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# **About the Alleged Racism among Swedish Police Officers**

**Author**

Erika Sjögren

**Supervisors**

Ulf Holmberg  
Georg Stenberg

## About the alleged Racism among Swedish Police Officers

The main aim of the present research was to investigate whether Swedish police officers who often are accused of being racist are more prejudiced toward people with non Swedish-origin than other occupational groups. Three groups (n = 108) – police officers, fire fighters and teachers participated in the study that was carried out using questionnaires and IAT-tests. The study showed that the police officers were not the most prejudiced occupational group in the explicit measurements and were the least prejudiced in the implicit measure. The two different methods of measuring prejudice were assessed and did not show any correlation

Key words: police officers, prejudice, IAT, explicit measures, racism

The obligation of the Swedish police force is to make citizens feel safe and secure. Their main task is to maintain common order, security and promote safety (SFS 1984:387 §1). Often the police are criticized for not doing their job well enough and that they, despite their obligation by law to make all citizens feel safe, are acting discriminatory against some people. It is not unusual to find articles in the morning papers where police officers are accused of wrongdoing in some way. In some articles police officers' racist attitudes, such as using insulting language or not taking measures against hate crimes, are discussed.

Interestingly enough, it seems as if people in the police organization read the articles and because of them try to change their actions and reactions in this matter. In November 2005 at a seminar held in Lund, the Swedish prosecutor Sven-Erik Alhem (2005) was cited saying "The theme of the seminar is trying to influence and illustrate our values concerning the questions hate crimes actualizes –simply put: our prejudices". In 2001 the police bought a course from Malmö Högskola of Sweden so that their aspiring directors would learn about international migration and ethnic relations (May, 2001). Such actions are in line with the findings in Lindholm, Christianson and Karlsson's (1997) study where they concluded that police officers are well aware that ethnic discrimination is socially undesirable, strongly opposed and also know that both the public and the media suspect they treat people different depending on their origin.

How troubled should one get and who said media is supposed to be trusted in their presumed knowledge in this matter? Lindholm et al. (1997) and Lindholm and Christianson (1998) investigated attitudes towards people with different ethnicity among police officers compared to civilians and could not confirm the prejudice that police officers are more racist than others. This study aims to investigate the attitudes of police officers, teachers and fire fighters regarding people with different ethnicity than Scandinavian. The findings hopefully will show whether or not there is a problem concerning racism in the Swedish police force that needs to be addressed in seminars and workshops.

Allport (1954) stated that attitudes are among the hardest psychological variables to measure. Contrary to physics and chemistry they are abstract and sometimes even unconscious to the individual who practices them. He also explained the term prejudice in his work "The nature of prejudice" as antipathy based on generalizations that are inflexible

and sometimes even wrong (Allport, 1954). Even though this description has been revised, for example by Devine (1995), who explains prejudice as negative feelings toward people based only on their group memberships, Devine stated that Allport's more than fifty year old explanation still captures the core of prejudice as it is understood and interpreted today.

Due to the complexity of the human being there are difficulties in measuring prejudice and attitudes. While people have opinions and attitudes about most things they are also aware of what are politically correct attitudes. Greenwald and Banaji (1995) argued that this human weakness, which probably comes from wanting to be accepted by the people around us, might lead to answers in self-report questionnaires that do not mirror the "real" attitude of a person. Greenwald and Banaji (1995) further concluded that people sometimes are unwilling or unable to reveal their true opinions due to the fact that they sometimes judge people unconsciously.

During the eighties implicit and explicit attitudes were separated and labeled hot and cold prejudice. This was due to the fact that prejudice, measured on self-report scales, had seemed to decrease over time (Gilbert, Fiske & Lindzey, 1998). Some researchers did not believe that prejudice had diminished but argued it had gone from hot to cold meaning that people no longer expressed prejudiced attitudes in public, mostly because of new laws against racial discrimination (Hogg & Vaughan, 2002) and also the fact that people strive for social desirability by being politically correct (Crosby, Bromley & Saxe, 1980). The implicit and explicit expression of attitudes were researched by Greenwald and Banaji (1995) who described implicit attitudes as fast, automatic and operating without intention, often in an unconscious mode while explicit attitudes are slow intentional and operate in a person's conscious mode. To measure these two types of attitudes different instruments will be used. The measuring methods used in this study are the IAT-test, a small replicate of the studies by Lindholm et al. in 1997 and 1998 along with Allport's and McConahay's prejudice scales rewritten by Akrami, Ekenhammar and Araya in the year of 2000.

