 2006), the desire for belonging to a group or a culture (Nilsson, 1984; Andrée Löfholm, 2002) and the fact that one *does* belong (Nilsson, 1984; Coffield, 1991; Johnson, 2001; Halsey & Young, 2006).

Another commonly used explanation for vandalism is that it is an expression of negative emotions such as boredom (Canter, 1984; Nilsson, 1984; Perrin-Wallqvist, Archer & Norlander, 2004), frustration, anger and aggression (Canter, 1984; Gustafson, 1991; Goldstein, 1996; Horowitz & Tobaly, 2003; Liu & Lin, 2007), and that vandalism is a result of aggressive behavior (Goldstein, 1996). Cordess & Turcan (1993) imply that destructive acts towards, for example, a painting of humans, might be a substitute for aggression against people. Baron and Fisher (1984), on the other hand, suggest that the underlying motive of most vandalism is perceived inequity and that the goal is equity restoration.

Despite other assumptions concerning vandalism, it has been indicated that alcohol is a frequent variable in vandalistic behavior (Nilsson, 1984; Korytnyk & Perkins, 1983; Goldstein, 1996). West, Drummond and Eames (1990) demonstrated that vandalism is strongly associated with alcohol consumption, and that the level of consumption, the reasons for drinking and the patterns of consumption are determining factors. Males, with heavier ethanol consumption, who drink to become light-headed or drunk, appear

more prone to damage property than females and other less damage-prone males (West, Drummond & Eames, 1990). An experimental study by Korytnyk and Perkins (1983) shows that men who had consumed alcohol perpetrated more graffiti compared with those men who had not drunk alcohol; this was interpreted as the tendency for alcohol to increase vandalism-related behavior. Gustafson (1991) stated that there is no experimental evidence that alcohol itself increases aggression. Alcohol increases our emotional state and decreases our perceptive ability (Gustafson, 1991), which implies that alcohol increases aggressive acts only if the individual is already angry or frustrated. Earlier experimental studies (Gustafson, 1985) showed that intoxicated subjects increased their aggression only when frustrated, and that higher levels of frustration yielded higher degrees of aggression. Frustration was defined as "keeping a person from the satisfaction that he expected" (Gustafson, 1985, p. 684).

1.3 Graffiti

One of the most common forms of vandalism in today's society is represented by scrawl or graffiti. Whereas vandalism in general accounts for about 12 percent of all reported crimes in Sweden (in 2011), about 40 percent of all reported vandalistic crime is related to scrawl/graffiti (Brå; Brottsförebyggande rådet [The Swedish National Council of Crime Prevention], 2012). Nevertheless, these statistics fail to show all the scrawl/graffiti incidents that are perpetrated; a majority of perpetrators will never get caught by law (Brå, 2009). A self-reported study among youths in the ninth year of primary school (mean age 15 years) in Sweden (Brå, 2013) showed that 18 percent of the boys and 17 percent of the girls had been involved in scrawl/graffiti (non-mural graffiti) during the previous 12 months, while 6 percent of the boys and less than 2 percent of the girls had been involved in TTP-graffiti (mural paintings).

There remains an ongoing discussion concerning whether or not graffiti ought to be seen as vandalism or art, and whether or not the terms "scrawl" and "graffiti" should be used synonymously.

It seems that the two concepts are applied relative to how one feels about the painting or description. If one thinks the painting is beautiful one calls it graffiti and art, and if one thinks it's ugly one calls it scrawl and vandalism (Hollari, 2005). Swedish law declares that graffiti and scrawl are vandalism when situated in an illegal place (Hollari, 2005). The National Council for Crime Prevention proposes that legal paintings be defined as

graffiti and illegal paintings as scrawl, i.e. vandalism (Hollari, 2005). Shannon (2003) declares that as long as the graffiti painting is situated on a surface without the permission of the "owner" of the surface, graffiti is illegal and therefore a form of vandalism, regardless of the aesthetic impact. Nevertheless, in the Swedish study by Brå (2013), the concepts of scrawl, graffiti and vandalism were studied as separate phenomena but also under the overarching concept of vandalism. While *scrawl* was defined as "nonmural graffiti", *painting graffiti* was defined as "mural graffiti" (TTP-graffiti; author's comment), and *vandalism* was defined as damaging lamps or windows, someone else's bicycle or other objects. The overarching concept "vandalism" includes all three of them but also *starting a fire* (Brå, 2013).

The modern graffiti-culture, namely TTP-graffiti (tags, throw-ups, pieces) started in Philadelphia, in the United States of America, in the late 1960s and arrived in Europe in the early to mid-1980s (Jacobson, 1996; Johnson, 2001; Shannon, 2003). A *tag* is a stylized signature, a pseudonym of the writer or his "crew", often hastily done and in multiples; a *throw-up* is a larger two-dimensioned picture of stylized letters; and a *piece* (an abbreviation for "masterpiece") is a large mural, usually a colorful picture, containing a letter-combination or cartoon figures, and signed with the writer's tag (Johnson, 2001; Shannon, 2003).

The main view taken among graffitists is that *graffiti is art* and not vandalism (Johnson, 2001; Andrée Löfholm, 2002; Hollari, 2003; Halsey & Young, 2006). Nevertheless, they admit that there are forms of TTP-graffiti that can be judged as vandalism. The real paintings such as "pieces" are definitely art, while "tags" can be judged as vandalism if the aesthetic impact is low (Andrée Löfholm, 2002; Halsey & Young, 2006). An interview study with graffitists as respondents (Halsey & Young, 2006) showed that there are three basic factors that differentiate art from vandalism; these are skill, intent and aesthetic impact. As one respondent says: "[Tagging], it's not really art // you don't have to be an artist to do a tag" (Halsey & Young, 2006, p. 284). Another respondent says: "If you can appreciate it, then I think ... it is art." (a. a., p. 285). Doing a piece is "using time productively", while tagging is "wasting time" (a. a.).

1.4 Motivational aspects of graffiti

Whereas vandalism in general has been studied for over half a century, the graffiti-culture is quite a recent phenomenon that has increased in frequency

during the last 15 to 20 years. Early research concerning the phenomenon was primarily from a criminological and sociological perspective, focusing on criminal behavior and the consequences for society (Goldstein, 1996). However, in the last 15 years, there has been some research about motivational aspects, and feelings involved, regarding participating in TTP-graffiti culture.

Interviews with graffitists (Johnson, 2001; Andrée Löfholm, 2002; Halsey & Young, 2006) point to three main topics as motivational factors: a) interest in art, b) a desire for attention and status, and c) positive emotions aroused by the activity. For the graffitist, scrawling and painting are extremely meaningful activities, generating status, respect, attention and belonging. This propensity relates also to talent, competition, being someone, being good at something, and being familiar with the language and the codes. Positive and powerful emotions arise through the creative process - through the planning stage, the accomplishment, and the satisfaction when creation is completed (Johnson, 2001; Andrée Löfholm, 2002; Halsey & Young, 2006). These authors focus upon the physical thrill, the adrenaline rush, pride and pleasure – powerful emotional and physical sensations that make it difficult to resign from graffiti – and not forgetting that illegality is an important contributing factor to these sensations. Halsey and Young (2006) advance a step further and suggest that graffiti is "an affective process that does things to writers' bodies [and the bodies of onlookers] /-/ where graffiti is often thought of as destructive, we would submit that it is affective as well" (a. a., pp. 276-277).

Another motivational factor to take into account in graffiti culture is the manner in which we consider our environment. Halsey and Young (2006) found an interesting aspect to the graffitist's view and reaction to "blank walls". They look at blank walls as a "negative area", a space not being used. They are viewed as dreary and should be "brought to life" by the graffitist. Graffitists look at the city as a place of multiple surfaces and interfaces, where the uni-colored spaces ought to be filled with colorful creations. It's not about destruction or aggression — it's about creativity and interaction.

Halsey and Young (2006) imply that there is something in the act that feels right to graffiti writers and that "It is this *'rightness'* that motivates most writers to continue in the activity, in the face of possible arrest, security dogs and possible injury" (a. a., p. 282).

1.5 The Vandal

Several studies have been carried out to ascertain characteristics associated with the vandal, and other factors aside, the vandal is considerably more likely to be male. About 85 to 95 percent of all vandalistic crimes are perpetrated by males (Herbert, 1990; Frith, 1996; Goldstein, 1996; Andershed & Andershed, 2008; Brå, 2012). Probably, there are many unreported vandalistic destructive acts that never reach the crime statistics. Nevertheless, male dominance in vandalistic crime cannot be disregarded.

According to Andershed and Andershed (2008), some of the gender differences may be explained by society's permissive attitude toward males' aggressive behavior, while females, on the other hand, become more inhibited in their aggressive behavior, and more reinforced in social acceptable behavior, which is seen as more suitable for females. (See more about gender differences related to antisocial behavior in the Juvenile delinquency and Antisocial behavior part of this thesis.)

Vandalism reaches its peak of frequency in middle adolescence (Wiesenthal, 1990; Goldstein, 1996; Shannon, 2003; Andershed & Andershed, 2008; Shulman, Steinberg & Piquero, 2013), with definite peak in ages 15 to 17 (Brå, 2012) and a significant decrease after the age of 19. In Sweden about 40 percent of all reported vandalism offences were related to youths aged between 15 and 20 (Brå, 2012).

A compilation made by Goldstein (1996) demonstrated that the young vandal was no more emotionally disturbed than others, but that they appeared to have a poor understanding of the impact their behavior had on others. While youngsters not prone to vandalism consider that public property belongs to everyone, the vandal thinks it belongs to no one (Goldstein, 1996). It is also stated that young vandals primarily commit vandalistic acts in small groups (Nilsson, 1984; Frith, 1996; Goldstein, 1996). Nilsson (1984) suggests that vandals are concerned about establishing their position in the peer group, for the group to demonstrate independence from norms and values, and that the motives are boredom or frustration about their social situation. Herbert (1990) implies that the young vandals show their developing independence by destructive behavior.

In late adolescence, from about age 16, alcohol is a frequent variable in vandalistic behavior (Nilsson, 1984; Goldstein, 1996). Goldstein (1996) indicates that academic and social stress may explain vandalistic behavior among students at the university level. Nilsson (1984) declares that these "older" vandals have social problems more often than others in the same

age, that they commit other law-breaking acts as well and that the reason for vandalistic behavior is often revenge.

1.6 The Graffitist

Studies have shown that the "typical" graffitist is represented by an adolescent/pre-adolescent boy or young man (Shannon, 2002; Hollari 2003; Hollari, 2005). In Sweden, about 94 percent of all those who are accused of involvement in scrawl or graffiti are male (Brå, 2012), and international interview studies conducted with graffitists are almost exclusively with male respondents (Johnson, 2001; Shannon, 2001; Andrée Löfholm, 2002; Halsey & Young, 2006). According to Shannon (2002), the whole graffiti culture is a "male culture" in its hierarchic structure, risk taking, competition and search for excitement. Attitudes among male graffitists are that female graffitists are less serious than males, but that there are exceptions from this "rule" by the graffitists' own admission (Shannon, 2002).

The absolute majority of graffitists are between 12 and 20 years of age; the behavior reaches its peak between 14 and 16 years of age and the majority stop painting graffiti in late adolescence (Shannon, 2002; Hollari, 2005). One quarter of graffiti writers are younger than 15 (Hollari, 2003), but the rest are between 15 and 20 years of age. Only a few of these continue after 20 years of age and, in those cases, mostly as legal writers (Shannon, 2002).

Studies in Sweden show that graffitists are a cross section of all youths in terms of social and economic background (Sundell, 2002). However, they experience school as less meaningful, feel more unfairly treated by teachers, and are less prone to talk to their parents about problems than non-graffitists (Sundell, 2002). They drink alcohol earlier in life, are more prone to use other types of drugs, and are more often involved in other types of delinquency than are other youths (Sundell, 2002). Identified risk factors related to scrawl and graffiti are: truancy, lack of parental supervision, antisocial peers, and perceived low self-control (Sundell & Plenty, 2014).

Most of the juveniles who were associated with graffiti culture remained within this subculture for a short time; about a couple of years in early adolescence (Shannon, 2003), and it is suggested that this might be just an ordinary step in development (Shannon, 2002). These short time graffitists can be defined in two groups: "high-level-graffitists" and "some-times-graffitists". Some of these desist from both graffiti and other types of

delinquent behavior after a short time, while others stop graffiti but continue to commit other types of crime (Shannon, 2003).

Among those who continue TTP-graffiti over a longer time, Shannon identified two clusters; "long-term graffiti specialists" - who write tags and pieces but focus on pieces, and "long-term delinquent graffitists" - who focus their graffiti activity on tagging and are more prone to other types of delinquency and also non-graffiti vandalism (Shannon, 2003). An interview study presented in the same thesis also identified two groups, based on the graffitist's approach; group 1 – those who avoid involvement in other forms of illegal activity, and who focus on their own artistic competence, the aesthetic aspects of graffiti and their own personal development, and group 2 – those who focus on the element of excitement, who report a substantial degree of participation in other types of criminal activity and describe their participation in other forms of non-graffiti vandalism as "providing important rewards of their own" (a. a., p. 157), but who are also prone to developing their competence as "piecers" (Shannon, 2003). Shannon suggests there is no easy dichotomy between graffitists as "prospective artists" and, on the other hand, a group of "vandals".

Even if graffitists are overrepresented in non-graffiti vandalism and other types of delinquency than are other youths, graffiti may not be the underlying cause for such deviant behavior. A more reasonable explanation may be that youths belonging to a risk category adopt the graffiti culture to get attention, acceptance, peers and status. Long-term participation in the culture might lead to reinforced isolation, deeper problems and further delinquency (Shannon, 2003). It has been stated that graffitists are more antisocial, both before and after they start painting, but as Sundell and Plenty (2014) declare, scrawl/graffiti does not cause antisocial behaviors; it is rather a marker for an antisocial progress. Halsey and Young (2006) have indicated the very important distinction between (a) crimes in order to write illegally and (b) other crimes committed by those who happen, at certain times, to write illegally.

Other interesting and noteworthy aspects of the graffitist's personality that are needed to reach goals in graffiti culture – such as attention, respect, status, getting the best painting in the best place, avoiding being caught by the law etc. – require characteristics that normally are highly esteemed in mainstream society, such as a drive for competition, hard work, energy, creativity and the ability to stay focused (Shannon, 2003). Halsey and Young (2006) imply that graffitists do use quite "rational" behavior to succeed in graffiti culture: forethought, planning, design, practice, patience, alertness and attention

Halsey and Young emphasize that "illicit writing cannot be adequately described in binary terms (good versus bad art, criminal versus legal activity, creative versus destructive images, etc.). Instead, graffiti needs to be considered in a both/and manner" (Halsey & Young, 2006, p. 279).

