Individual Differences in the Activation of Racial Attitudes: The Relationship between Implicit Prejudice and the Propensity to Stereotype

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INDIVIDUAL DIFFERENCES IN THE ACTIVATION OF RACIAL ATTITUDES: THE RELATIONSHIP BETWEEN IMPLICIT PREJUDICE AND THE PROPENSITY TO STEREOTYPE

A Thesis
Presented to
The Faculty of the Department of Psychology
The College of William & Mary

In Partial Fulfillment
Of the Requirements for the Degree of
Masters of Arts

by
William A. Cunningham
1998
APPROVAL SHEET

This thesis is submitted in partial fulfillment of the requirements for the degree of

Master of Arts

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Approved, May 1998

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Individual Differences in the Activation of Racial Attitudes: The Relationship Between Implicit Prejudice and The Propensity to Stereotype

William A. Cunningham

College of William & Mary
Abstract

This study investigated individual differences in implicit prejudice. These differences in implicit prejudice were theorized to be related to a Propensity to Think Stereotypically. One hundred eleven participants completed several questionnaires to measure explicit prejudice, cognitive miser tendencies, and Protestant Work-Ethic values. After completing the questionnaires, participants completed the Implicit Association Test (IAT) to measure implicit prejudice using race and positivity/negativity as categories. The IAT is designed to measure the degree to with two categories are related in implicit memory. Analyses were conducted using a series of 2-Level Hierarchical Linear Models. Results suggest that there are individual differences in implicit prejudice, and that these differences were related to a Propensity to Think Stereotypically.
Individual Differences in the Activation of Racial Attitudes: The Relationship Between Implicit Prejudice and The Propensity to Stereotype

This study had two objectives. The first was to investigate individual differences in the implicit, automatic processes of White prejudice toward African-Americans. The second was to explore how these differences in implicit cognition are related to a cognitive set hypothesized to be related to a propensity to think stereotypically.

Traditionally, psychologists seem to have assumed that stereotyping and prejudice were the result of conscious processing. By definition, people were aware of their racial attitudes and research investigated the conscious motivational and personality correlates of prejudice (Adorno, Frenkel-Brenswick, Levinson, & Sanford, 1950). As America has moved toward racial equality, such overt racism toward African-Americans has drastically declined (Dovidio & Gaertner, 1986). As it is not, in general, socially nor legally acceptable to hold racial prejudices in this country, people are much less likely to make openly discriminatory comments as they would thirty years ago.
Three studies, from 1933 to 1969, investigated this change in the African-American stereotype. These studies collectively have been referred to as the Princeton Trilogy. Participants indicated whether traits on a list were typical of African-Americans, after which they chose five traits that were most typical of African-Americans. The same procedure and list of stimulus words were used for each of the studies. These studies found that the self-report of negative African-American stereotypes has declined since the 1930s (Katz & Braly, 1933; Gilbert, 1951; Karlins, Coffman, & Walters, 1969).

Although self-reported prejudice has declined, people have continued to discriminate in more subtle, symbolic ways (McConahay, Hardee, & Batts, 1981). This discrepancy between expressed racial attitudes and discriminatory behavior may be explained by considering the implicit, unconscious mechanisms involved in stereotyping and prejudice (Banaji & Greenwald, 1994). Research on implicit, unconscious prejudice has shown that such attitudes operate automatically. “Implicit cognition is... not remembered in the usual sense - that is, it is unavailable to self-report or introspection (Greenwald & Banaji, 1995).” Although these cognitive processes are
unavailable to consciousness, they influence conscious perceptions and may bias behavior without perceiver awareness. For example, White-Americans, regardless of conscious egalitarian beliefs, may judge African-American job candidates as being less qualified than similarly qualified White candidates (McConahay, 1983), or perceive African-Americans more likely to be criminals than White-Americans (Walsh, Banaji, & Greenwald, 1998).