The computerised IAT, Implicit Association Test, was invented in 1998 to measure attitudes toward things such as ethnic minorities, elderly or overweight people. The IAT-test measures association between different categories, for example, the participant is briefly shown a picture of an overweight person and then as quickly as possible is supposed to combine the picture with expressions meaning good or bad. A simplified explanation of this is that the time it takes for the participant to react and give an answer measures their implicit attitudes (Greenwald, 1998). These attitudes might differ from their explicit attitudes due to the lack of opportunity to adjust the answer. Due to the worldwide spread of the test via the Internet it has been validated in previous studies (see, e.g., Dasgupta, McGhee, Greenwald and Banaji, 2000; Cunningham, Preacher and Banaji, 2001) but also criticized by, for example, Blanton, Jaccard, Gonzales and Christie (2006) who argued that no clear psychometric theory of the IAT has been presented. Moreover, Bluemke and Friese (2006) found that influence of individual stimuli might influence the IAT-test.

Despite the criticism the IAT-test is still at use and still discussed in the scientific world (see e.g. Nosek, Greenwald and Banaji 2005; Nosek, Greenwald, Banaji & Klauer 2005) and will be used in this study. A study made by Rowatt, Franklin and Cotton (2005) used the IAT-test to assess implicit reactions towards Christians as opposed to Muslims in a similar test as the one that will be used in this study. Another ongoing discussion is the one regarding the possible relationship between explicit and implicit prejudice, how they differ

and what they may have in common which Akrami and Ekenhammar (2005) assessed. Their aim was to measure the impact of motivation to control prejudiced reactions. Testing this they used 42 Swedish students. Implicit ethnic prejudice was assessed by a response latency measure, and a self-report modern prejudice scale was used to assess explicit prejudice. Their results showed an association ( $r = .62, p = < .01$ ) between implicit and explicit attitudes that was observed only when the explicit attitude measure was corrected for motivational bias. These findings are similar to the findings of Nosek (2005) who, in a meta-analysis, found strong indications that implicit and explicit preferences are related and that the relationship varies as a function of the objects assessed.

Other studies where implicit and explicit prejudices have been assessed to work together have been carried out by Devos and Banaji (2005), who investigated in six different conditions the concept of being American. Using explicit test-methods they found people reporting strong commitments to egalitarian principles. When they used implicit measures they found that both white Americans and Americans with an Asian origin were of the opinion that the concept of American equated being white. The African Americans showed no such opinion. The sum of the study still provided evidence that being American implicitly was equated with being white, at least to those who are white. The explicit attitudes expressed no discrepancy between skin colours. Cunningham, Preacher and Banaji (2001) found while testing implicit versus explicit attitudes and prejudices that white Americans on self-report scales showed no prejudice at all towards black Americans. Using the IAT-test the participants in the study showed difficulties in combining black faces with words like good or nice which indicates a different implicit attitude.

The earliest instrument developed for measuring prejudice was the classic prejudice scale founded by Allport in 1954. This scale was to be of use in his work in America in the 1950's. In 1986 McConahay thought the scale to be too explicit as it presented questions like "Immigrants are generally not very intelligent" (Allport, 1954) and developed a new more modern prejudice scale where the questions were somewhat more carefully phrased. Both scales were developed to be of use in a Scandinavian context by Akrami, Ekenhammar and Araya in the year of 2000. Along with the development of the applied prejudice scale the authors acknowledged that racism in Europe and Scandinavia is not a novel concern and also discussed why hot prejudice seems to have disappeared (Akrami, Ekenhammar & Araya, 2000). In the discussion they reached much of the same conclusion Hogg and Vaughan (2002) did and expressed that prejudice does exist, just not as apparent as it might have been in the 1950's when it still was legal to hold racist opinions of people from diverging ethnic backgrounds (Akrami, Ekenhammar & Araya, 2000). As a complement to these two scales where different participant biases may interfere with the results, an implicit association test may be used in an attempt to investigate the participants' true opinions.

### *Police prejudice*

When it comes to the question of racism in the police force few studies focusing on the issue whether police officers are more prejudiced than any other occupational group have been carried out in Sweden. Only a few studies have been conducted in the rest of the world, mainly in Great Britain (Gilbert, Fiske & Lindzey, 1998). Other studies addressing the alleged problem with racist police officers have been carried out, even though this has

not yet been confirmed. An example of this would be Weitzer and Tuch's study of racially biased policing (2005) where they suggested that the dominant race group typically saw the police as allies and therefore found them less prejudiced than other people did. They also found that citizens' personal contacts with the police, especially the negative experiences, influenced the citizens' view of the police.

Paoline III's and Terrill's (2005) study suggested that it is easier for a police officer not to be prejudiced when not meeting the criminal in person. When police officers have to do fieldwork such as looking into cars that might hold suspects, the more prejudiced the police officers are the more apt to examine the car when they are negative to the driver's ethnicity. In their research they found that less prejudiced police officers investigated fewer cars.