1.7 Antisocial Behavior and Juvenile Delinquency

Statistics indicate that juveniles between ages 15 to 20 are overrepresented in criminal behavior (Ahlberg, 2001; Andershed & Andershed, 2008; Brå, 2012; Shulman, Steinberg & Piquero, 2013), and there is a strong dominance by males (Ahlberg, 2001; Andershed & Andershed, 2008; Brå, 2012). In the year 2011, juveniles of age group 15 to 20 years accounted for 25 percent of all reported crimes in Sweden, whereas they only accounted for 9 percent of the whole population; and there is a significant peak in years 15 to 17 (Brå, 2012). For all reported crimes in Sweden, males account for about 80 percent; in terms of juveniles reported for vandalism during the year 2011, about 89 percent were male, and among those who had been involved in scrawl/graffiti about 93 to 95 percent were male (Brå, 2012). The most common crimes perpetrated by juveniles were theft, vandalism, shoplifting (Ahlberg, 2001; Brå, 2009), assault against other juveniles and traffic crimes (Brå, 2009).

In an anthology by Andershed and Andershed (2008), it emerges that, among grown-ups with recurring criminal behavior, about two out of three exhibited behavioral disorders in early childhood (before year 12 but often as early as three years of age). Since antisocial behavior includes a wide spectrum, from truancy from school, shoplifting, and scrawl, to physical aggression towards people and animals, and destruction of properties, it may be relevant to split antisocial behavior into subtypes like *aggressive* versus *non-aggressive* antisocial behavior, and *destructive* versus *non-destructive* antisocial behavior (Andershed & Andershed, 2008). See figure 1 below.

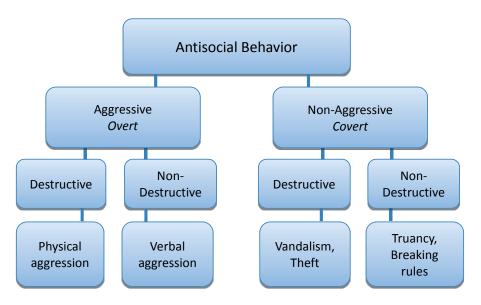


Figure 1. Antisocial behavior, divided into: *aggressive* versus *non-aggressive* dimension, respectively *destructive* versus *non-destructive* behavior (Andershed & Andershed, 2008).

It is also relevant to subdivide aggressive behavior into *reactive* versus *proactive* aggressive behavior, where reactive aggressive behavior is a response to a provocation while proactive aggressive behavior occurs in order to reach a goal.

It has been stated that antisocial behavior remains overwhelmingly commonplace among males/boys than among females/girls (Ahlberg, 2001; Andershed & Andershed, 2008; Brå, 2012), and is detected also in childhood, as early as in the second or third years of age. In year 11, about 10 percent of the boys and 3 percent of the girls show distinctly antisocial behavior. One notion offered is that boys in general, are more exposed to risk factors than girls, as well as showing more frequent and stronger antisocial behavior. Another explanation is society's permissive attitude to boys' extroverted and aggressive behavior, while girls become more inhibited in their aggressive behavior and more reinforced in socially acceptable behavior, which is seen as more suitable for females (Andershed & Andershed, 2008).

Identified risk factors associated with antisocial behavior include temperament, impulsiveness, arousal, aggressiveness, and extroversion (Luengo, Carrillo-de-la-Peña, Otero & Romero, 1994; Widom & Toch, 2000; Andershed & Andershed, 2008), as well as emotional disability, such

as lack of empathy, emotional indulgence, withdrawal, and deficient regulation (Andershed & Andershed, 2008). Nevertheless, some protective factors related to antisocial behavior are: intelligence, cognitive appraisal, problem-solving skills, self-esteem, optimism, non-impulsive temperament, and adequate emotional regulation (Widom & Toch, 2000; Andershed & Andershed, 2008). Widom and Toch (2000) imply that "offenders are made, not born /-/ they are products of their upbringing and of pressures, temptations, and learning experiences /-/" (a. a., pp. 3-14), and it is important to give prominence to the protective factors. In this regard, aggressive antisocial behavior, detected in early childhood and commonly related to impulsiveness, seems to be quite stable through childhood and adolescence, with a peak in years 15 to 17 (Andershed & Andershed, 2008).

Antisocial behaviors that correlate most strongly with impulsivity are *rule breaking* (i.e. infringement of age limits, minor delinquency), *aggression* and *vandalism*. *Theft* and *drug abuse* are the least impulsivity-dependent types (Luengo, Carrillo-de-la-Peña, Otero & Romero, 1994).

Alcohol presents a frequent variable in antisocial behavior (Korytnyk & Perkins, 1983; West, Drummond & Eames, 1990; Goldstein, 1996; Andershed & Andershed, 2008) and there is a strong correlation between higher levels of alcohol consumption, reasons and patterns of drinking that are related to antisocial behavior such as vandalism and physical assault (West, Drummond & Eames, 1990).

According to Matza and Sykes (1961), juvenile delinquency may be explained as two major types: (1) "as a product of personality disturbances or emotional conflict within the individual" (a. a., p. 712), or (2) "as a result of relatively normal personalities exposed to a "disturbed" social environment" (a. a., p. 712). Matza and Sykes (1961) declare that the delinquent knows what is right or wrong, and that their goal is not really to be apart from society. Instead, they "rethink" the rules, values and norms in a "Technique of Neutralization" which allows them to go beyond the norms without feeling guilty, ashamed or "wrong".

A Chinese study (Liu & Lin, 2007) taken among 1712 adolescents showed that frustration is an important variable in antisocial behavior. Antisocial behaviors measured were smoking, drinking, lying, cheating, fighting, stealing, breaking things and engaging in public graffiti. The frustration variable was divided into two broad types: (1) *overall strain* and (2) *specific strain*. In terms of *overall strain*: respondents were asked to what extent they felt frustrated when they thought of their school grades, going to college, their career, future finances, interpersonal relations, relationships with classmates, appearance/looks, and physical wellbeing. The *overall*

strain was then divided into three categories of specific strain: (1) strain over status achievement, (2) strain over interpersonal relations, and (3) strain over physical wellbeing. Other important variables included in the study were: self-control, deviant attitudes, association with deviant peers, perceived economic condition of the family, and father's or mother's education (Liu & Lin, 2007). The main results from the study, relevant to the present thesis, are: (1) overall strain is significantly associated with delinquency, i.e. higher levels of frustration in life correlate with greater participation in delinquency activities, (2) self-control is inversely associated with delinquency, (3) association with delinquent peers and deviant attitudes are positively associated with delinquency involvement, and (4) males are more likely to report delinquent participation. The observed gender differences that occurred indicated that boys' delinquent activities were more related to frustration over status achievement, while girls' delinquent activities were related to frustration over physical wellbeing (Liu & Lin, 2007).

1.8 The Equity Control Model of Vandalism

Fisher and Baron (1982) and Baron and Fisher (1984) have worked out a theoretical model to illustrate variables that cooperate and interact with one another in vandalistic behavior. The model is a social-psychological model, based on the assumptions that the underlying motives in most vandalistic acts are perceived inequity – a sense of injustice or unfair treatment – and that the goal of vandalism is equity restoration.

Baron and Fisher (1984) proceed from the model used in Cohen's vandalism typology but exclude *play vandalism* because "damage in such a context is an unintended by-product rather than an explicit goal of the action" (a. a., p. 64). The remaining types of vandalistic acts were divided into an instrumental-expressive dimension. The *instrumental dimension* includes more planned and "consequence-sensitive" acts, like acquisitive, ideological and tactical vandalism, and the *expressive dimension* includes more spontaneous, aggressive and violent actions, like malicious and vindictive vandalism.

Variables involved in the model

a) Inequity. Baron and Fisher (1984) propose that perceived inequity constitutes the underlying motive behind all forms of non-play vandalism. Inequity can be defined as "a perceived imbalance

- between one's own inputs and outcomes" (Baron & Fisher, 1984, p. 65) and it can arise from several sources. Theories of social psychology are adopted and presented in Fisher and Baron (1982); these assume that "(a) people aspire to maintain equity in their relations with others and society, (b) inequitable relations produce distress and anger, which (c) motivate individuals and/or groups to try to restore actual equity /-/ or achieve psychological equity /-/" (a. a., p. 186). According to the authors, the goal of vandalism is to achieve equity restoration, either *actual equity* through objective action-induced changes, or *psychological equity* through changes in one's own perceptions (Baron & Fisher, 1984).
- b) Control. Perceived control is the second step in the model and the primary moderator to cope with inequity (Fisher & Baron, 1982; Baron & Fisher, 1984). Control is defined as "the strength of a person's belief that he or she can effectively modify outcomes and arrangements" (Baron & Fisher, 1984, p. 65). The authors postulate that "Perceived control is determined by a number of factors: (1) actual opportunities for effecting control which are available within the system; (2) one's own abilities to use these, which depend on his or her verbal skills, social skills, power to influence others, etc.; (3) ability to identify the source of inequity; and (4) one's learned expectations for control in similar situations" (a. a., p. 66). In the model, control is divided into four levels: high, moderate, low and extremely low. The level of perceived control influences which type of vandalism (if any) will be the outcome. According to the authors, it is "important to separate the sources of frustration from how frustration will be coped with" (a. a., p. 65).
- c) Physical environment. The third step in the model concerns secondary moderators such as physical environment and group variables. Baron and Fisher (1984) adopt the view that environment itself can provoke or prevent vandalism, or at least exert an influence on what kind of vandalistic act will be the outcome. The authors predict that *run down* or damaged environments facilitate malicious vandalism, while attractive and *cared for* settings are more common targets for acquisitive vandalism. The symbolic value of the target is essential for especially vindictive and ideological vandalism; "the closer an environmental setting is in a symbolic sense to the agent which created the inequity, the more apt it may be to be chosen as a target" (Baron & Fisher, 1984, p. 68).

- d) Group variables. Together with physical environment, group variables are secondary moderators for vandalism and the third step in the model. Fisher and Baron (1982) discuss two types of groups – the target group and the vandal group. We start with the target group: it seems that a strong, cohesive neighborhood (target) group has a dampening effect on all types of vandalism. According to the authors, this may result from these groups developing stronger territorial behaviors, taking better care of their environment and cooperating in citizen surveillance. The vandal's risk of being caught is therefore high. The vandal group is, accordingly, an important moderator of vandalism. They suggest that "the presence of a group may contribute substantially to vandalism or exert a strong inhibiting force, depending on beliefs, characteristics and behavior of group members" (Fisher & Baron, 1982, p. 194). Facilitating factors of the peer group are, for example: reinforced arousal, groupthink, feelings of deindividuation and anonymity, diffusion of responsibility, group norms holding up destruction as normative behavior, and notions that antisocial behavior elevate status and that restraint is deviant. Nevertheless, peer group pressure may also be an inhibiting factor for vandalism. In cases where the group is a non-vandalistic group that disapproves of antisocial behavior, the probability that vandalistic acts will occur is quite small.
- e) Vandalism, socially acceptable behavior or helplessness. Step four in the model is the outcome the equity restoration of the perceived inequity, related to perceived control and secondary moderators such as architectural features and group variables. Depending foremost on the levels of perceived inequity and the level of perceived control, the outcome will differ from (1) equity restoration by socially acceptable means within the system, (2) acquisitive, ideological and tactical vandalism, (3) vindictive and malicious vandalism, and (4) helplessness (for a further explanation, see the figure below).

Baron and Fisher (1984) mention two dimensions of equity restoration: *actual equity restoration* — where the type of action (i.e. vandalism) is more objective, conscious, and instrumental in accordance to the source of perceived inequity, commonly related to a higher degree of control, giving the feeling of actual equity; and *psychological equity restoration* — where the type of action is more expressive and impulsive, the source of inequity harder to identify, the object more randomly chosen, and the feeling of equity is psychological, like changes in one's own perceptions.

f) Positive or negative societal reactions and terms of equity **restoration.** Step five in the model predicts the probability of the perpetrators' recurrent vandalistic behavior. Reactions from society. the potential for terms of equity and feelings of actual or illusory control lay the foundation for further social or antisocial behavior. According to this notion, all forms of vandalism are likely to continue as long as the sources of instigation (perceived inequity and lack of actual equity restoration) remain the same, and the environment is permissive to vandalism (i.e. it does not become risky to vandalize). If a perceived inequity evokes frustration and anger, and the vandalistic act is a venting of anger (catharsis), such as malicious vandalism, it might lead to an increased feeling of equity, a perceived efficacy, and a feeling of "illusory control". However, this equity restoration exerts only a short-time effect because the source of frustration has not been eliminated, and the societal reaction will probably be negative and therefore reinforces the sense of being misunderstood and treated unfairly. Conversely, if the vandalistic act is more in line with the source of inequity, such as ideological vandalism, there will be a greater possibility to re-establish actual equity, increase the degree of self-control, and obtain more positive reactions from society.

According to Baron and Fisher (1984), remediating strategies to reduce vandalism can be focused either on a barrier-support system (i.e. the society's attitude and decisiveness to vandalism) or upon the motives underlying vandalism, such as equity and control.

The equity control model of vandalism:

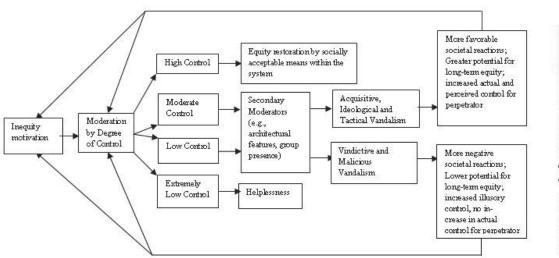


Figure 2. A flow diagram of the process implicated in an equity-based model. Note: the diagram should be read as a temporal flow of events, not as a causal model. (Baron & Fisher, 1984, p.71)

R.M.Baron and J.D. Fisher, the equity - control mode

1.9 Human motivation and satisfaction - a humanistic perspective

One of the most well-known humanistic theories of motivation is Maslow's Theory of Human Motivation (Maslow, 1970). From a humanistic perspective, individuals are essentially innately good and have an internal drive to develop and reach their true intellectual and emotional potential. although factors in the environment, the culture, or in the individuals' social context may be contributing causes or obstacles that prevent individuals from reaching their full potential. According to Maslow (1943; 1970), human motivation is based on a hierarchy of needs, where the lower needs in the hierarchy have to be satisfied on some level before the needs above will be actualized. The hierarchical structure starts with the most basic needs: physiological needs, such as food, water, oxygen, temperature, and rest; followed by safety needs, such as security, comfort, and freedom for fear; belonging and love needs, such as affectionate relations, to love and to be loved, and to belong to a group; and thereafter esteem needs, "a need or desire for a stable, firmly based, (usually) high evaluation of themselves, for self-respect, or self-esteem, and for the esteem of others" (Maslow, 1943, p. 382); and finally, the highest level, need for self-actualization, or "selffulfillment', the desire to reach one's full potential, to achieve what you can achieve. These needs will vary from person to person; they can be related to your profession, your parenting, or your performance in sports or creativity, for example. When you are maximizing your potential you might experience what Maslow (1970) termed "peak experience" - moments of feeling more whole, happy, and alive, like a part of the whole universe, at your full potential and self-sufficient. People who are more self-actualized have more peak experiences. This is what we all strive for when the lower needs are satisfied (Maslow, 1943; 1970).