Some researchers have suggested that stereotypes and prejudice are adaptive processes (Fox, 1992). Stereotypes may be adaptive because they allow people to simplify and categorize their external world automatically. Stereotyping is the attribution of group characteristics to an individual member of the group (Hamilton & Sherman, 1994). Stereotypes simplify the world by allowing people to have preconceptions about other individuals. People can assume that individuals belonging to groups will not only hold certain traits and beliefs but will behave in expected ways in various situations. People need the assistance provided by such categories because of the overwhelming number of stimuli that people are exposed to each moment.
Prejudice functions to favor in-groups and derogate out-groups. The minimal group paradigm has demonstrated that prejudice can be created in the absence of "real" groups (Billig & Tajfel, 1971; Brewer, 1979). The mere labeling of people into groups creates in-group favoritism and out-group derogation (Ferguson & Kelly, 1964). Purdue, Dovidio, Gurtman, and Tyler (1990) demonstrated that this process occurs automatically. Due to the automaticity of these effects, researchers have come to believe that stereotyping and prejudice are the inevitable consequences of categorization processes (Hamilton, 1979).

Automatic racial bias has been found using reaction time measures. When a concept has been activated in semantic memory, subsequent related concepts are activated more quickly than concepts that are unrelated (Meyer & Schaneveldt, 1971). In addition, research has demonstrated that the stronger the association between concepts in semantic memory, the shorter the response latency for recognition of a second concept (Fazio, Sanbonmatsu, Powell, & Kardes, 1986).

Gaertner and McLaughlin (1983) demonstrated that racial labels (Black, White) automatically activate information about racial groups. Participants were
presented two letter strings and indicated whether both of the letter strings were words by pressing a key. One key was designated "YES" and another "NO." In trials that contained two words, one of the words was a racial label, and the other was a word that had either a positive or negative connotation. They found that pairs in which positive words were paired with the word "WHITE" had shorter response latencies than pairs in which positive words were paired with "BLACK." There were no differences for the negative words. This pattern was found for participants who reported high and who reported low prejudice on Woodmansee and Cook's (1967) inventory.

Dovidio, Evans, and Tyler (1986) found that Black racial labels, relative to White racial labels, activated negative information, whereas White racial labels, relative to Black racial labels, activated positive information. In addition, they found that White labels activated traits that were associated with the White cultural stereotype, and Black labels activated traits that were associated with the Black cultural stereotype.

Traditionally, researchers have believed that all people share the automatic component of prejudice. A prejudiced culture ingrains these beliefs into people
before they can consciously question them. "Stereotypic beliefs are acquired through socialization, media influences, and the like, and are maintained by social reinforcement obtained from significant others and important reference groups" (Hamilton & Trolier, 1986).

Devine (1989) questioned the inevitability of prejudice and proposed a dual-process model of prejudice. Within her model, prejudice consists of two independent cognitive components: the automatic and the controlled. She suggested that although all people share the automatic component of prejudice, individual differences in prejudice may exist in the extent to which people counter automatic stereotypes using controlled processing. To demonstrate that people, regardless of explicit prejudice, were equally knowledgeable of cultural stereotypes, Devine (1989, study 1) had participants of differing levels of explicit prejudice list the contents of the cultural stereotype of African-Americans. She informed participants that she was not interested in their personal belief but in the cultural stereotype. Explicit prejudice was measured with the Modern Racism Scale (McConahay, 1986), and participants were assigned to the high or low explicit prejudice group based on a median split. High
and low prejudice participants did not differ in the lists they provided. From this, she concluded that all people are equally knowledgeable of cultural stereotypes.

To demonstrate that people shared the automatic component of stereotyping, participants were presented with words subliminally in their parafoveal visual field (Devine, 1989, study 2). Two lists of primes were created. Either 80% or 20% of the primes were associated with the African-American stereotype (Blacks, nigger, poor, Harlem, athletic, ghetto). When constructing the list, she was careful not to include the word hostility or a word related to hostility. Presumably, the subliminal presentation of words stereotypically associated with African-Americans would activate the African-American stereotype, and thus the unprimed concept of hostility.

After this priming task, participants read a passage about a person engaging in various behaviors and then rated him on various characteristics, one of which was hostility. She found that participants who were primed with 80% African-American primes rated the person as more hostile than did those who received 20% African-American primes.

Interestingly, this evaluation was similar for both high- and low-prejudiced participants. All people
activated the same stereotype to the same degree. In a later experiment, Devine (1989, study 3) had participants list their thoughts about African-Americans. She found that high prejudiced participants were more likely to report negative thoughts about African-Americans than low prejudiced participants.