In a study by Lindholm, Christianson and Karlsson (1997) civilians and experienced police officers were tested to see who was more inclined to place guilt on a person with diverging ethnicity. Divided into groups they saw two different films where a Swede or a man with southern European looks robbed a grocery store. After the viewing the participants answered questions in regards to the film. It appeared that experienced police officers, when compared to civilians, were less inclined to accuse the person with non-Swedish origin of a crime. Probable causes were discussed in the study, such as the police officers training, lower stress level and less cognitive shortcuts due to their stressful job. Another interesting point in the Lindholm et al. study was that the emotional impact of the robbery was higher when the perpetrator was of non-Swedish origin. Partially, this study will be a minor and somewhat morphed replication of the studies made by Lindholm et al. (1997).

In this study teachers and fire fighters were chosen as comparison groups to the police officers. There are no known previous studies regarding Swedish teachers possible prejudice behavior but teachers are, in their education, inclined to discuss Human Rights, ethics and democracy. The Police Academy presents courses such as "racism, discrimination and disturbing the order" (PHS, 2002). The fire fighters were chosen as comparison due to the fact that they do not have as much theoretical training in democracy and intercultural issues as the police officers and teachers appear to have.

Hence the primary aim of this study is to examine possible prejudice among police officers in comparison to two other occupational groups using explicit questionnaires and IAT-tests in order to find implicit and explicit, and maybe contradictory attitudes. The present study strives for reaching the answers of following questions; Are implicit and explicit measures in agreement with each other when assessing ethnic prejudice and are teachers or fire-fighters any different from police officers in this regard? It is hypothesized that:

*H<sub>1</sub>* The groups means will differ from each other, presumably the police officers will show less prejudice on both tests than the other groups examined.

*H<sub>2</sub>* Implicit and explicit measures correlate and measures attitudes in a similar way.

## Method

### *Participants*

There were 108 respondents to the questionnaire and the IAT-test. Everyone who filled out the questionnaire had undergone the IAT-test beforehand. In all, 70 men and 38 women participated in the experiment. The total age range of all participants reached from 25 to 64 years. 38 police officers (8 women and 30 men, age  $m = 43$ ,  $SD = 12$ ) participated, 36 teachers (29 women and 7 men, age  $m = 42$ ,  $SD = 10$ ), and 34 fire fighters (1 woman and 33 men, age  $m = 40$ ,  $SD = 9$ ).

### *Stimulus materials*

The IAT-test was performed via the computer program E-prime (version 1.1) and consisted of different visual tasks that were to be rapidly responded to. The time-limit that is presented can be explained in such terms that answers given within a time range of 400 to 10.000 milliseconds are used and answers given below or over that range are discarded. Only the left and right arrow-key on the keyboard is used during the entire task. According to Greenwald (1998) the reaction time can be interpreted as strength of association between the different objects. When presenting the results of the IAT-test the reaction times to the categorization tasks are used.

The assumption is that subjects answer more rapidly when the two categories are strongly associated in the mind of the participant. In this particular case an assumption was made that the participants more easily would associate the dangerous objects with the men with non-Swedish origin.

The first task was to evaluate the origin of ten men in ten different pictures presented in no particular order. Five pictures were of men with supposedly typical "Swedish" origin (blond hair and blue eyes) and five pictures were of men with supposedly typical "non-Swedish" origin (dark hair and brown eyes). All in all the pictures looked a lot like the stereotyped pictures used in the forthcoming vignette and can be seen in appendix A. The pictures used were from "A lifespan database of adult facial stimuli" (Minear & Park, 2004).

The following ten pictures were to be categorized as "dangerous" and "non-dangerous" objects. As examples of dangerous objects a large knife and a gun was shown and for the non-dangerous objects a pair of glasses and a shoulder-bag was presented.

After these categorizations of the total of twenty different pictures were made the participants were asked to cross-combine the objects with the men in different tasks. For example non-dangerous objects were to be combined with non-Swedish originated men and the other way around, then the dangerous objects were to be combined with non-Swedish originated men and the other way around. After finishing the computerized task the respondents were asked to fill out the questionnaire.

The introductory questions in the questionnaire were connected to Lindholm et al. (1997) and Lindholm and Christianson's (1998) study where the participants were asked to decide a man's culpability for committing a robbery of a grocery store. The participants read a short vignette (see Appendix A) where they were asked to consider themselves as a witness when a man comes into a store and robs the cashier and also cuts her face with a knife. The participants saw only one of two different pictures of the robbers (see Appendix

A), one with an appearance indicating Swedish origin (blue eyes, blond hair and light skin) and one suggesting non-Swedish origin (brown eyes, dark hair and darker skin). Due to the suggestion of Lindholm et al. (1998) research there would be a difference in answers on the questions in regards of whether the participant saw the picture of the Swedish male as opposed to the picture of the non-Swedish male.