Reiss' Sensitivity theory (2004) is a further development of Maslow's theory of human motivation, and consists of 16 basic desires that are universal for human beings: power, curiosity, independence, status, social contact, vengeance, honor, idealism, physical exercise, romance, family, order, eating, acceptance, tranquility, and saving. These desires, or strivings, are genetically distinct sources of motivation which seem to motivate all people as well as to occur automatically. When a desire is satisfied, a unique joy – an intrinsically valued feeling – occurs, such as joy of: efficacy, wonder, freedom, self-importance, fun, vindication, loyalty, compassion, vitality, lust, love, stability, self-confidence, relaxation, and ownership (Havercamp & Reiss, 2003; Reiss, 2004; Reiss & Wiltz, 2004; Reiss & Havercamp, 2005). For a presentation see table 1.

Table 1. A compilation of Reiss' Sensitivity theory of 16 basic desires that evoke motivation and give intrinsic feelings of joy (Havercamp & Reiss, 2003; Reiss, 2004; Reiss & Wiltz, 2004; Reiss & Havercamp, 2005).

Basic Needs Striving	Motivation Desire to/for:	Intrinsic feeling Joy of:
Power	Influence, lead, dominate	Efficacy
Curiosity	Knowledge	Wonder
Independence	Autonomy, self-reliance, individuation	Freedom
Status	Prestige, attention, respect, wealth	Self-importance
Social Contact	Companionship, interaction, play	Fun
Vengeance	Compete, winning, get even	Vindication
Honor	Obey a traditional moral code	Loyalty
Idealism	Improve society, altruism, justice	Compassion
Physic. exercise	Physical strength, exercise muscles	Vitality
Romance	Sex and courting	Lust
Family	Raise own children, time with family	Love
Order	Organize, rituals	Stability
Eating	Food	Satiation
Acceptance	Approval, be included	Self-confidence
Tranquility	Inner peace, prudence, safety	Relaxation
Saving	Collect	Ownership

Another perspective on human motivation is Self-determination theory (SDT; Deci & Ryan, 2000), which postulates that human motivation derives from three basic and innate psychological needs: *competence* – need for challenges and explorations, to be effective in dealing with one's environment; *relatedness* – need for belongingness, close relationships, and intimacy; and *autonomy* – need to be free to act in one's own interests and values, to control the course of your life. These needs are essential for psychological growth, integrity, and well-being (Deci & Ryan, 2000, 2011; Deci & Vansteenkiste, 2004). When the needs are satisfied, it affects the individual's well-being in a positive manner. When thwarted, however, the needs become unfulfilled, which might lead to negative feelings like frustration or resignation, and further, to the development of *need-substitutes* (Deci & Ryan, 2000, 2011), in extreme cases people may "engage in psychological withdrawal or antisocial activity as compensatory motives for unfulfilled needs" (Deci & Ryan, 2000, p. 229).

The basis for the theory's predictions about behavior, experience, and development is the dialectic between the active organism and the social environment (Deci & Vansteenkiste, 2004), and in the essence of the theory stands the distinction between intrinsic and extrinsic motivation (Deci & Ryan, 2000, 2011; Ryan & Deci, 2000). Intrinsic motivation is defined as "[the] doing of an activity for its inherent satisfactions rather than for some separable consequence" (Ryan & Deci, 2000, p. 56), by interest, challenges, and fun, rather than external goals. The goals are instead, personal development, meaningful relationship, and contribution to the community (Deci & Ryan, 2000). Positive feedback, need satisfaction, and need support (especially in childhood) reinforce intrinsic motivations as well as inner security within the individual (Deci & Ryan, 2011). Extrinsic motivation is, on the other hand, a "construct that pertains whenever an activity is done in order to attain some separable outcome" (Ryan & Deci, 2000, p. 60), to achieve external goals such as rewards, monetary benefits, status, or to avoid punishment (Kasser & Ryan, 1996). Extrinsic motivation can vary in degree of autonomy, depending on how internalized or integrated it has become within the individual (Deci & Ryan, 2000). Parental thwarting or rejecting of a child's psychological needs leads to an increased focus on external indicators of worth (need-substitutes), and reflects a sense of inner insecurity within the individual (Kasser & Ryan, 1996).

Theory of Flow

When discussing human motivation, self-actualization, experiences, intrinsic motivation, self-determination, and satisfaction related to social and antisocial behavior, Csikszentmihalyi's *Theory of Flow* has to be taken into account. According to the notions of Csikszentmihalyi (1992) and Nakamura and Csikszentmihalyi (2002), flow is an optimal experience that occurs in the tension between a perceived challenge and a person's existing skills. Flow represents a subjective experience and a balance between perceived action capacities and perceived action opportunities. When in flow, the individual operates at full capacity with intense concentration and optimal arousal (Nakamura & Csikszentmihalyi, 2002). Flow, as a process, occurs in the interaction between person and environment and is what Nakamura and Csikszentmihalyi (2002) call an autotelic activity, which means that the activity is performed for its own sake, without the incursion of other goals. Every activity can start as an exotelic activity mobilized by an external form, with specific goals, but can become an autotelic activity over time.

The *flow experience* may induce a feeling of possessing control, being free, and being "one" with a group, your art, or the universe. The Self expands and becomes more complex, and psychic energy is activated to enhance self-esteem (Csikszentmihalyi, 1992). Csikszentmihalyi (1992), people need meaningful activities that challenge their creativity and capacity to feel satisfied with their life and themselves. Modern society does not provide teenagers sufficient challenges in relation to their skills. Since *flow* occurs in the tension between challenge and skills, and skills improve when the activity is carried out, the opportunity for challenges must progress as well. What is termed "juvenile delinquency" (such as car theft, antisocial behavior, and vandalism) is motivated by a need for *flow experiences*, a need to cross the boundaries that grown-ups have set. Older teenagers might obtain the challenge by leaving home, moving to forming new relationships, and encountering new city. environments. Nevertheless, as Csikszentmihalyi (1992) says, the problem persists for younger teenagers between the ages of 12 and 17, because what meaningful challenges can an ordinary young teenager find in modern society?

There are many similarities between Maslow's peak experiences and Csikszentmihalyi's *flow*; they both include absorption, valuing, joy, spontaneity, a sense of power, and personal identity and involvement (Privette, 1983), but there are differences as well: while peak experiences are an actual outcome of an external occurrence, *flow* is an internal mental process, an intrinsically rewarding experience that may *or* may not precede a peak experience (Privette, 1983). There are also strong associations between *flow* and *intrinsic motivation* in Self-determination theory (Deci & Ryan, 2000), where behavior and activity are motivated by internal sources, done for its own sake, as an autotelic activity, in order to satisfy basic psychological needs such as competence, relatedness, and autonomy, which, when satisfied, leads to psychological growth, integrity, and well-being.

1.10 Rationale for the investigations

The purpose of the present studies was to achieve a deeper understanding about motivational factors of vandalism in general, and of graffiti in particular. The influences of alcohol and frustration were studied in a laboratory setting, while the relations between personality traits and involvement in "scrawl-graffiti" (from scrawl on pictures and books, via scrawl, tags and slogans on furniture and walls, and to TTP-graffiti) and

vandalism were studied among students in upper secondary school, and finally, emotions, thoughts and experiences related to graffiti, scrawl, and other types of vandalism, were studied by interviews with a phenomenological approach.

The aim of this dissertation is to ascertain what motivates young people to be involved in vandalism in general and in graffiti in particular; studying triggering and releasing factors, personality traits, emotions and thoughts involved, and moderating inhibiting factors. The gender perspective has been taken into account, as well as distinctions and similarities between the concepts, *graffiti*, *scrawl* and *vandalism*.

Finally, the complexity of interacting factors involved in vandalism will be discussed in the light of the Equity Control Model of Vandalism (Baron & Fisher, 1984) and an extended ECM-model will be presented.

Overview

Different kinds of studies have been carried out on vandalism, about its context, causes and consequences, and different kinds of "vandalism typologies" have appeared, where Cohen's typology (1973) seems to be the most frequently used in literature and research about vandalism (Goldstein, 1996). Vandalism occurs in different situations and settings, with different kinds of motivations, but a central behavior is aggression toward property.

Graffiti – or more precise TTP-graffiti (tags, throw-ups, and pieces) – is a relatively young phenomenon which entered the European stage during the mid -80s. Graffiti is more than paintings and scrawl; it represents a whole culture, involving many discussions concerning whether it is an art form or vandalism. While the dictates of the law have judged it as vandalism when it is performed on illegal and forbidden surfaces, the graffitists themselves claim that it is an art form.

Theories show that antisocial behavior in general, and vandalism and graffiti in particular, is perpetrated by young people aged 12 to 20, and that alcohol is a frequent variable in vandalistic behavior from about the age of 16. The majority of perpetrators are of male gender. Personality traits, such as impulsivity, extroversion and intensive temperament, increase the risk for aggressive and destructive acts, while emotions (positive or negative), artistic interest and skills, creativity, peer group pressure, social norms and physical environment are factors that influence type of expression, as well as the target.

Studies I and II - Vandalism in a laboratory setting; alcohol and frustration.

Due to the particular character of this behavior, there are some issues with studying a phenomenon like vandalism in a laboratory setting. There are several different kinds of vandalism and they often occur in settings or situations that defy modeling in a laboratory setting. Nevertheless, there are certain advantages to laboratory modeling, such as the opportunity to reduce and control the impacts of confounding variables such as group pressure, environment and other situational factors.

For these two studies, vandalism was defined as *art vandalism* according to Cordess & Turcan (1993), who defined two grades of art vandalism: "minor vandalism" and "major vandalism". Minor vandalism, like scratching and scribbling with pencils, pens or lipstick, or other "trivial" damaging behavior represents 90 percent of all art vandalism; in these present studies operationalized with the AET-test. Major vandalism, like slashing, stabbing and shooting of canvasses, smashing of sculptures or vases, and arson represents 10 percent of all art vandalism; in these studies operationalized with the Tearing-test. The AET-test measures also the extent of *experimental graffiti* (minor art vandalism), and the degree of destruction, aggression and sexuality in the experimental graffiti outcome.

The level of alcohol intoxication was controlled, as were the patterns of drinking. Frustration was induced by the modified version of the Cheap Necklace Problem. The problem was unsolvable, and the intention was to evoke frustration defined as "keeping a person from the satisfaction that he expected" (Gustafson, 1985, p. 684). The 142 participants were students at university level (mean age 24).

Other variables measured were: dispositional optimism (LOT), creative attitude and rational, critical attitude (BPE), attitude toward change and stability (FS), creative ability/elaboration (Elaboration), and background variables such as age, gender, alcohol consumption, living situation etc.

Study III – Scrawl-graffiti and vandalism, among Swedish adolescents; a questionnaire study.

A self-reported questionnaire study, among 360 Swedish adolescents (mean age 17), investigated the relations between personality traits such as impulsiveness (BIS-11), affectivity (PANAS), emotional ability/disability (TMMS), and dispositional optimism (LOT), and involvement in scrawl-graffiti (from scrawl on pictures and books, via scrawl, tags and slogans on furniture and walls, and to TTP-graffiti) and vandalism.

Study IV - Scrawl-graffiti and vandalism from the practitioners' perspective; an interview study.

Applying a phenomenological perspective, 13 adolescents/young adults (aged 16 to 26), all familiar with scrawl-graffiti and vandalism, were interviewed about thoughts, feelings, and experiences related to graffiti, scrawl and other types of vandalism.

2 The present investigation

In the following four papers, a total of 515 participants (287 male, 219 female, 9 missing gender) participated in two experimental studies, one questionnaire study, and one interview study. **Study I** consists of 42 participants (21 male, 21 female), divided into three experimental conditions: (a) control, (b) alcohol, and (c) alcohol-frustration, with 7 males and 7 females in each group. **Study II** consists of 100 participants (50 male, 50 female), divided into five experimental conditions (a) control, (b) alcohol, (c) alcohol-frustration, (d) frustration, and (e) placebo group, with 10 males and 10 females in each group. **Study III** consists of 360 participants (205 male, 146 female, 9 missing gender) in upper secondary school, answering a questionnaire about involvement in scrawl-graffiti, other types of vandalism, and the tests BIS-11, TMMS, PANAS and LOT. **Study IV** is an interview study, consisting of 13 participants (11 male, 2 female) interviewed about their feelings, thoughts and experiences related to graffiti, scrawl and other types of vandalism.

2.1 Study I: Effects of alcohol and frustration on experimental graffiti

Aim

The study was designed to investigate effects of alcohol and frustration on vandalistic behavior, here operationalized as *experimental graffiti*. Other variables such as gender, level of destruction, aggression, sexuality and creativity were also examined.

Design

The 42 participants (21 men and 21 women) were randomly assigned in equal numbers (seven men and seven women) to each of the three experimental groups, namely a Control (Group 1) group, an Alcohol (Group 2) group, and an Alcohol-Frustration (Group 3) group.

Each participant received a beverage containing (a) in the *Control group*, 5.0 ml tonic water (Schweppes) per kg body weight, (b) in the *Alcohol group* and in the *Alcohol-Frustration group*, 1.0 ml of 100 percent alcohol per kg body weight given in the form colorless *commercial* Swedish vodka (Absolut Vodka, containing 40 percent by volume), mixed with an equal volume of tonic water. Each participant was allowed to drink for a 20-minute period and was then made to wait for an additional 15 minutes. If the participant belonged to Group 3 (Alcohol-Frustration), he/she carried out the

Cheap Necklace Problem during this period of time. The other groups (Groups 1 and 2) were allowed to read newspapers.