Based on these experiments, Devine (1989) proposed the dissociation theory of prejudice. Although all people have the same automatic stereotyping process, people with different levels of explicit prejudice differ in the processes that follow activation. Whereas high prejudiced believe their stereotypes are accurate and do not correct for them, low prejudiced people do not believe their stereotypes are accurate and modify them with more egalitarian beliefs.

Recent studies have questioned the uniformity of the automatic component of prejudice and have suggested that there are individual differences in stereotype activation. Lepore and Brown (1997) argue that Devine (1989) primed participants with the content of the racial stereotypes rather than the racial category. These primes (poor, Ghetto, etc.) may have activated the concept of hostility without group stereotype activation. In addition, Devine
(1989) used a race non-specific target. Many participants may have assumed this person to be congruent with their own race. Lepore and Brown (1997) conducted a conceptual replication of Devine (1989) using only group-relevant priming stimuli (Blacks, afro, colored). Participants high and low in prejudice, as measured by a median split on an attitude scale developed by the researchers, differed in their perceptions of the target person. High prejudiced participants perceived the target person less favorably than low prejudiced participants.

Fazio, Jackson, Dunton, and Williams (1995) suggest that there are stable individual differences in both the automatic and the controlled processes of prejudice. Automatic processes are related to the strength of the racial attitude, and controlled processes are related to the motivation to control prejudiced responses. Fazio et al. (1995) used a semantic priming task to measure individual differences in the automatic process of prejudice. Participants were presented with a picture of a White, African-American, Hispanic, or Asian face and then a word that had either a negative or positive connotation. Participants were told that the study was investigating people’s ability to do two things
simultaneously and were told to remember the pictures for a later part of the study. Participants indicated the connotation of the words by pressing one key for positive words and another key for negative words. Automatic prejudice was operationalized as the extent to which White pictures facilitated recognition of positive words and Black pictures facilitated recognition of negative words. By subtracting reaction times from WHITE-POSITIVE and BLACK-NEGATIVE trials from BLACK-POSTIVE and WHITE-NEGATIVE trials, an unobtrusive, automatic prejudice score was calculated.

After completing the priming procedure, participants interacted with an African-American experimenter who rated the participant on friendliness to her. Fazio, et al. (1995, study 1) found that this unobtrusive measure predicted the friendliness of the participant with the experimenter better than an explicit measure of prejudice, the Modern Racism Scale. Participants with lower levels of automatic prejudice, as measured by the unobtrusive test, acted more friendly toward the experimenter than participants with higher levels of automatic prejudice. They also found that Blacks and Whites differed in their unobtrusive ratings. White participants evaluated
African-Americans more negatively in the priming task than African-American participants did.

Wittenbrink, Judd, and Park (1997) conducted a similar study of implicit prejudice. Participants evaluated strings of letters by indicating whether the strings were words or not. Some of the letter strings were words that had positive or negative connotations and that were related either to the African-American or White-American stereotype. Preceding the letter string, the word “BLACK” or “WHITE” was presented subliminally. Wittenbrink et al. calculated an implicit prejudice score similar to that of Fazio et al. (1995). They found that these prejudice scores were correlated with explicit measures of prejudice (Modern Racism, $r = .41$; Pro-Black, $r = - .33$; Anti-Black, $r = .17$).

MEASUREMENT OF EXPLICIT ATTITUDES ASSUMED TO BE ASSOCIATED TO IMPLICIT PREJUDICE

Several constructs have been theorized to be covariates of individual differences in implicit racial prejudice. These factors are: the extent to which someone holds explicitly prejudiced beliefs thus favoring in-groups and derogating out-groups (racism factor), the extent to which someone relies on categorizes to organize their stimuli (the
cognitive miser factor), and the extent to which people believe that African-Americans have equal opportunities and are, therefore, responsible for their current circumstances because of laziness (Protestant Work-Ethic factor). Collectively, these constructs may be thought of as a Propensity to Think Stereotypically.

The first factor hypothesized to be related to implicit, automatic prejudice is explicit racism. The study of explicit racism has changed recently. Unlike old-fashioned racism ("Black people are not as smart as whites"), racism may now exist in more symbolic forms. Gaertner and Dovidio (1986) suggest that unconscious prejudice can coexist with modern egalitarian values. People who simultaneously hold these beliefs are Aversive Racists. "Aversive racists sympathize with victims of past injustice... but, almost unavoidably, possess negative feelings about Blacks." Whereas old-fashioned racists express themselves through hate, aversive racists are motivated to avoid Blacks, feeling discomfort when faced with them.