The first question following the vignette was what the emotional impact of the story was like. On this question, as in the following questions in the questionnaire a Likert scale was used. In this question it had seven possibilities ranging from “very positive” (1) to very negative (7). The authenticity of the story was asked about next where a 1 indicated “not at all” and an 11 “very much. The following question, if the participant could picture him- or herself in this scenario, a 1 indicated “not at all” and an 11 “yes, very much so. The last question used from the study by Lindholm et al. (1997) was whether the robber was behaving violently (1 “not at all” to 11 “very much so”).

The self-report attitude questionnaire continued with questions regarding explicit prejudice from the Allport (1954) and McConahay (1986) scales. It contained questions such as “Immigrants do not keep their homes tidy”, as an example of the *classic prejudice scale*, used in USA by Allport (1954) (see appendix B) were  $\alpha = .71$  in Akrami and Ekenhammar’s (2000) study in regards to developing a scale for measuring attitudes towards immigrants in a Scandinavian context. “Racist groups are no longer a threat toward immigrants” was also asked as an example of the *modern prejudice scale*, the McConahay (1984) alteration of the, in her opinion, blunt classical prejudice scale (see appendix B) were  $\alpha = .83$  in Akrami and Ekenhammar’s (2000) study. Both scales were translated and used by Akrami and Ekenhammar (2000) who found a high correlation between the two different scales in their study ( $r = .62$ ). The items were randomly ordered, classical and modern items mixed and a few of the items were reversed. Responses to all items were given on a 5-point scale ranging from strongly disagree (1) to strongly agree (5).

### *Procedure*

The participants were contacted differently depending on their occupational group. The teachers tested in the laboratory were asked by their supervisors to take the test and the teachers not tested in the laboratory were out teaching on schools and asked by the principal if they were willing to participate. The police officers were organized by a central supervisor in Malmö, Scania and so were the firemen.

Some of the teachers were tested in a laboratory while others were tested at different schools in the southern part of Sweden called Scania. The police officers were tested in three cities in Scania. Due to the officers’ somewhat ad hoc working schedule they were tested one after another in small offices in their work area and so were the fire fighters who were tested in two cities in Scania.

When the participants arrived to the set they got as little information as possible about the test and instead were handed the questionnaire that on the front page had instructions of how the test was supposed to be conducted. They were asked to read the instructions carefully and then start with the computerized test. After they had finished the IAT they were asked to move on to the questionnaire and answer the questions. The front-page instructions said that anyone who agreed to take the computerized test and filling out the questionnaire also agreed to their answers being used for further research. Participants were

assured of complete confidentiality. When both tests were finished the participants were debriefed and were allowed to ask any questions they might have. Finally the participants were asked not to speak about the test questions with their colleagues.

## Results

### *Implicit association test*

The IAT-test of the three occupational groups regarding their attitudes towards people with different ethnicity than Swedish showed no significant differences ( $p = .33$ ) between the groups (see Table 1). Still the test presented a tendency where the police officers showed lower mean values than the comparison groups. As can be seen in figure 1 the confidence interval show that the police officers have the combined scores closest to the middle of the scale. The absolute values smaller than .15 indicate little or no association between a non-Swede and a weapon, values between .15 and .35 weak association, those between .35 and .65 as moderate association, and those greater than .65 a strong association. The higher values indicate more of a willingness to connect a weapon with a person with non-Swedish origin.

Table 1.

*The mean values and differences between groups for the implicit and explicit tests regarding police officers', fire-fighters' and teachers' prejudices.*

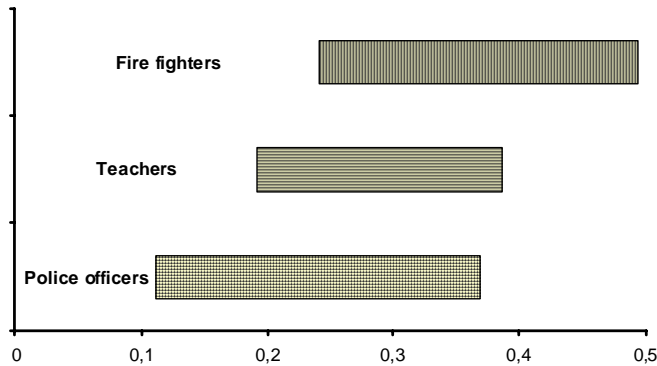
	Police officers <i>n</i> =38		Fire-fighters <i>n</i> =38		Teachers <i>n</i> =38		<i>F</i>
	<i>m</i>	<i>SD</i>	<i>m</i>	<i>SD</i>	<i>m</i>	<i>SD</i>	
IAT	0.24	0.40	0.37	0.36	0.29	0.29	1.13
Lindholm "Emotional impact" (1 pos., 7 neg.)	5.19	1.06	6.0	1.15	5.78	1.1	5.10**
Lindholm "Imagining oneself in the scenario" (1 not at all, 11 yes, very much)	8.76	1.97	8.0	2.52	6.78	2.80	6.64**
Classical Prejudice Scale Index	2.06	0.68	2.51	0.72	1.84	0.56	9.46**
Modern Prejudice Scale Index	2.49	0.61	2.74	0.60	1.91	0.58	17.89* *