The independent variables are group (control, alcohol, and alcohol-frustration) and gender (men, women). Dependent variables are (1) AET – measuring *minor vandalism*, and extent of *experimental graffiti, destruction*, *aggression* and *sexuality*, (2) The Tearing test – measuring *major vandalism*, (3) LOT – measuring *dispositional optimism*, and (4) Elaboration – measuring *creativity* regarding the elaboration of an unfinished figure.

Instruments

- a) Background data a questionnaire covering general background information such as: age, gender, alcohol consumption, living situation, conditions experienced while growing up, involvement in acts of vandalism, number of siblings, interests, parental profession etc.
- b) FS Change and Stability (Holmquist, 1986), consists of 20 items and measures attitudes toward creativity according to change and stability.
- c) BPE Self-estimation of personality traits (Ekvall & Holmquist, 1986), a personality inventory measuring both the creative attitude and a rational, critical attitude. The test consists of 40 adjectives describing personal traits and the participant chooses ten that best characterize him/her.
- d) The Cheap Necklace Problem a modified unsolvable version, used as manipulation to evoke frustration in the Alcohol-Frustration group (Group 3). The intent was to evoke frustration defined as "keeping a person from the satisfaction that he expected" (Gustafson, 1985, p. 684). The test (Silveira, 1971; Best, 1995) was originally constructed to provide a test of creative problem solving ability. The links in the chains may be opened and shut. From 4 small chains with 3 links in each chain, the subject is required, by opening and closing the links, to construct one circle of chains which costs no more than 15 crowns (SEK). Opening a link costs 2 crowns (SEK) and closing a link costs 3 crowns (SEK). For this experiment, the participants were assigned the task of constructing the circle of chains at a total cost of 14 crowns (SEK) during a 35minute test interval. At the same time, the participants were informed, "this is really quite a simple task that most normal individuals can complete within 15 minutes".

- e) AET Adam-and-Eve-Test was constructed for the purposes of this experiment. The test is a color illustration depicting "Adam and Eve" in the "Garden of Paradise" (Lukas Cranach 1472-1553, Adam and Eve) and the participants were given the instruction to "do what you want with the picture" for seven minutes. For this purpose they were given two black pencils (one thin, one thicker). The picture was chosen because of its depiction of religious or political themes, naked portraits as well as images of the ideal unattainable women that are especially targeted for vandalism (Cordess & Turcan, 1993) and are intended to measure what Cordess & Turcan (1993) call "minor vandalism". The results were examined and judged by two panels, from different viewpoints. Panel A judged the extent of scrawl-graffiti (on a scale of 0-10) and Panel B judged the degree of destruction, aggression and sexuality (on a scale of 0-10).
- f) The Tearing test was constructed for the purposes of this experiment and consists of a color illustration depicting the struggle between Samson and the Lion (P.P. Rubens 1577-1649, Samson and the Lion). It was chosen because of its strongly aggressive character that was intended to provoke the participants to exhibit expressions of aggression. The participants were instructed to "tear the picture apart and put the pieces in the envelope" (the envelope was half the size of the picture), no time limit was used and the number of pieces produced was monitored as a dependent variable. The test is considered an opportunity that offers a situation comparable to what Cordess and Turcan (1993) describe as "major vandalism".
- g) Elaboration (Modeus, Ståhlbröst, Wester & Ögren, 1987) consists of nine squares containing incomplete pictures and the participant's task is to complete the picture in each of the nine squares within 15 minutes. A panel (Panel A) then assesses each square on a scale of 0-5, in terms of the amount of detail in each of the responses (elaboration).
- h) LOT Life Orientation Test (Scheier & Carver, 1985) consists of eight items, plus four filler items. The test measures dispositional optimism defined in terms of generalized outcome expectancies.

Procedure

When each participant arrived at the laboratory, he or she was weighed and required to provide a breath sample (LION SD 2) for breath alcohol analysis (BAL 1). Then a questionnaire concerning background information and the tests FS and BPE were distributed to the participant for completion.

Afterwards, he/she received the appropriate drink, alcoholic or nonalcoholic, and was allowed to drink it over a 20-minute period. He/she was then made to wait for an additional 15 minutes.

If the participant belonged to Group 3 (Alcohol-Frustration), he/she was allowed to consume the drink and the subsequent "waiting-period" (20 + 15 = 35 min) was spent in carrying out the Cheap Necklace Problem. The other two groups (Group 1 and Group 2) were allowed to read some newspapers that were accessible.

Following this, a second breath analysis sample was secured (BAL 2), and the AET, Tearing, Elaboration and LOT tests were administrated in a common randomized order to all participants. After the test session, a final breath sample was collected (BAL 3), followed by debriefing. The whole session took about 90 minutes.

Statistics

The nonparametric Kruskal-Wallis test (p<0.05), the parametric two-way ANOVA (p<0.05) and the one-sample t-test were applied for analysis against the background variables and the personality inventories FS and BPE. Inter-judge reliability for each pair of judges in each of the panels was assessed through application of correlation statistics (Pearson's r, p<0.01).

A Pillais MANOVA (3*2 factor design) was used for comprehensive analysis of the independent variables' effects on the dependent variables. After the overall analysis, each dependent variable was analyzed by univariate F-test (p<0.05), followed by post-hoc analysis by Scheffé's test (p<0.05).

Results

The main results of this study show that: (a) alcohol in combination with frustration significantly increases the degree of *scrawl-graffiti* (minor vandalism) in a laboratory setting. Alcohol itself did not produce a significant difference compared with either control conditioning or alcohol-frustration conditioning. (b) The degree of *sexuality* was significantly higher in alcohol-frustration conditioning compared with alcohol conditioning, but not so when compared with control conditioning. (c) Women tended to score higher on *destruction* when compared with men, but there were no

differences between conditions. (d) Men tended to score higher on destruction under the influence of alcohol-frustration when compared with only alcohol. (e) Women scored significantly higher on scrawl-graffiti (minor vandalism) compared with men in all three conditions, and increased the scrawl under the influence of alcohol-frustration; so did the men. Alcohol itself did not have this effect. (f) Women scored significantly higher on elaboration compared with men, but there were no differences between conditions. (g) There were significant correlations in all three conditions between scrawl-graffiti and destruction, between scrawl-graffiti and aggression, and between scrawl-graffiti and sexuality. (h) There were no significant correlations between scrawl-graffiti and elaboration, and (i) there were no significant differences between groups or between sexes in terms of aggression or tearing (major vandalism).

2.2 Study II: The effects of alcohol intake and induced frustration upon art vandalism

Aim

This study was an extension of *study I* which included 42 participants (21 male/21 female) divided into three conditions (control, alcohol, and alcohol-frustration), and which was aimed at investigating effects of alcohol and frustration on vandalistic behavior, operationalized as *experimental graffiti*. Other variables such as gender, level of destruction, aggression, sexuality and creativity were also examined.

The purpose of this study, **Study II**, is to examine the consistency of the main findings in study I, by (1) extending the conditions with (a) a *placebo condition* and (b) a *pure frustration condition* (without alcohol), and (2) by increasing the participants to 100 (50 male/50 female), divided into the five conditions (control, alcohol, alcohol-frustration, frustration, placebo).

Design

100 participants (50 men, 50 women) were randomly assigned in equal numbers (ten men and ten women) to each of the five experimental groups, namely Control (Group 1) group, Alcohol (Group 2) group, Alcohol-Frustration (Group 3) group, Frustration (Group 4) group and Placebo group (Group 5).

Each participant received a beverage containing: in the *Control group* and in the *Frustration group*, 5.0 ml tonic water (Schweppes) per kg body

weight; in the *Alcohol group* and in the *Alcohol + Frustration group*, 1.0 ml of 100 percent alcohol per kg body weight given in the form of colorless commercial Swedish vodka (Absolut Vodka, containing 40 percent by volume) mixed with an equal volume of tonic water, in the *Placebo group*, 5.0 ml tonic per kg body weight plus 25 ml vodka essence (Simpson), with a few drops of vodka smeared on the inside of the glass to provide the taste and smell of alcohol. Each participant was allowed to drink during a 20-minute period and then made to wait for an additional 15 minutes.

If the participant belonged to Group 3 (Alcohol-Frustration) or Group 4 (Frustration) he/she was allowed to consume his/her drink and in the subsequent "waiting-period" (20 + 15 = 35 min) was asked to carry out the *Cheap Necklace Problem*. The other groups (Group 1, Group 2 and Group 5) were allowed to read newspapers during this period of time.

The independent variables are group (control, alcohol, alcohol-frustration, frustration and placebo) and gender (men, women). Dependent variables are (1) AET – measuring *minor vandalism*, and extent of *scrawl-graffiti*, *destruction*, *aggression* and *sexuality*, (2) The Tearing test – measuring *major vandalism*, (3) LOT – measuring *dispositional optimism*, and (4) Elaboration – measuring *creativity* in terms of elaboration of an unfinished figure.

Instruments

See study I.

Procedure

When each participant arrived at the laboratory, he or she was weighed and required to provide a breath sample (LION SD 2) for breath alcohol analysis (BAL 1). Then a questionnaire concerning background information and the tests FS and BPE were distributed to the participant for completion.

Afterwards, he/she received the appropriate drink, alcoholic or nonalcoholic, and was allowed to drink it over a 20-minute period and then was made to wait for an additional 15 minutes. If the participant belonged to Group 3 (Alcohol-Frustration) or Group 4 (Frustration) he/she was allowed to consume the drink and during the subsequent "waiting-period" (20 + 15 = 35 min) was asked to carry out the Cheap Necklace Problem. The other three groups (Group 1, Group 2 and Group 5) were allowed to read some newspapers that were accessible.

Following this, a second breath analysis sample was secured (BAL 2), and the AET, Tearing, Elaboration and LOT tests were administered in a common randomized order to all participants. After the test session, a final

breath sample was collected (BAL 3), followed by debriefing. The whole session took about 90 minutes.

Statistics

The nonparametric Kruskal-Wallis test (p<0.05), the parametric two-way ANOVA (p<0.05) and the one-sample t-test were applied for analysis of the background variables and the personality inventories FS and BPE. Inter-judge reliability for each pair of judges in each of the panels was assessed through application of correlation statistics (Pearson's r, p<0.01).

A Pillais MANOVA (5*2 factor design) was used for a comprehensive analysis of the independent variables' effects on the dependent variables. After the overall analysis, each dependent variable was analyzed by univariate F-test (p<0.05), followed by post-hoc analysis by Scheffé's test (p<0.05).

Results

The main results of this study show that: (a) the degree of *scrawl-graffiti* (minor vandalism) was significantly higher for alcohol-frustration conditioning, compared with control, alcohol, and pure frustration conditioning, but not compared with placebo. (b) Women scored higher on *scrawl-graffiti*, *destruction*, *aggression*, and *elaboration* compared with men in all five conditions. (c) There were significant correlations in all five conditions between *scrawl-graffiti* and *destruction*, between *scrawl-graffiti* and *aggression*, and between *scrawl-graffiti* and *sexuality*. (d) There were no significant correlations between *scrawl-graffiti* and *elaboration*, and (e) there were no significant differences between groups or between sexes in terms of *sexuality*, *dispositional optimism* or *tearing* (major vandalism).

2.3 Study III: The roles of gender and personality factors in vandalism and scrawl-graffiti among Swedish adolescents.

Aim

The aim of the third study was to explore whether or not risk factors (impulsivity, affectivity and emotional disability) and protective factors (optimism and emotional ability), respectively, known to be linked to vandalism, are related also to scrawl-graffiti. Another aim was to explore the status of gender factor related to both vandalism and scrawl-graffiti.

Design

A questionnaire was constructed and delivered to five upper secondary schools in five small towns (less than 50,000 citizens) in Sweden. 360 participants (205 male, 146 female, 9 missing gender) answered the questionnaire. They were divided into three grouping variables: *gender* (205 male, 146 female, 9 missing gender), *vandalism* (70 involved, 290 not involved, and *scrawl-graffiti* (126 involved, 234 not involved).

Instruments

- a) *Background data* a questionnaire covering general background information such as: age, gender, program at upper secondary school, and upbringing conditions related to parents.
- b) *Scrawl-graffiti* the participants were asked if they had, during the last five years, on illegal surfaces, scrawled, signed slogans or other texts, or painted graffiti, and if they had, to what extent. The answers resulted in a dichotomous variable: Involved or Not Involved in Scrawl-graffiti.
- c) *Vandalism* the participants were asked whether or not they had, during the last five years, deliberately destroyed someone else's property. The answers resulted in a dichotomous variable: Involved or Not Involved in Vandalism.
- d) BIS-11 Barratt Impulsiveness Scale is, in its original (Patton, Stanford & Barratt, 1995), a 30-item self-reported questionnaire measuring impulsivity on a structure of personality and behavioral traits. The test yields a total score ranging from 30 to 120, with higher values representing a higher degree of impulsivity. It also contains six primary factors, and three secondary factors, which are recommended by the International Society for Research on Impulsivity (www.impulsivity.org) to take into account when using the test. The secondary factors are: (a) Attentional Impulsiveness (8 items), (b) Motor Impulsiveness (11 items), and (c) Non-Planning Impulsiveness (11 items). The Swedish version of BIS-11 (translated and modified) consists of 25 items. 2 items (I change residences; I can only think at one thing at the time), are excluded from Motor Impulsiveness and 3 items (I like to think about complex problems; I am more interested in the present than the future; I like puzzles) are excluded from Non-Planning Impulsiveness (Li & Chen, 2007; Palomo, Beninger,

- Kortrzewa & Archer, 2008; Adriansson, Ancok, Ramdhani & Archer, 2013).
- e) TMMS Trait Meta-Mood Scale (Salovey, Mayer, Goldman, Turvey & Palfai, 1995) measure perceived emotional intelligence (PEI): the ability to pay attention to, understand and manage your own feelings and emotional moods. As recommended by Salovey et al. (1995), the shorter version (30 items) of the TMMS was used in this study. The test consists of three subscales: (a) Attention (13 items), (b) Clarity (11 items), and (c) Repair (6 items). The instrument was translated to Swedish in 1999, by Nordmarker and colleagues at Karlstad University, by permission from Peter Salovey and John Mayer.
- f) PANAS Positive Affect and Negative Affect Schedule (Varg, 1997; Watson, Clark & Tellegan, 1988) estimates the degree of positive and negative affectivity. It consists of 20 adjectives describing feelings and emotional states, where 10 items measure positive affectivity and 10 items measure negative affectivity.
- g) LOT Life Orientation Test (Scheier & Carver, 1985) consists of 8 items, plus 4 filler items. The test measures dispositional optimism defined in terms of generalized outcome expectancies.