Note. \*\* =  $p < .01$

An inspection of Figure 2 shows is a more detailed figure compared to Figure 1 and shows the total spread of the IAT-test where the *reverse* axis indicates the combination of a person with a Swedish origin with a weapon to a stronger degree than the other way around. As can be seen in this figure the ability to do so is very slim, which is an indication that the IAT has good validity since the hypothesis of the IAT-construct is that people who are Swedish have a tendency to easier connect non-Swedes with a weapon. The police

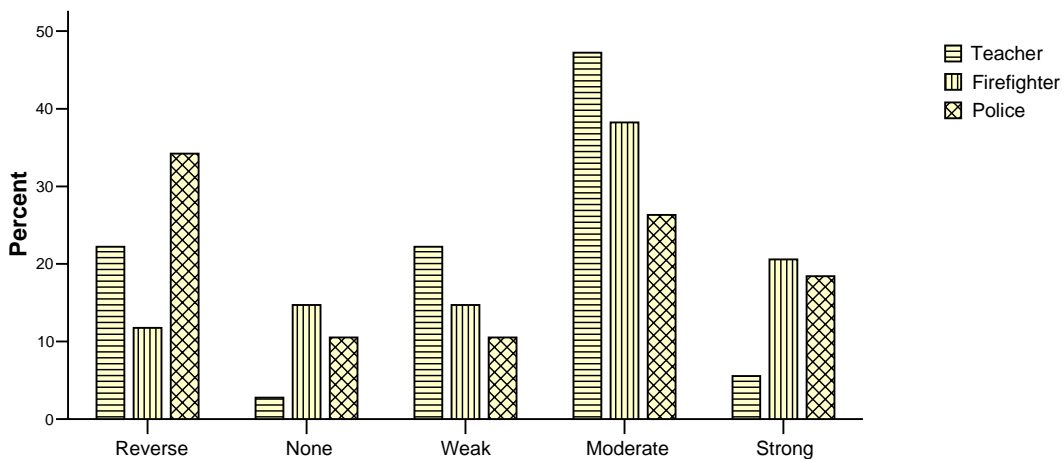


officers were the occupational group who had the highest scores on the reversed axis, which indicates the fact that they, easier than the other groups, combine a person with a Swedish origin with a weapon.



*Fig. 1*

With 95 % confidence interval for means, the levels of association between a weapon and a person with a non-Swedish origin where the values closest to a zero mean less association and the higher values mean more.



*Fig. 2*

Level of association regarding a non-Swede and a weapon in a more specific way than Fig.1. This figure also shows the values of the reverse axis, where the willingness to associate a Swedish looking person with a weapon is greater.

*Explicit measurements*

Two-way between groups analysis' of variance were conducted to assess the introductory questions based on Lindholm et al's (1997) and Lindholm and Christianson's (1998) studies concerning whether different groups view people with Swedish or non-Swedish origin differently. In regards to the possible emotional impact of the robber on the "witness" (the role the participants were asked to take) there was a statistically significant

main effect for the occupational groups (see Table 1). Post-hoc comparisons using the Bonferroni test showed that the emotional impact for the police officers was significantly lower than for the fire fighters. The main effect for the ethnicity of the robber and the interaction effect did not reach statistical significance.

Regarding the question of authenticity of the robbery-vignette there was a statistically significant main effect for the perpetrator's ethnical origin  $F(1,102) = 4.65$   $p < .05$ . The credibility of the story was higher when the perpetrator was of Swedish origin (total  $m = 9.04$   $SD = 1.87$ ) than when the perpetrator was of Non-Swedish origin (total  $m = 8.24$   $SD = 2.31$ ). The occupational groups did not differ from each other and there was no statistically significant interaction effect. All in all, the groups together found the robber with a Swedish origin more culpable to commit a crime than the person with non-Swedish looks.

The following question (if the participant could imagine him- or herself in the scenario) had a statistical significance for the occupational grouping variable (see table 1). Post-hoc comparisons using the Bonferroni test indicated that the mean score for the police officers differed from the mean score of the teachers. The police officers' higher mean indicated that they were more inclined to believe they would find themselves as a witness during a robbery. There were no statistical significant differences between the groups concerning neither the robber's origin nor an interaction effect.

The last of the Lindholm et al. questions was whether the robber was acting violently or not showed no significance in any of the conditions.

As the explicit questionnaire continued Allport's classical scale of measuring prejudice and McConahay's modern scale was used by asking the questions Akrami, Ekenhammar and Araya (2000) developed for a Scandinavian context. To be able to visually compare the two scales an index calculation was made. The relationship between the two scales was investigated using Pearson's product moment correlation coefficient. A strong positive correlation between the two scales (measured as index-calculations, that is all questions of the scale combined,  $r = .66$   $p < .01$ ) was found.

#### *Classical scale measurements*

A one-way between groups analysis of variance was conducted to explore whether there were any differences between the occupational groups regarding prejudice. The calculation of the index value of the classical prejudice scale showed a statistical significant variance in prejudice between the groups. Crucially the police officers and teachers showed significantly lower prejudices than the fire fighters did. When assessing the classical scale item by item there was a trend for the police officers to be placed in the middle of the comparison groups which differed significantly on all questions where significance was to be found (for a more detailed inspection, see appendix B).

#### *Modern scale measurements*

In regard to the index value of the modern prejudice scale a one-way between groups analysis of variance was made and there was a significant difference between the three occupational groups. Regarding the index calculation the police officers and fire fighters did not differ significantly from each other while the teachers differed from both other groups showing significantly lower prejudice. When considering the items one by one there was, just as in the classical scale calculation, a trend where the police officers' values

where in the middle of the three groups (for a more detailed inspection, see appendix B). In these modern scale measurements, the teachers' values were representing the lowest prejudice and the fire-fighters constantly showing the highest values.

#### *Possible gender differences*

According to Lindholm et al, (1998) study, an independent-samples *t*-test revealed that in this study, male participants ( $m=8.23$ ,  $SD=2.49$ ) were significant more inclined to imagine themselves in the robbery-scenario than females ( $m=7.18$ ,  $SD=2.59$ ) were,  $t(106)=2.06$ ,  $p<.05$ . A calculation of the modern scale index showed that that males ( $m=2.56$ ,  $SD=0.62$ ) were significant more prejudiced in comparison with females ( $m=2.04$ ,  $SD=0.68$ ),  $t(106)=3.99$ ,  $p<.00$ . Regarding IAT scores and the classical prejudice scale index, no gender differences were found.

#### *Implicit versus explicit measurements*

In regard to the hypothesis whether explicit and implicit measurements indeed do measure the same thing, in this case prejudice and attitudes, a correlation calculation was made. The correlation showed no significant variations when assessing the total of all groups in the IAT and the classical scale ( $r = .06$ ) nor the IAT and the modern scale ( $r = .07$ ). When assessing the groups one by one a small tendency to correlation could be found in regard to the fire fighters and the modern scale ( $r = .28$ ,  $p = .11$ ) but it was very small, hardly worth any further discussion.

## Discussion

In 1954 Allport concluded that prejudice is hard to measure. Devine (1995) commented on the difficulties to get people to answer how they *really* feel and posed the question if prejudice is possible to measure correctly at all. Several other researchers are in agreement with her opinions (e.g. Greenwald and Banaji, 1995). This study does not claim to answer the question whether it can be done but fairly unanimous tendencies are to be found in the research.

The aim of this study was to examine whether implicit and explicit measures are in agreement with each other when assessing ethnic prejudice and if police officers, who sometimes are accused of being racist, are any different than other occupational groups in this regard. The results of the study suggests that implicit and explicit methods of measuring ethnic prejudice are not in agreement with each other due to a very low, not to say non-existent, correlation between them. Neither did any results show anything other than a tendency that police officers are a bit more prejudiced than teachers and less prejudiced than fire fighters in an explicit measure while the IAT-test indicated that police officers were the least prejudiced of the occupational groups examined.

The IAT-test did not give any significant results, only indications regarding differences between the groups. The police officers turned out to be the least prejudiced on the IAT and were also the group most inclined to combine the person with Swedish origin to a weapon. The IAT measure is despite the fact it did not show significant results still interesting in retrospect of the fact that the explicit scale did show significant differences between the groups. This finding does propose that the explicit questionnaire and the IAT do not measure the same prejudice or maybe they just measure things on different levels of

consciousness? Even so, the fire fighters were the most prejudiced occupational group in the IAT comparison as they were in the explicit questionnaire which indicates that there might be a connection between implicit and explicit attitudes after all even though no correlation was found in this study. Several studies presented earlier, for example Nosek's meta-analysis (2005) and Akrami and Ekenhammar's (2005) study where motivational biases were corrected, a correlation between explicit and implicit measures was found. Even though this study could not present a correlation there might be one that went unnoticed or just did not appear in this context. Bluemke and Friese (2006) found that different types of stimuli might influence the IAT-test, which could have been an issue in this research.

Devos and Banaji (2005) got different answers when examining whether American equaled white. They found that it did on the implicit test and that it did not on the explicit test. Cunningham, Preacher and Banaji (2001) also got contradictory answers using explicit and implicit measuring combined when they were assessing prejudice among white and black Americans. This study also got different outcomes but then again, is that an indication that one of the tests does *not* measure prejudice and the other one does? Or is it that both explicit and implicit measures are needed to get a thorough assessment of prejudice among people? Are motivational biases on the explicit test in the way of getting honest answers? Further research on this issue is needed.