Results

Among the 360 participants, about 19 percent (70 persons) have been involved in vandalism in different degrees; of those, 80 percent were males and 17 percent were females (3 percent missing gender). About 35 percent (126 persons) had been involved in scrawl-graffiti to some extent (from scrawl on pictures and books, via scrawl, tags and slogans on furniture and walls, and to TTP-graffiti); of those 49 percent were males and 48 percent were females (3 percent missing gender).

The main results of the study show that: (a) there were significant gender differences related to both vandalism and scrawl-graffiti, whereby males were significantly more involved in vandalism than females, while females were significantly more involved in scrawl-graffiti than males, (b) personality factors associated with scrawl-graffiti are similar to those associated with vandalism, namely attentional-, motor- and non-planning impulsiveness, (c) vandalism is predicted by non-planning impulsiveness, while scrawl-graffiti is predicted by motor impulsiveness. Finally, (d) positive and negative affectivity are not correlated with vandalism or scrawl-

graffiti, and (e) emotional intelligence and optimism seem not to have any protective effect in this issue.

2.4 Study IV: Graffiti in adolescence – joy and confirmation: An interview study among young graffitists.

Aim

The aim of the fourth study was to explore the intrapersonal and psychological aspects of involvement in graffiti, in order to find motivational factors, by asking what the graffitists think and feel before, during and after the graffiti performance. Furthermore, what do they think and feel about their and others' involvement in graffiti, scrawl and other types of vandalism.

Design

Since the aim was to obtain descriptions of thoughts and emotions related to graffiti, a phenomenological approach, using Interpretative phenomenological analysis (IPA) was chosen. Thirteen young persons (11 males, 2 females), familiar with graffiti, were interviewed. The ages of participants varied from 16 to 26 (where 9 respondents were between 16 and 18 years of age, and 4 respondents were between 20 and 26).

Procedure

Data were collected through semi-structured interviews, consisting of five themes: (a) background data, (b) experiences of vandalism, graffiti and scrawl, (c) feelings related to vandalism, graffiti and scrawl, (d) thoughts related to vandalism, graffiti and scrawl, and (e) what would make you or others stop committing graffiti. The themes were not fixed in a specific order under the interview. New issues could be raised by the respondent, and the respondents' answers guided the interviewer's in-depth questions, and contributed to the structure and meaning of the specific interviews.

The interviews were carried out in neutral places, and took between 19 and 40 minutes to conduct.

Results

The interviews with these graffitists show that there are distinctions between graffiti, scrawl and vandalism. While vandalism is considered as a destructive behavior resulting in destruction of property, graffiti is considered as art and not a destructive behavior. Scrawl may be art if it is

artistically fulfilled, but can also be seen as vandalism, depending on how it looks and in which context it was created.

There seem to be emotional differences to graffiti, scrawl and vandalism. The emotional mood related to graffiti is described as controlled and focused, mixed with high arousal, e.g. 'adrenaline rush', happiness, and euphoria. Scrawl, on the other hand, may be created in a controlled mood (like graffiti), or in an affective mood (e.g. aggression, impulsiveness, revenge). Other types of vandalism, described as destructivity, are committed in an affective mood where alcohol might be a contributing factor.

Involvement in graffiti culture and graffiti performance seems to meet many of the practitioners' needs, such as status, power, independence, social contact, and acceptance. Furthermore, the graffitists' descriptions of their emotions and experiences related to the graffiti performance (TTP-graffiti) are similar to the experience of *flow*.

2.5 The progress of questions and results

These four studies emerged from the general question: 'what makes young people commit vandalism?', followed by questions related to motivational aspects of graffiti.

The first study was designed to answer the question to what extent alcohol and frustration affects the degree of vandalism, in "ordinary" young people. The results showed that: alcohol in combination with frustration increases vandalistic behavior; alcohol without frustration does not have this effect; and that females act in a more vandalistic and destructive manner than males, in the laboratory setting. In study II, the experimental design was extended with two new grouping variables – *frustration* (without alcohol) and *placebo* – and with increased number of participants in each group. The results from study II amplify the results from study I, namely that alcohol in combination with frustration increases the degree of vandalism; alcohol and/or frustration alone do not have this effect. The results also confirm that females act more destructively and are more vandalistic than males in the laboratory setting.

Since scrawl and/or graffiti are among the most frequent types of vandalism, especially among adolescents, the aim of the following studies was to find out more about motivational aspects of scrawl-graffiti. In study III, adolescents were asked if they had been involved in scrawl-graffiti and/or other types of vandalism, and they also answered tests measuring

psychological traits. The results show that *scrawl-graffiti* (from scrawl on pictures and books, via scrawl, tags and slogans on furniture and walls, and to TTP-graffiti), is predicted by motor impulsiveness, while vandalism is predicted by non-planning impulsiveness, and that females are more involved in scrawl-graffiti, while males are more involved in vandalism. In study IV, participants who had been involved in graffiti, scrawl and other types of vandalism were interviewed about thoughts, feelings, and experiences related to graffiti, scrawl and vandalism activity. They were also asked about the concepts, what the concepts mean, and if they are to be used synonymously or not. The analysis resulted in emotional and motivational aspects of graffiti, scrawl, and other types of vandalism, and further, in distinctions and similarities between the concepts.

3 Discussion

As a further step toward reaching a deeper understanding of psychological factors involved in vandalism in general and graffiti in particular, these studies focus upon: (a) what effects alcohol and/or frustration exert on vandalistic behavior, (b) whether or not factors that are strongly involved in juvenile delinquency and antisocial behavior (impulsivity, affectivity, emotional disability, and optimism), also influence on graffiti, (c) the similarities and distinctions between scrawl, graffiti and vandalism, and (d) motivational factors related to involvement in graffiti.

The findings in this thesis, the theoretical overview, as well as the four studies, concerning factors involved in vandalism, will be discussed in light of the Equity Control Model of Vandalism (Baron & Fisher, 1984), as an explanatory model, and further, an extended ECM-model will be presented.

3.1 Main results

The main results of the four studies are:

- a) Alcohol and frustration increase vandalistic behavior.
- b) Females are more vandalistic, destructive and aggressive than males in a laboratory setting, measured as minor vandalism (experimental graffiti).
- c) Males report significantly higher involvement in vandalism (from littering to arson) than females.
- d) Females report significantly higher involvement in scrawl-graffiti (from scrawl, to tags and mural paintings) than males.
- e) Impulsiveness is a significant personality factor related to vandalism as well as to scrawl-graffiti. However, while vandalism is predicted by non-planning impulsiveness, scrawl-graffiti is predicted by motor impulsiveness.
- f) Perceived emotional intelligence and dispositional optimism seem not to have any protective effect on vandalism or scrawl-graffiti.
- g) There are distinctions between vandalism, scrawl, and graffiti, according to the practitioners. While vandalism is a destructive act, scrawl may be destructive or creative depending on how it looks and in which mood and context it is created, whereas graffiti is a creative act.

- h) The emotional moods related to vandalism, scrawl and graffiti are different. While *destructive* vandalism is committed in an affective mood, where alcohol might be a contributing factor, the emotional moods related to graffiti are controlled and focused, mixed with high arousal, happiness and euphoria. Scrawl may be created in an affective *vandalism-mood* or in a controlled *graffiti-mood*.
- i) Involvement in TTP-graffiti seems to meet many of the practitioners' ordinary human needs, such as power, independence, status, social contact, idealism, and acceptance.
- j) The experiences and feelings related to the graffiti performance are similar to the experience of *flow*.

3.2 Gender differences

As indicated, several studies have shown that about 80 to 95 percent of all vandalistic acts are perpetrated by males, and that vandalistic behavior reaches the peak of its frequency during middle adolescence (Nilsson, 1984; Wiesenthal, 1990; Herbert, 1990; Frith, 1996; Goldstein, 1996; Brå, 2012). Similar statistical proportions relate to scrawl-graffiti (Johnson, 2001; Shannon, 2002; Andrée Löfholm, 2002; Hollari, 2005; Halsey & Young, 2006), and juvenile delinquency in general (Ahlberg, 2001; Liu & Lin, 2007; Brå, 2012).

The results of the two experimental studies (Study I, Study II) demonstrated that females scored higher than males on minor vandalism (experimental graffiti) and destruction, which is contradictory to other studies' results about gender differences related to vandalism, where males are in absolute majority. One explanation of the results might be the experimental situation, which allows the participants to act more freely than in a normal social context. An anthology by Andershed and Andershed (2008) explains some of the gender differences in antisocial behavior in terms of society's permissive attitude toward males' aggressive antisocial behavior, while females, on the other hand, become more inhibited in their aggressive behavior, and more reinforced in socially acceptable behavior considered more suitable for females (Andershed & Andershed, 2008). Hence, it is more permissible for males than females to be vandalistic and act aggressively in society, but the laboratory setting remains relatively free from societal norms, and might allow females to act more freely, and in this case show more destructivity.

Contrastingly, the self-reported questionnaire study (Study III) among adolescents shows also that females are significantly more involved in scrawl-graffiti (from scrawl, to tags and mural paintings) than males, while males are significantly more involved in vandalism (from littering to arson) than females. These latter results correspond well with other studies about vandalism (Herbert, 1990; Frith, 1996; Goldstein, 1996; Andershed & Andershed, 2008; Brå, 2012), and juvenile delinquency (Ahlberg, 2001; Andershed & Andershed, 2008; Brå, 2012), whereby males are in the majority. Crime statistics show also that a majority among those who are caught by law as suspected for scrawl-graffiti are males (Brå, 2012; Shannon 2003), whereas other self-reported studies in the Swedish context show that gender differences tend to be minimal in this matter (Brå, 2013).

There is an ongoing debate about whether or not scrawl or at least graffiti are to be seen as art or vandalism. The present results (studies I, II, and III) also add a gender perspective on scrawl-graffiti and vandalism, respectively. However, while 41 percent of the females in study III reported involvement in scrawl-graffiti, only 8 percent reported involvement in vandalism. The corresponding figures for males were: 30 percent reported involvement in scrawl-graffiti and 27 percent reported involvement in vandalism. Besides the high proportion of females that had been involved in scrawl-graffiti (41 percent), the most remarkable result is that so few of the females admitted that they had been involved in vandalism (8 percent). One explanation of the high proportion compared to other studies, might be the question design, covering five years back in time. However, that does not explain gender differences within the study. Rather, part of the answer will be found in how participants assess what they perceive to be scrawl, graffiti, and vandalism, respectively. Possibly, males and females assess this differently.

Some explanation might be found in a study by Green (2003), where graffiti in toilets had been studied from the viewpoint of communication, social identity and gender. They found that female graffiti were more polite, interactive, positive and supportive than male graffiti. Male graffiti was, on the other hand, more argumentative, negative, aggressive and insulting. While males wrote about racism, politics and 'presence' (like "I was here"), females wrote about love, romance, health and relationships. In the present study III, the scrawl-graffiti variable includes all types of graffiti, from scrawl with pencils to tags and mural paintings. Maybe, female scrawl-graffiti differ from male scrawl-graffiti in this study as well as in the study by Green (2003): that females estimate *smaller* scrawl as *scrawl*, which may explain the higher proportion of involvement, and that female scrawl-graffiti

is more *polite*, *supportive*, and *non-destructive*, and therefore they do not assess it as vandalism.

However, crime statistics (Brå, 2012) as well as other studies about graffiti (Johnson, 2001; Andrée Löfholm, 2002; Hollari, 2003; Hollari, 2005; Halsey & Young, 2006) postulate that the absolute majority of graffitists are male, and that graffiti culture is a male culture (Shannon, 2002), although self-reported studies show that the gender differences in scrawl-graffiti tend to be minimal (Brå, 2013), or that females are in a majority (Study III). For further comparisons, it is necessary to ascertain what kind of scrawl-graffiti is being referred to, the extent and the context. Regarding graffiti culture, termed TTP-graffiti culture, graffiti are defined as Tags, Throw-ups and *Pieces* (Masterpieces). In the present interview study (Study IV) and other interview studies with graffitists (i.e. Shannon, 2002; Halsey & Young, 2006; Rowe & Hutton, 2012), male participants are in the absolute majority, which also reflects the representational aspect within graffiti culture. Shannon (2002) suggests that graffiti culture is a "male culture", and that opinion among male graffitists is that females who attach to that culture are not as serious as the males.

According to Shannon (2003) the majority of graffitists are what he called *short-time-graffitists*. They join the graffiti culture in early adolescence and remain there for about a couple of years. In study III and other comparable self-reported studies (Brå, 2013), adolescent individuals report involvement in scrawl-graffiti, but they may not be identified by law, and therefore may not be registered in statistics (Brå, 2012). Those who stay within the TTP-graffiti culture for a longer time are called *long-term-graffitists*, and are divided in two clusters: *long-term graffiti specialists* and *long-term delinquent graffitists*. The *long-term delinquent graffitists* are more prone to be involved in other types of criminal behavior than the others, but as Shannon (2003) says, there are no clear distinctions between those who are just involved in graffiti and those who are also involved in other types of vandalistic behavior.

Regarding involvement in vandalism, the males in study III reported a significantly higher degree of involvement in vandalism than females, which is consistent with other studies about vandalism (Herbert, 1990; Frith, 1996; Goldstein, 1996; Brå, 2012). According to Andershed and Andershed (2008), male dominance in antisocial behavior in adolescence is partly explained by young boys' exposure to risk factors in childhood. Boys exhibit to a greater extent risk factors, such as fearlessness, impulsivity, emotional instability, hyperactivity, and inadequate emotion regulation. They are also

given more indulgence by their parents to act aggressively, and they have more problematic peer relationships, than girls.

Liu and Lin (2007) found some interesting gender differences in terms of the source of frustration and delinquent or antisocial activities. Their study shows that males' antisocial activities are more related to frustration/strain over achievement, whereas females' antisocial activities are more related to frustration/strain over physical wellbeing.

It is stated also that vandalism is perpetrated often in small groups (Daun, 1982; Cohen, 1984; Coffield, 1991; Cordess & Turcan, 1993). Baron and Fisher (1984) call attention to the type of moderating effect that the peer group may have on vandalistic behavior: the group can restrain or reinforce a vandalistic act depending on beliefs, characteristics and the behavior of the group members. Liu and Lin (2007) stated that association with delinquent peers and having a deviant attitude are strongly associated with delinquency involvement. Matza and Sykes (1961) imply that it is a technique of the neutralization of social norms that "allow" individuals to exceed norms and participate in rule breaking activities. Is it possible that these assumptions together explain "male dominance" in antisocial behavior in society? Perhaps, the male culture, as well as belonging to a group, group pressure, norms that communicate that it is okay to break the rules, and the expulsion of non-accepted wannabes, can explain gender differences in "real life situations".