One thing that is crucial to this study is that it provides more validity to the IAT-test. As the results show, more answers were on the right hand of the scale indicating that Swedes have a stronger association between people with non-Swedish origin and a weapon than not, exactly as Greenwald (1998) predicted.

The part of the study based on Lindholm et al.'s (1997) and Lindholm and Christiansson's (1998) studies presented interesting results, especially when it came to the culpability of the robber. The participants of this study answered that the ability to commit a crime was higher when the robber was of Swedish origin. Crucially, due to the fact that the police officers and the comparison groups did not differ and the fact that they all found the reliability of the vignette to be higher when the robber was of Swedish origin, these results pointed in the direction of non-prejudiced police officers, at least not in an ethnocentric way but then again, none of the groups were.

The narrative of the robbery had a greater emotional impact on the fire-fighters than on the police officers. When Lindholm et al. (1997) commented on the emotional impact of their narrative they suggested that maybe police officers are more used to stressful situations and therefore do not find the situation emotionally challenging but that is only a suggestion in this observation. The replication of the rest of the study did not show any different results than the original studies but did not either give a strong indication that any of the comparison groups were far more prejudiced than any other, at least not in the way the rest of the explicit questionnaires suggested.

In regards to the explicit scale the teachers' answers consequently were low values and the fire fighters high values which according to Akrami, Ekenhammar and Araya (2000) give an idea about higher frequencies of prejudice toward people with different ethnicity among the fire fighters. The police officers' answers consequently placed them in the middle of the two comparison groups. These findings suggest that there is a difference in how the three different occupational groups view people with non-Swedish origin. The

findings also suggest that police officers are not the most prejudiced group. In this discussion another aspect of the participants must be highlighted. While the police officers and fire fighters mainly were men with just a few exceptions the group of teachers were women with few exceptions. The independent-samples *t*-test suggested a difference between males and females in one of the four Lindholm et al. questions and also on the modern index scale. It should be taken into consideration whether the results of the teachers depended on their occupation or their sex and that is an interesting question that needs to be further investigated.

Greenwald and Banaji (1995) previously have suggested that people do not answer true to heart in an explicit questionnaire due to their wishes and desires to be accepted by people close to them. The authors also discuss the possibility that people might not be able to give truthful answers since they might be oblivious to their implicit prejudices. Anyhow, this fact might have been an important factor when answering the explicit questionnaire. The results from the study made by Crosby, Bromley & Saxe, 1980, suggesting that people strive to be politically correct might be applicable in this context even though the participants might not be explicitly aware of it.

When assessing the classic and the modern explicit scale a consistent trend was noticed. The fire fighters showed the highest values which as earlier stated indicate the highest prejudice while the teachers showed the lowest and the police officers was to be found in the middle of the two comparison groups. No items were modeled in any other way, the only differences that were to be found were whether or not there were statistically significant differences between the groups. The fire fighters and the teachers differed significantly on all questions on the explicit questionnaire. The police differed from the teachers by having higher values only on a few items and from the fire fighters by having lower values on a few. This trend can be read as an indication that police officers are not the least prejudiced occupational group but not the most either. Weitzer and Tuch (2005) did conclude that the dominant race groups see the police as allies but this research indicates that others should also feel free to do so.

A possible limitation of this study was the composition of the groups where both the fire fighters and the police officers were male dominated groups while the group of teachers mostly contained women. The three groups were assembled on behalf of measuring the prejudice of the Swedish police so that the two groups, apart from the police officers, are to be seen as control groups, one with democracy-educated women and one with men with no democratic education and this may have influenced the results. Other limitations were the obvious instruments of measuring prejudice that, although researched and tested, perhaps cannot capture the absolute and real attitude of a person (Greenwald and Banaji, 1995). There is also a limitation to the IAT-test due to the comparison of people with different origin and if they are accustomed to dangerous objects. The police officers presumably are more accustomed to weapons than a fire fighter and a teacher that might have affected the test just like Lindholm et al. (1997) predicted. The conditions were not the same for the three occupational groups. While some of the teachers were tested in the laboratory the rest of the participants were tested one by one in their workplace. With jobs like fire fighting, policing and teaching it is hard for an employee to sit down and completely relax to focus on the assignment at hand.

As commented on in the introduction there are a lot of ways to teach police officers not to be prejudiced but little evidence suggest that they really are. This study shows no support for the “common knowledge” in the media and among themselves that the Swedish police are prejudiced or that there is a special need for seminaries or workshops on the subject. Of course, that can be overturned to say that on behalf of the studies and seminaries the police are not as prejudiced as they could be if they had not attended them. This would be interesting to keep investigating. Are the Swedish police not prejudiced and in no need of seminaries and workshops or are the Swedish police not prejudiced thanks to the efforts that have been made sending them to seminaries and workshops? In the explicit questionnaire all groups seemed pretty decided that people with a non-Swedish origin get too much attention in the media. This would be another interesting aspect to research further. The question whether the male and female dominated groups gave differing answers because of their sex would also be interesting to investigate further.