3.3 Motivational aspects of graffiti and vandalism

The two fundamental questions for this thesis were: what motivates young people to commit vandalism, and what motivates involvement in graffiti?

The two experimental studies (Study I, Study II), measuring *minor* vandalism with the AET-test, and major vandalism with the tearing test, shows that alcohol and frustration together increase the degree of minor vandalism. These observations are consistent with other studies concerning vandalism (Goldstein, 1996). The results also show that minor vandalism (later defined as experimental graffiti) is strongly associated with destructiveness and aggression. In contrast, in these studies, there were no correlations between vandalism and creativity, and the variable major vandalism shows no significant differences in the experimental conditions.

When considering antisocial behavior in general (from cheating and lying to minor and major delinquency), frustration seems to be an important variable. Liu and Lin (2007) associate frustration with strain, divided into

two levels: Overall Strain and Specific Strain. Specific strain was divided into three groups: Strain over – "status achievement", "interpersonal relations", and "physical wellbeing". They found that higher levels of frustration in life (Overall Strain) correlated with greater participation in delinquent activities. However, they also found that self-control has a moderating effect on delinquency. As Baron and Fisher suggest, it is "important to separate the sources of frustration from how frustration will be coped with" (1984, p. 65).

The results of the two experimental studies (Study I, Study II) show that alcohol in combination with induced frustration significantly increases the degree of *minor vandalism* (experimental graffiti) as measured with the AET-test. Only alcohol or only frustration did not give this effect. These results confirm earlier research that suggests that a frustration factor is necessary for alcohol intoxication to increase destructive behavior (Gustafson, 1991).

The questionnaire study (Study III) shows that impulsivity is a significant personality factor related to vandalism as well as to scrawl-graffiti (from scrawl, to tags and mural paintings). These results are consistent with several studies about juvenile delinquency and other types of antisocial behavior (Luengo, Carillo-de-la-Pêna, Otero, & Romero, 1994; Widom & Toch, 2000; Andershed & Andershed, 2008). The results also show that vandalism is predicted by non-planning impulsiveness, while scrawl-graffiti is predicted by motor impulsiveness.

According to Andershed and Andershed (2008), antisocial behavior can be recognized in early childhood, as early as in the second to fourth year of age, and reaches its peak in the middle of adolescence (15 to 17 years). It has also been shown that, among grown-ups with frequent and stable criminal behavior, two-thirds exhibited antisocial behavior in childhood. As risk factors they mention, among other things, impulsivity, hyperactivity, inadequate emotional emotional instability, and regulation. neurological systems; the Behavioral Activation System (BAS) and Behavioral Inhibition System (BIS), are described to have a significant influence on temperamental dimensions, which are related to antisocial behavior. For example: a low BIS makes the individual fearless and insensitive to punishment, whereas a high BAS makes the individual impulsive and "sensation seeking". Since impulsivity is a significant personality trait in destructive vandalism, as well as in scrawl-graffiti (whether one calls it vandalism or not), and the graffitists in the interview study (Study IV) mention high arousal, illegality, and adrenaline rush as motivating factors for involving themselves in graffiti, at this point there

seem to be same motivational factors behind antisocial behavior such as *destructive* vandalism as well as scrawl-graffiti.

Allen and Greenberger (1978), and additionally Allen (1984), imply that vandalistic behavior can be an aesthetic experience for the perpetrator; that destructiveness and creativity are closely related. This assumption is confirmed by authors investigating graffiti culture, who declare that graffiti is art, and that one motivational factor for involvement in graffiti is interest in art and artistic talent (Johnson, 2001; Andrée Löfholm, 2002; Halsey & Young, 2006).

In the interview study (Study IV), the results indicated that involvement in graffiti culture and graffiti activity is motivated by basic human desires, such as feelings of joy and satisfaction. Besides feelings of happiness, excitement, feeling creative, the pleasure of belonging, togetherness, acceptance and respect, they also mention other motivational factors, such as to show off, to take their place in society, to achieve confirmation and acknowledgement, and to be famous and well known.

In Reiss' Sensitivity theory (Reiss, 2004), there are 16 basic desires that are universal for human beings; power, curiosity, independence, status, social contact, vengeance, honor, idealism, physical exercise, romance, family, order, eating, acceptance, tranquility, and saving (Havercamp & Reiss, 2003; Reiss, 2004; Reiss & Wiltz, 2004; Reiss & Havercamp, 2005). According to the findings in the present interview study (Study IV) and other interview studies with graffitists (i.e. Johnson, 2001; Andrée Löfholm, 2002; Halsey & Young, 2006; Rowe & Hutton, 2012), the graffitists seem to be motivated by six of the sixteen strivings: *power, independence, status, social contact, idealism* and *acceptance*. Each of these, when satisfied, generates positive joyful feelings of, respectively: *efficacy, freedom, self-importance, fun, compassion*, and *self-confidence*.

According to Self-determination theory (SDT; Deci & Ryan, 2000), there are three basic psychological needs; *competence*, *relatedness*, and *autonomy*, which will be satisfied mainly through activities, springing out of *intrinsic motivation*. While *extrinsic motivation* concerns activities springing out of reaching other goals, *intrinsic motivation* concerns self-determined, autotelic activities, performed for their own sake. According to the findings in this thesis, involvement in graffiti is motivated by *intrinsic motivation* (i.e. feelings of joy, curiosity, excitement, arousal, creativity, and satisfaction; becoming better at what I am doing; giving me an identity; making me grow as a person; adrenalin rush, and *flow*), as well as by *extrinsic motivation* (i.e. searching for acceptance, attention, respect, and status; getting acknowledgement, confirmation, belonging, and togetherness;

becoming famous and well-known, taking a place in society, meeting new people, and gaining a sense of power). Since *intrinsic motivation* satisfies basic and essential psychological needs, it is a very strong motivational factor for new as well as ongoing activities, especially when they give satisfaction in action. Even though *extrinsic motivations* are less prone to satisfy basic psychological needs, they give satisfaction in some way, at least as *need-substitutes*.

Besides impulsivity, basic human desires, and psychological needs that motivate involvement in graffiti, there exists also a creative process, mixed with the "edge" of illegality, the risk of being caught by the police, and the triggering effect to succeed in getting the biggest or best painting on an attractive, visible area. The feelings, thoughts and experiences that graffitists mention related to the graffiti performance are similar to Csikszentmihalyi's theory of flow. The graffitists describe a planning phase characterized by focus, excitement and positive expectations, followed by increased arousal and feelings of happiness. During the performance they are at first nervous and worried, but when they start painting, these feelings are replaced by focus, concentration, and calmness, and later on, when the painting emerges, subsequently replaced by intense feelings of happiness, similar to euphoria. When they have been painting for a period, their feelings alter to vigilance and nervousness, implying a fear of detection. However, since it is important for graffitists to feel satisfied with their work, they will stay there, performing graffiti, for as long as possible, in order to complete it. At the end of the performance, arousal levels have reached their peak, and the graffitist hurries away. Afterwards, if they are satisfied with their painting, they feel happy and content. If they are not satisfied with the painting, feelings of dissatisfaction arise, but as long as they avoid being caught by the police, they feel some degree of satisfaction, anyhow.

It has been shown, in this and other interview studies (i.e. Shannon, 2002; Halsey & Young, 2006; Rowe & Hutton, 2012), that the criminal aspect is a significant component in graffiti culture. This aspect would tend to make graffiti more exciting, to provide skills and adrenaline rush, test one's courage, and give the graffitist a feeling of success and confirmation after managing to put the painting onto the previously selected surface. The feelings associated with the excitement and thrill related to the illegality of the activity in combination with the sensation of happiness and satisfaction during, and after, the performance, are reminiscent of certain notions in the theory of flow.

According to Csikszentmihalyi (1992) and Nakamura and Csikszentmihalyi (2002), *flow* is an optimal experience that might occur in

the tension between a perceived challenge and a person's existing skills. It is a subjective experience and a balance between perceived action capacities and perceived action opportunities. When in *flow*, the individual operates at full capacity with intense concentration and optimal arousal (Nakamura & Csikszentmihalyi, 2002). This condition is similar to that which graffitists experience as they perform their acts of graffiti: focus, concentration, calmness, and happiness. Since *flow* occurs in the tension between challenge and skills, and skills improve when the activity is performed, the opportunity for challenges ought to progress as well. *Flow* occurs in the interaction between a person and environment and induces what Nakamura and Csikszentmihalyi (2002) term an *autotelic activity*, which implies that the activity is performed for its own sake; not to reach another goal. Any activity can start as an *exotelic activity* with specific goals, but many develop into an autotelic activity over time.

The *flow experience* may provide the feeling of having control, being free, and being *one* with a group, your art, or the universe. The *Self* expands and becomes more complex, and psychic energy is activated to enhance self-(Csikszentmihalyi, 1992). According to Nakamura Csikszentmihalyi (2002), people need meaningful activities that challenge their creativity and capacity to feel satisfied with their life and themselves. Modern society does not offer teenagers sufficient challenges in relation to their skills. Csikszentmihalyi (1992) indicates that what we refer to as "juvenile delinquency" (such as car theft, antisocial behavior, and vandalism) is motivated by a need of flow experiences; a need to cross the boundaries that grown-ups have set. Older teenagers may be recipient of the challenge by leaving home, moving to another city, forming new relationships, and encountering new environments. Nevertheless, as Csikszentmihalyi implies, the problem persists for the younger teenagers between the ages of 12 and 17 (Csikszentmihalyi, 1992). Remarkably, this initiation is where we might find the roots of the involvement in scrawlgraffiti, vandalism, and other types of juvenile delinquency.

3.4 Vandalism and graffiti – similarities and differences

The underlying issue concerning these four studies was: What motivates young people to commit in vandalism? In the two experimental studies (Study I, Study II) the concept of vandalism was operationalized as (a) *minor vandalism* (experimental graffiti), and (b) *major vandalism* (tearing). The results raised new questions, such as: (a) is graffiti to be considered as

vandalism, based on the notion that vandalism is an expression of destructivity?, (b) are frustration and alcohol triggering factors even for graffiti?, (c) are there any personality traits that might explain involvement in vandalism, scrawl, and graffiti, respectively?, (d) what do young people think, feel, and experience before, during, and after the graffiti performance?

In the two later studies (Studies III and IV), the concept of graffiti – or *scrawl-graffiti* – becomes more clarified. In the questionnaire study (Study III), the concept was used as an over-arching concept of scrawl-graffiti, including every type of scrawl, from scrawl with pencils on pictures and books, to tags and mural paintings. In the interview study (Study IV), scrawl and graffiti were discussed in terms of thoughts, feelings and experiences, and finally in terms of its relation to other types of vandalism.

There is an ongoing debate as to whether or not graffiti may be seen as art or vandalism, and if graffiti and scrawl are to be used synonymously. In the vocabulary, the concept of graffiti is used synonymously with scrawl or writing on "unintended surfaces". Nevertheless, since graffiti culture was established, the concept has gained new appreciation. In talking about graffiti today, one probably means TTP-graffiti (tags, throw-ups, and pieces). In this context, even when talking distinctly about TTP-graffiti, opinions differ in terms of whether it is an artistic creative expression or a destructive vandalistic act. Three main opinions can be identified: (a) it is all destructive vandalism, (b) it is all art, and (c) it depends upon aesthetic value in determining whether it is art or vandalism. The concept of vandalism, on the other hand, includes destructive behavior against property in a widespread manner, from littering to arson, and has been defined as: a) all forms of destruction of property, deliberate or not (Baughman, 1971), b) a conscious act intended to inflict physical damage that results in the loss of aesthetic or financial value of an object or property (Harrison, 1976), c) any destructive behavior from littering to arson (Ducey, 1978), d) an otherwise acceptable behavior in an inappropriate context (Pitt & Zube, 1991), and e) a conscious act directed towards the destruction or damage of an object (or objects) belonging to another person or institution (Moser, 1992).

When regarding the motivational factors in vandalistic behavior in general (note that scrawl-graffiti is *not excluded* here) one discovers playfulness, peer-group pressure, curiosity, pleasure, excitement and financial gain, as well as boredom, frustration, anger, rage and revenge. Other explanations are as follows: it is a creative act, it is about communication, it depends upon perceived inequity, it is a normal developmental stage, alcohol is a frequent variable, and 90 percent depends upon environmental design (for a further explanation see Introduction).

When looking at motivational factors for participating in graffiti in particular, presented in earlier studies, three main points have been identified: (a) interest in art, (b) desire for attention and status, and (c) positive emotions aroused by the activity. It is described as a meaningful activity generating status, respect, attention, belonging, competition, skills and talent, and it gives a physical thrill, an adrenaline rush, pride and pleasure (for a further explanation see Introduction).

The present interview study (Study IV) confirmed earlier studies about motivational factors, and the strong feelings involved in graffiti, mentioned above, and shows, in the light of Reiss' Sensitivity theory (2004), that involvement in graffiti is motivated by ordinary basic human desires such as striving for power, independence, status, social contact, idealism, and acceptance, which when satisfied give the joy of efficacy, freedom, selfimportance, fun, compassion, and self-confidence. The graffitists also describe the graffiti performance like the experience of flow; an autotelic activity, done for its own sake, not done to reach other goals. However, according to Self-determination theory (SDT; Deci & Ryan, 2000), involvement in graffiti is motivated by intrinsic as well as extrinsic motivations, where intrinsically motivated behavior gives strongest satisfaction of the psychological needs of competence, relatedness, and autonomy. It is within the intrinsic motivated action that the experience of flow might occur. Extrinsically motivated behavior, however, might represent need-substitutes to individuals who have been thwarted in satisfying psychological needs in childhood, and thereby might get a more insecure self

Another interesting factor concerning graffiti is the way that the graffitist looks at the environment. According to Halsey and Young (2006), they look at uni-colored blank walls as surfaces that are not being used -a negative area - and they see that it is right to fill them with colorful creations to communicate, interact and become part of society.

Shannon (2003) and Halsey and Young (2006) suggest that the personality traits that are necessary to succeed in graffiti culture are those same traits needed to succeed in society in general, such as hard work, creativity, forethought, planning, design, practice, alertness, attention, a drive for competition and the ability to stay focused. These traits exist in opposition to individual factors associated with other types of antisocial behavior. Luengo et al. (1994), Widom and Toch (2000), and Andershed and Andershed (2008) state that impulsivity, arousal, aggressiveness and extroversion are individual factors strongly correlated with antisocial behavior, and that rule-breaking, aggression, and vandalism are behaviors

that are most strongly correlated with impulsivity. In the questionnaire study (Study III), it was confirmed that impulsivity is a strong variable in vandalistic behavior, as well as in scrawl-graffiti. However, regression analyses showed that vandalism was predicted by non-planning impulsiveness, while scrawl-graffiti is predicted by motor impulsiveness.

Another important factor to consider in this context is what Andershed and Andershed (2008) presented, respectively, as aggressive (overt) and non-aggressive (covert) antisocial behavior. Aggressive antisocial behavior can be split into two clusters: destructive (i.e. physical aggression), and non-destructive (i.e. verbal aggression). In the same way, non-aggressive antisocial behavior can be split into destructive (i.e. vandalize, steal, lie), and non-destructive (i.e. breaking rules, skipping school). According to this compilation (Andershed & Andershed, 2008), vandalism is to be judged as non-aggressive, destructive, antisocial behavior. But of course, aggressiveness and aggressive behavior can result in vandalism, for example in the context of malicious vandalism (Cohen, 1984; Zeisel, 1977; Weinmayr, 1969), and vindictive vandalism (Cohen, 1984; Martin, 1959).

However, the key issue remains: are scrawl and/or graffiti expressions of destructivity? Are there any motivational strivings based upon frustration, aggression, revenge or destructiveness related to scrawl-graffiti?

In the experimental context, there were correlations between *minor vandalism* (experimental graffiti) and *destruction*, as well as *aggression*. The questionnaire study shows that *impulsivity* is a strong variable in relation to "ordinary" vandalism, as well as in scrawl-graffiti (from scrawl, to tags and mural paintings). It also shows that *impulsivity* correlates positively with negative affect (NA), and negatively with positive affect (PA) and optimism. So far, the plausible indications encourage the conception of scrawl-graffiti as vandalism.

Nevertheless, there exist issues in judging it as destructive vandalism, which become apparent when talking to the practitioners, those who practice "real" TTP-graffiti. The graffitists discuss extraordinarily strong feelings, a planning and performance which demands ambition, engagement, skills, focus, and control, and which gives an adrenaline rush, confirmation, togetherness, self-confidence, compassion and self-importance. The experiences related to the graffiti performance seem to be the same as the experience of *flow*, an *autotelic activity* that gives the individual a feeling of being *one with the universe*, whereby the *Self* expands, and *psychic energy* enhances *self-esteem*. These motivational factors are strongly correlated to creative performance, life challenges, self-realization, and peak experiences

in life, and consequently, are not to any great extent influenced by aggressiveness and/or destructiveness.

However, as long as the scrawl or paintings are performed on illegal surfaces, it is judged as vandalism. And *if* we want to get rid of antisocial, illegal scrawl-graffiti, it is necessary to go beyond the *destructive* vandalism label, and increase understanding of what motivates the young adolescents to choose the "graffiti-way" to satisfy their desires, their need for challenges, and their ability to achieve the feelings of joy, satisfaction and confirmation.

3.5 Understanding the complexity of vandalism, using the Equity Control Model of Vandalism

As emerged in the theoretical review, and in these four studies, vandalism is complex phenomenon, with different causes, expressions, consequences, and of many dimensions. Cohen's vandalism typology (1973, 1984), is one of the most used typologies in understanding different types of vandalism. It consists of six types of vandalism: acquisitive, tactical, ideological, vindictive, playful, and malicious vandalism. Baron and Fisher (1984) designed an explanatory model, based on Cohen's typology, illustrating variables that cooperate and interact with one another in vandalistic behavior: The equity control model of vandalism (Fisher & Baron, 1982; Baron & Fisher, 1984). The model is built on the assumption that the underlying motive in most vandalistic acts is perceived inequity, and that the goal is equity restoration. Moderating factors such as degree of control, physical environment and group variables (target group and peer group) might increase or decrease the probability for vandalistic acts to occur and influence, in some way, the kinds of vandalistic acts that will be the outcome. Baron and Fisher (1984) created two vandalism dimensions, based on Cohen's typology. At first they excluded play vandalism because of its character of playfulness rather than intended destruction. The remaining types of vandalistic acts were divided into an instrumental dimension, including more planned and "consequence-sensitive" acts, and an expressive dimension, including more spontaneous, aggressive and violent actions. The model consists of six "events" or variables, from perceived inequity, through moderating factors (degree of control, architectural features, and group presence), to socially acceptable or not acceptable behavior (such as vandalism), and finally the societal reactions and terms of equity restoration.

I find the Equity Control Model of Vandalism useful in analyzing and understanding vandalistic behavior, its complexity, causes, expressions, dimensions, and consequences, as well as moderating factors within the individual, the environment, and group's presence. However, according to the findings presented in this thesis, in the theoretical review as well as in the four studies, wherein vandalism in general and graffiti in particular has been studied - based on the influence of alcohol and frustration, risk and protective factors, personality traits, emotions, motivational factors, flow, and satisfaction – I believe it would be helpful to extend the ECM-model. Primarily, I want to complement it by adding a new dimension of vandalism: the creative-interactive dimension, consisting of scrawl-graffiti, as I find the expression of scrawl-graffiti not to fit into the two other dimensions, because of its character of expression and performance of creativity and interaction with society, rather than destructivity (even though destructivity may be represented on a part of the scrawl dimension). Secondarily, I want to complement primary moderators by adding personality traits and emotional states, as it is found in this thesis that personality traits may be risk or protective factors in vandalistic behavior as well as in other types of juvenile delinquency and antisocial behavior, and that present emotional state might reinforce or inhibit the expression of perceived inequity. Finally, the ECMmodel is complemented by adding sources of frustration, because it is essential to know about the sources of frustration, when dealing with the frustration outcome. Below, the extended Equity Control Model of Vandalism (e-ECM 2016) is presented.

3.6 The extended Equity Control Model of Vandalism (e-ECM 2016)

According to the findings in the present thesis, and the discussion above, an extended Equity Control Model of Vandalism (ECM) is presented. The extended ECM-model (e-ECM 2016) is not to be seen as a critique of the original, but as a development, based on the findings in this thesis, with the aim to be used as an explanatory model in order to analyze and understand the complexity of vandalism. The proposed extension consists of: (1) extended information about sources of frustration as motivation, (2) personality traits as risk and protective factors, (3) present emotional state as a releasing or inhibiting moderator, and (4) the addition of a third dimension of vandalism, the *creative-interactive dimension*.

As a whole, the proposal for a new extended Equity Control Model of Vandalism (e-ECM 2016) will be presented as follows:

- a) **Inequity**, the first step in the model, is defined as "a perceived imbalance between one's own inputs and outcomes" (Baron & Fisher, 1984, p. 65), which "produce distress and anger" /-/ "which motivate individuals and/or groups to try to restore actual equity /-/ or achieve psychological equity /-/" (Fisher & Baron, 1982, p. 186). The new version adds information regarding sources of frustration as motivation (Liu & Lin, 2007; Nordmarker, 2010; Studies I, II and IV in this thesis). Perceived inequity occurs in response to frustration about e.g. relations, situations, achievement, physical wellbeing, challenges, societal norms, and lack of confirmation.
- b) **Degree of control**, the second step in the model, is defined as "the strength of a person's belief that he or she can effectively modify outcomes and arrangements" (Baron and Fisher, 1984, p. 65). Perceived control is determined by a number of factors: "(a) actual opportunities for effecting control which are available within the system; (b) one's own abilities to use these, which depend on his or her verbal skills, social skills, power to influence others, etc.; (c) ability to identify the source of inequity; and (d) one's learned expectations for control in similar situations" (a. a., p. 66). In the model, control is divided into four levels: high, moderate, low and extremely low. The level of perceived control influences which type of vandalism (if any) will be the outcome. According to Baron and Fisher (1984), it is "important to separate the sources of frustration from how frustration will be coped with" (a. a., p. 65). Even Widom and Toch (2000), Liu and Lin (2007), and Andershed and Andershed (2008) state that degree of self-control is a protective and moderating factor to vandalism.
- c) **Personality traits**, as risk and protective factors, are added as the third step in the model. As stated in many studies about juvenile delinquency and vandalism (e.g. Luengo, Carrillo-de-la-Peña, Otero & Romero 1994; Widom & Toch, 2000; Andershed & Andershed, 2008), personality traits such as aggressiveness, emotional instability, fearlessness, hyperactivity, impulsiveness, inadequate emotional regulation, and sensation seeking, are risk factors strongly related to antisocial behavior such as vandalism. The higher the degree of those personality traits, the higher the risk for antisocial behavior. On the other hand, intelligence, cognitive appraisal, emotional ability, empathy, adequate emotional

- regulation, non-impulsive temperament, optimism, problemsolving skills, and self-esteem, are protecting factors in this matter. Personality traits will, in interaction with *emotional state* (below) and *perceived degree of control* (above), stand for *Primary moderators* in the model.
- d) Emotional state is added as the fourth step in the model. It has been stated that affectivity is a risk factor in vandalistic behavior (Luengo et al., 1994; Widom & Toch, 2000; Andershed & Andershed, 2008) and that emotional stability is a protective factor (Widom & Toch, 2000; Andershed & Andershed, 2008). According to Maslow (1970) and furthermore Reiss (2004), emotions are related strongly to ordinary human motivation, as a motivator, or desire, as well as a goal, a satisfaction. Since emotions are dependent on many different factors at each specific moment, they deserve a separate step in the model. In this case, the emotions are divided into four categories: (1) positive comfortable emotions – manageable and satisfying, (2) positive affective motivational emotions - striving for satisfaction by action, (3) negative affective motivational emotions - striving for release and satisfaction by action, and (4) negative passive emotions resignation. hopelessness, inactivation and Among categories; category (Positive Affective Motivational two Emotions - PAME), and category three (Negative Affective Motivational Emotions – NAME), seem to be activated in relation to antisocial behavior, while category one (Positive Comfortable Emotions – PCE) activate social acceptable behavior, and category four (Negative Passive Emotions - NPE) lead to no activation. Emotional state will, in interaction with personality traits and perceived degree of control, stand for Primary moderators in the model.
- e) **Physical environment** was earlier the third step in the model together with group variables, but is now the fifth step. Baron and Fisher (1984) declare that environment itself can prevent or provoke vandalism, or at least influence what kind of vandalistic act will be the outcome. Weinmayr (1969) declares also that the root of vandalism is in the environment, not in the vandalistic individual himself or herself. Vandalism occurs because those environments evoke motivations for destruction (Weinmayr, 1969). Baron and Fisher (1984) imply that the symbolic value of the target is essential for which type of vandalism will be the

- outcome; that damaged environments facilitate malicious vandalism, while cared for settings are more common targets for acquisitive vandalism. According to Halsey and Young (2006), graffitists look at uni-colored blank walls as *unused areas*, waiting for someone to fill them with colorful creations, such as TTP-graffiti. The participants in study IV (in this thesis) talk about interacting with society by expression of graffiti. Physical environment and group variables taken together are *Secondary moderators* in the model.
- f) Group presence, which was earlier, combined with physical environment, the third step in the model, is in this new model, still combined with physical environment, the fifth step. Baron and Fisher (1984) called these secondary moderators. Two types of groups are identified: the target group and the vandal group. A strong and cohesive neighborhood (target group) has a dampening effect on all types of vandalism. The environment is being better taken care of (which inhibits vandalism) and the vandal's risk of being caught is high. The peer group (vandal group) might have a strong contributing effect or a strong inhibiting effect, depending on group norms, arousal, deindividuation, anonymity, groupthink, diffusion of responsibility, and norms about antisocial behavior, status, and so on. Liu and Lin (2007) and Andershed and Andershed (2008) declare also that peer group pressure, especially, might inhibit or motivate antisocial behavior. Together with physical environment, group variables stand for the Second *moderators* in the model.
- g) Vandalism, socially acceptable behavior or helplessness, was earlier step four in the model, but now provides the sixth step. This step is the behavioral outcome the "equity restoration" of the perceived inequity, related to perceived control, personality traits, emotional state, architectural features, target group presence, and peer group presence. Even though the variables are presented in steps, the model should be read as a temporal flow of events, not a causal model (as well as in the original ECM-model). In the original model there were four possible outcomes, reaching equity restoration by: (a) socially acceptable behavior within the system, (b) the *instrumental dimension of vandalism*, consisting of planned and "consequence-sensitive" acts, such as acquisitive, ideological and tactical vandalism, (c) the *expressive dimension of vandalism*, consisting of spontaneous, aggressive and violent actions, such as

vindictive and malicious vandalism, and (d) helplessness – restrained activity.

In this extended ECM-model (e – ECM, 2016) a new category, a fifth dimension of vandalism, is added: the creative-interactive dimension of vandalism, consisting of scrawl-graffiti, on a continuum; from scrawl on pictures and books or other "smaller" and "lighter" surfaces, not too expensive to repair or replace; to scrawl, tags and slogans on furniture, art, toilet walls or other surfaces that demand a greater deal to repair or replace; to tag and paint TTP-graffiti, on house-walls, trains, concrete tunnels and so on, which require great efforts to restore, both in terms of cost and work effort. The creative-interactive dimension of vandalism is motivated by perceived inequity, influenced by personality traits, emotional state, perceived degree of control, architectural features, target group presence, and peer group presence. The outcome is illegal – to different degrees – and the illegality is a contributing factor as to why it should be judged as vandalism, no matter what the practitioners claim. Nevertheless, this vandalism dimension is strongly influenced by positive desirable emotions and ordinary human motivational bases, as well as strong emotions of joy and satisfaction, similar to flow, under performance - especially the "higher" degree of scrawl-graffiti. Since the goal is not destruction but rather creation and interaction, it should be judged as *creativeinteractive vandalism*, in opposition to destructive vandalism.

According to Baron and Fisher (1984), the equity restoration may be *actual* or *psychological*, primarily depending on source of inequity, degree of control, architectural features, group presence, and choice of action and target. To a great extent, the expressive dimension of vandalism releases *psychological equity*, while the instrumental dimension releases *actual equity*. Whether the creative-interactive dimension gives *actual* or *psychological* equity restoration, or both, will depend on the source of inequity, personality traits, emotional state, perceived degree of control, architectural features, group presence, the choice of target, the surface and the degree of scrawl-graffiti.

h) Societal reactions and terms of equity restoration is now the seventh step in the model and predict the probability of recurrence of vandalistic behavior. As Baron and Fisher (1984) declare: as long as the sources of instigation remain the same and the barrier properties are permeable to vandalistic acts, vandalism will

continue. In order to inhibit vandalism, remediation strategies must be focused on either a barrier-support system or on the motives underlying vandalism such as equity and control. As suggested, actual equity restoration increases the feeling of perceived control, and if the societal reactions reinforce this, the degree of control increases is more sustainable for the perpetrator, which might lead to less inequity, more self-control, and therefore less vandalism. On the other hand, psychological equity restoration is similar to catharsis, a venting of frustration, giving a short-term effect of increased feeling of equity. Since the target of the frustration is irrelevant in relation to the source of frustration, there will be no actual equity, only a temporarily increased feeling of illusory control. Where the society does not see the relationship between perceived inequity and the vandalistic act, there is expected to be more negative societal reaction, which will increase the feeling of the perpetrator of being misunderstood and unfairly treated, which will lead to more inequity, less self-control and thereby an increased risk for recurrent vandalism. These "truths" are suitable for all three dimensions of vandalism; creative-interactive, instrumental, and expressive.