The hypothesis suggested that the police were the ones to have the least prejudice and the results show an indication that it might very well be so. The IAT-scores show the police officers as the most low-prejudiced occupational group while they in the explicit test showed higher values than teachers, but not as high as the fire-fighters. The problem specific for the police (as for the teachers) is the need for them to make the snap decisions with no time to consciously debate whether their decision is based on antipathy for the person due to his or her ethnic origin, but then again, the police showed good outcome in the tests so there probably is nothing to worry about.

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## Appendix A

Down below a tale of a robbery follows, please read it carefully and then answer the questions that follow.

The staging is a small convenience store. Shopping carts are placed by the entrance.. The store is divided in different sections with shelves. The isles are narrow and you can only see certain parts of the store at any given time. Directly to the left of the entrance an older male costumer is choosing among the bread. Just a little bit ahead is the meat counter and across the store a blond woman can be seen. Down the isle the groceries are located and further down in the corner of the store the vegetables are placed. A woman with long blond hair is standing in front, by the cash register. She picks up the items from her basket while she is speaking with the cashier who is a young man. The conversation is light and they are laughing a lot. The woman pays, gets her change back, but changes her mind and turns around, still speaking with the cashier, to look at some flowers that are placed on the side of the cash register. Suddenly a man (see picture) appears through the entrance and takes a short cut directly to the cash register. He is wearing a black leather jacket, blue jeans and a pair of black gloves. When he approaches the cash register he pulls out a big knife and wields it threatening towards both the customers and the cashier. The cashier and the man are screaming at each other. The man with the knife leans towards the cash register and tries to take the money and at the same time the cashier tries to stop him by grabbing his arm. The robber pulls himself loose, cuts the cashier in the face with his knife and takes the money from the cash register. The robber then turns towards the female customer and screams at her and at the same time waves the knife around. The cashier rises and holds his hands in front of his bleeding face. The robber runs out of the store. The female customer runs after but turns around by the door and instead runs to the cashier to see how he is doing.



a) Swedish male



b) non-Swedish male

## Appendix B

*Mean values and standard deviations for police officers', fire-fighters' and teachers' attitudes concerning people with different ethnicity than Swedish. The values are calculated on a Likert scale where the numbers range from 1-5 and a five represent a high frequency of prejudice and a one low. Questions 1-8 are from the Classical Prejudice Scale and 9-17 from the Modern.*

Questions		Police officers <i>n</i> =38		Fire-fighters <i>n</i> =34		Teachers <i>n</i> =36		
		<i>m</i> 1	<i>SD</i>	<i>m</i> 2	<i>SD</i>	<i>m</i> 3	<i>SD</i>	<i>F</i>
<i>Classic Prejudice scale</i>								
1.	Placement of camps	2.00	0.87	2.41	1.10	1.81	1.01	3.37*
2.	Tidied homes	1.78	0.83	2.24	0.97	1.44	0.82	7.06**
3.	Personal hygiene	1.69	0.82	1.94	0.92	1.46	0.74	2.93
4.	Honesty	2.57	1.04	3.03	0.98	2.11	1.12	6.60*
5.	Moral code	2.73	1.02	3.00	1.03	2.46	1.04	2.37
6.	Intelligence	1.53	0.8	2.06	0.93	1.47	0.84	4.92*
7.	Integration	1.92	0.88	2.53	1.08	1.50	0.74	11.37**
8.	Oppression of women	2.69	1.09	3.27	1.07	2.67	1.04	3.49*
Index Classic Scale		2.06	0.68	2,51	0.72	1.84	0.56	9.46**
<i>Modern Prejudice-scale</i>								
9.	Discrimination	2.16	1.00	2.21	1.05	1.58	0.97	4.26*
10.	Unemployment	2.05	1.04	2.35	0.95	1.63	0.87	4,9**
11.	Racist threat	1.92	0.91	2.18	1.00	1.42	0.73	6.7**
12.	Equal rights	2.71	1.21	2.82	1.06	2.20	1.24	2.91
13.	Media attention	3.63	0.82	3.74	1.02	3.14	0.94	4.06*
14.	Demanding	2.53	1.01	2.85	0.89	1.94	1.04	7.71**
15.	Bilingualism in schools	3.29	1.23	3.50	1.33	1.67	1.04	24.81**
16.	Job opportunities	1.92	1.08	2.47	1.13	1.97	0.97	2.87
17.	Multiculture	2.24	1.00	2.62	1.18	1.75	0.84	6.47**
Index Modern Scale		2.49	0.61	2.74	0.60	1.91	0.58	17.89**

Note. \* =  $p < .05$ , \*\* =  $p < .01$