However, in this extended ECM-model (e-ECM 2016), personality traits and emotional state are added as risk and inhibitive factors, and will, together with degree of control, account for Primary moderators, i.e. individual factors involved in vandalistic behavior. Since personality factors temperament, impulsiveness, hyperactivity, aggressiveness. sensation seeking, fearlessness, and emotional instability are quite sustainable over time (Andershed & Andershed, 2008), emotional state and degree of control will be the variables that primarily become influenced by emotional, societal, and peer group feedback, related to the degree of social and/or antisocial behavior.

r, 1984)	Societal reactions to the Equity Restoration Affects future behavior Reactions	More favorable societal reactions; Greater potential for long-term equity; increases actual and perceived control for perpetrator. More negative societal reactions; Lower potential for long-term equity; increases illusory control, no increase in actual control for perpetrator.
The extended equity-control model of vandalism (Nordmarker, 2016, based on Baron & Fisher, 1984)	Social or Antisocial Behavior To reach equity restoration Behavior	Socially acceptable behavior Creative-interactive Vandalism; Scrawl-graffiti Instrumental Vandalism; Acquisitive, Ideological, Tactical Expressive Vandalism; Vindictive and Malicious Helplessness
rdmarker, 2016, ba	Secondary Moderators Contribute or inhibit Secondary Moderators	Architectural features Target group presence Peer group presence
vandalism (No	Emotional State Reinforce or inhibit	Positive Comfortable Emotions Affective Motivational Emotions Motivational Emotions Negative Passive Passive Emotions
ity-control model of	Personality Traits Risk/protective factors Primary Moderators	Intelligence Cognitive appraisal Self-esteem Optimism Arousal Emotional ability Emotional regulation Empathy Impulsiveness Aggressiveness Fearlessness Affectivity Hyperactivity
ne extended equ	Degree of Control Behavior moderator	High Control Control Control Control Control Control Control Low Control Control
Th	Perceived Inequity Motivation factor	"a perceived imbalance between one's own inputs and outcomes" (Baron & Fisher, 1984) Inequity Motivation about: - Relations - Situations - Situations - Challenges - Challenges - Challenges - Challenges - Challenges - Challenges - Lack of confirmation

Figure 3. The extended equity-control model of vandalism (e-ECM 2016). The original ECM (Baron & Fisher, 1984), complemented with personality traits and emotional states as primary moderators, a new dimension of vandalism: the creative-interactive dimension, and sources of frustration.

3.7 Strength and limitations of the study

As a consequence of the complexity built into the nature of vandalism, covering a wide spectrum from littering to arson, often defined as a destructive behavior, committed in an affective mood, not infrequently influenced by alcohol and other drugs, and conducted in a physical, psychological and social context, there is a challenge in investigating and identifying motivational factors within the individual. In these studies, the influence of alcohol and frustration on vandalistic behavior was investigated in a laboratory setting (Studies I and II), in order to eliminate impact from other contextual variables. The phenomenon of vandalism was in these studies operationalized as minor and major art vandalism. The results showed that alcohol and frustration together increased the degree of minor vandalism (operationalized as experimental graffiti) and destructiveness, and that females were more vandalistic, aggressive and destructive in the laboratory setting than males. However, the laboratory setting is afflicted also by its limitations, for example the exclusion of contextual variables. such as architectural features, peer group pressure, target group presence, societal norms and so on. Another limitation pertains to the participants' age. Due to the alcohol variable, the participants in these studies were a little bit older (mean age 24) than "ordinary" vandals, who are about 12-19 years old with a peak at 15-17 years. Nevertheless, the results evoke questions about gender differences, whether scrawl and/or graffiti have the same motivational bases as other types of vandalism, and whether there are psychological traits related to vandalism and scrawl-graffiti.

In the next step, involvement in vandalism and scrawl-graffiti among Swedish adolescents was investigated in relation to impulsiveness, affectivity, dispositional optimism and perceived emotional intelligence (Study III). The results show that impulsiveness is a significant factor related to vandalism in general as well as in scrawl-graffiti, but that vandalism was predicted by non-planning impulsiveness while scrawl-graffiti was predicted by motor impulsiveness. Further, the results show that males were more prone to vandalism, while females were more prone to scrawl-graffiti. The well-known psychological instruments used in the study strengthen the results, as well as the participants' anonymity. On the other hand, the retrospective and open questions capture a high frequency of participation (covering five years back in time), and a wide spectrum of interpretations of what ought to be assessed as scrawl, graffiti and/or vandalism – and it did not admit the opportunity for supplementary and clarifying questions.

Nevertheless, these limitations was taken care of in the interview study (Study IV), where 13 young individuals, familiar with scrawl, graffiti, and other types of vandalism, were interviewed about their thoughts, feelings, and experiences related to these activities. The interviews and analyses resulted in a deeper understanding about motivational aspects involved in scrawl, graffiti, and vandalism, as well as feelings and thoughts involved before, during and after the performance, and finally, distinctions and similarities between the concepts. These findings from these four studies, together with the theoretical review, resulted in, among other things, an extended Equity Control Model of Vandalism (e-ECM 2016), where a new dimension of vandalism, the creative-interactive dimension of vandalism, was introduced, as well as the two new primary moderators: personality traits and emotional state.

3.8 Final conclusions

The general purpose of this thesis was to identify and describe what motivates young people to commit vandalism in general and graffiti in particular, and what these activities give in the form of satisfaction, released frustration, or further motivation. At first, vandalism was operationalized as minor vandalism (experimental graffiti) or major vandalism (tearing and scratching). The results showed that alcohol and frustration in combination triggering factors for minor vandalism, destructiveness, aggressiveness. In the next step, personality traits, commonly related to antisocial behavior and juvenile delinquency, were investigated in relation to involvement in vandalism and scrawl-graffiti (from scrawl, to tags and mural paintings). The results showed that impulsiveness exerted a strong impact on vandalism as well as upon scrawl-graffiti, but while vandalism is predicted by non-planning impulsiveness, scrawl-graffiti is predicted by motor impulsiveness. Finally, there are distinctions between vandalism, scrawl and graffiti. While vandalism is destructive, graffiti is creative-interactive, and scrawl might be creative-interactive and/or destructive depending on the context in which it is created, how it is expressed, and whether or not it is created in a vandalism mood or in a graffiti mood.

In light of these results, and of the Equity Control Model of Vandalism (ECM), a new vandalism dimension has been introduced; *the creative-interactive dimension of vandalism*. This new dimension consists of scrawl-graffiti on a continuum; from scrawl on pictures and books or other "lighter" surfaces, not too expensive to repair or replace; to scrawl, tags and

slogans on furniture, art, toilet walls or other surfaces that demands a greater deal to repair or replace; to tag and paint TTP-graffiti, on house-walls, trains, concrete tunnels and so on, which requires great efforts to restore, both in terms of cost and work effort.

Further, the results demonstrate that involvement in graffiti is motivated by strong emotions and basic human desires, such as feelings of joy and satisfaction. Besides feelings of happiness, excitement, feeling creative, the pleasure of belonging, togetherness, acceptance and respect; other motivational factors are present as well, such as to show off, to take one's place in society, to be famous and well-known, and to achieve acknowledgement and confirmation. In the light of Reiss' Sensitivity theory (2004), the graffitists are motivated by power, independence, status, social contact, idealism, and acceptance, and if they succeed in their activity they get satisfaction through joyful feelings of efficacy, freedom, self-importance, fun, compassion, and self-confidence. In addition to this, feelings and experiences described related to the graffiti performance are very similar to flow. Additionally, according to Self-determination theory (Deci & Ryan, 2000), involvement in graffiti is motivated by intrinsic motivation; done for its own sake, not aspiring to reach other instrumental goals, such as feelings of joy, creativity, and satisfaction. But it is also motivated by extrinsic motivation; aspiring to reach a goal, such as getting attention, acceptance, and status. An activity, derived from intrinsic motivation, conducted with contentment, gives satisfaction to the basic psychological needs of competence, relatedness, and autonomy, and strengthens self-esteem. These are strongly motivational factors to become involved in such activities like graffiti.

The gender perspectives in these studies are interesting. In the two experimental studies, females scored higher on degree of experimental graffiti (minor vandalism), destructiveness, and aggressiveness, than males. And in the questionnaire study, females reported more involvement in scrawl-graffiti (from scrawl, to tags and mural paintings), than males (while males on the other hand, reported more involvement in vandalism). These results confirm each other – but all statistics show that males are in the absolute majority in both vandalism and scrawl-graffiti in "real life". Further studies have to be done to investigate the gender perspective in vandalism in general, as well as in scrawl-graffiti.

The Equity Control Model of Vandalism (ECM) offers a helpful model in facilitating the analysis of and understanding the complexity of vandalism, taking many factors influencing vandalism into account. In this thesis, an extension of the ECM model has been presented. The new model

(e-ECM 2016) consists of: *Perceived Inequity* – completed with sources of frustration; *Primary Moderators* – Degree of Control, Personality Traits (new), and Emotional State (new); *Secondary Moderators* – Architectural features, Target group presence, and Peer group presence; *Social or antisocial behavior to reach equity restoration* – Socially acceptable behavior, Creative-interactive vandalism (new), Instrumental vandalism, Expressive vandalism, and Helplessness – activities that can give actual or psychological equity restoration; and finally, *Societal reactions* – positive or negative, influencing the potential for long-term equity, and the individual's perception of degree of control. Reactions from society, the potential for terms of equity and feelings of actual or illusory control lay the foundation for further social or antisocial behaviors.

3.9 Further research

In the light of this thesis, we have advanced a little bit further in understanding what motivates young people to commit vandalism in general and graffiti in particular. In further research, it would be interesting to investigate in greater detail the gender differences concerning involvement in vandalism, scrawl and graffiti, and explore in more detail the dimensions and degrees of scrawl-graffiti, regarding gender, destructiveness, motivation, behavioral outcome, and satisfaction.

The extended Equity Control Model of Vandalism (e-ECM 2016 – introduced in this thesis) may be useful as an explanatory model, in order to understand the complexity of vandalism, its dimensions, causes and consequences, as well as contributing and cooperating factors involved.

In further research about vandalism and/or scrawl-graffiti, it will be helpful to clarify some issues:

- Identify type of vandalism is it expressive, instrumental, creative-interactive, or is it playful vandalism?
- Identify the degree of scrawl-graffiti is it scrawl on pictures and books; scrawl, tags or slogans on furniture, art and walls; or TTP-graffiti (tags, throw-ups and/or pieces) on walls, houses, trains, or tunnels?
- Identify the type of antisocial behavior is it aggressive or non-aggressive, destructive or non-destructive?

Consequently, when using the e-ECM 2016 (The extended equity control model of vandalism, Nordmarker, 2016) to explain and understand the behavior, it is helpful to identify:

- Causes of the perceived inequity.
- Primary moderators within the individual; perceived degree of control, personality traits, and emotional state.
- Secondary moderators; architectural features, target group presence, and peer group presence.
- The behavioral outcome; socially acceptable or antisocial. If antisocial, identify the dimension of vandalism as mentioned above.
- The equity restoration within the individual; actual or psychological.
- The societal reactions; positive or negative, how they are communicated, consequences for perpetrator, higher or lower potential for long-term equity, effects on degree of control, and finally, the probability for vandalism to reoccur.

Through identifying and understanding what motivates young people to be involved in scrawl-graffiti and other types of vandalism, and what it gives in terms of equity restoration, status, social contact, acceptance, feelings of joy, flow, confirmation and satisfaction, we might discover some way to motivate young people to use their time, power, ambition and energy, in a socially acceptable manner instead of as an illegal activity. However, there is a big challenge to find other activities that can correspond with what scrawlgraffiti and other types of antisocial behavior give the adolescents, in the form of challenging skills and societal norms, and giving status, confirmation, joy, flow, and satisfaction. As Csikszentmihalyi says, people need meaningful activities that challenge their creativity, capacity, and existing skills to feel satisfied with their life and themselves. In the tension between perceived challenge and existing skills, flow might occur, and if it does – the experience provides the feeling of having control, to be free, to be one with a group, or with the universe, the Self expands and becomes more complex, and psychic energy is activated to enhance self-esteem (Csikszentmihalyi, 1992).

Figure 4, below, highlights emotional states related to challenge level and skill level (Csikszentmihalyi, 1997). The figure may be helpful in analyzing and understanding some antisocial behavior among adolescents, such as some degrees of scrawl-graffiti, in striving towards reaching *flow*.

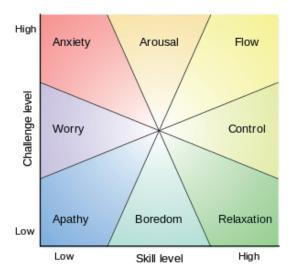


Figure 4. Emotional states, as a function of the relationship between challenges and skills. Optimal experience, or flow, occurs when both variables are high (Csikszentmihalyi, 1997, p. 31 [image by Oliverbeatson, Wikipedia Commons])

In conclusion, it ought to be considered that the analysis and conclusions in this thesis are based upon data from ordinary young adults (Studies I and II), ordinary adolescents (Study III), and graffitists (Study IV), in a Swedish context, and that the aim was to find psychological motivational factors to scrawl-graffiti. Since the dimension, scrawl-graffiti, covered a wide spectrum, from scrawl on pictures and in books, to big mural paintings, it should be taken into account that it includes expressions of different different motivational bases emotions. and in different Nevertheless, I am convinced that, in further research, as well as of other needs related to scrawl-graffiti and other types of vandalism, it would be beneficial to elucidate the behavior in accordance to Deci and Ryan's Selfdetermination theory (2000), as well as in the light of Reiss' Sensitivity theory of Motivation (2004), Csikszentmihalyi's Theory of Flow (1992), and finally, analyze it in the light of the extended Equity Control Model of Vandalism (e-ECM 2016).

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