McConahay (1986) discussed this symbolic form of racism as Modern Racism. Modern racists believe that 1.) Discrimination no longer exists because of new opportunities
for Blacks 2.) Blacks are too pushy in their pursuit of equality 3.) Blacks are demanding too much and being unfair 4.) Therefore, the gains that Blacks are getting are undeserved and unfair. McConahay (1986) developed the widely used Modern Racism Scale to measure this cognitive component of prejudice. Differences in Modern Racism have been related to discriminatory behaviors such as racist voting and busing preferences (McConahay, 1982).

The ambivalence theory of prejudice describes another important way that White-Americans can hold explicit beliefs about African-Americans. Katz and Hass (1988) suggest that Whites simultaneously hold positive and negative views about African-Americans. People develop cultural negative beliefs that relate to African-Americans. Nonetheless, because of a belief in egalitarianism, people also develop positive views of African-Americans. Just as negative beliefs about African-Americans should be related to implicit prejudice, positive beliefs about African-Americans should be related.

The second factor that relates to implicit prejudice is the extent to which someone is a cognitive miser. Some current models of social cognition suggest that people are "cognitive misers:" people conserve their valuable cognitive resources and are willing to exert cognitive effort only
Personality and Implicit Prejudice

when necessary (Fiske & Taylor, 1991). Recently, research has suggested that there are individual differences in the extent to which people are cognitive misers (Kruglanski & Webster, 1996; Neuberg & Newsom, 1993). Cognitive misers avoid effortful thinking and require cognitive closure and structure in their world. Presumably, implicit stereotypes provide this structure without exerting much cognitive effort. Stereotyping allows perceivers to judge individuals using heuristics about groups. Stereotypes provide a lot of information with little effort (Anderson & Klatzky, 1987). Thus, people who have a higher desire for structure and closure should behave more stereotypically. Nueberg and Newson (1993) found that people who were rated as having greater Personal Need for Structure gender stereotyped more than people who were rated as having lower Personal Need for Structure.

The third factor relating to implicit prejudice is a belief in a Protestant Work Ethic. Katz, Wackenhut, and Hass (1986) argue that Americans are faced with a conflict in values. Americans simultaneously are taught to value egalitarianism and individualism. Within this context, egalitarianism consists of beliefs in democracy and humanitarianism, whereas individualism consists of beliefs
in personal freedom, devotion to work, and achievement. Katz et al. (1986) suggest that egalitarianism is related to pro-black sentiment, whereas individualism is related to anti-black sentiment. An egalitarian individual strives for social justice, racial equality, and the correction of past injustice. Egalitarians view the inequities in race as a social problem that must be combated. In contrast, people who value individualism (or a Protestant Work Ethic) value self-reliance and responsibility for one’s condition and believe that the inequities between the races stem from a lack of ambition. They believe that hard work, not social programs, will alleviate the differences between African-Americans and White-Americans. They attribute problems of African-Americans to character flaws and personality shortcomings within individuals rather than to the effects of the environment. They view African-Americans as lazy and as deserving of their lower status, not as victims of centuries of racist thinking and lack of opportunity.

An additional construct that should be related to implicit prejudice is authoritarianism (Adorno, Frenkel-Brunswik, Levinson, & Sanford, 1950). Within this context, prejudice is understood as a personality disorder rooted childhood abuse. People who were authoritarian are
conceptualized to have a rigid adherence to conventional values, and a need to identify with and submit to authority (McFarland, Ageyev, & Abalakina-Paap, 1992). These personality variables result in hostility toward groups that are different than the person’s in-group. Research has demonstrated that authoritarianism is related to in-group favoritism and out-group derogation (Downing & Moraco, 1986).

MEASUREMENT (AND PROBLEMS OF MEASUREMENT) OF IMPLICIT PREJUDICE

Beyond the usual self-presentational and demand characteristic problems inherent in the study of prejudice, “investigations of implicit prejudice require indirect measures” (Greenwald & Banaji, 1995). This is important because of the unconscious nature of the cognitions; the strength of the implicit prejudice is not available to participants’ self-report. The measurement of implicit prejudice has relied primarily on reaction time measures of attitude activation. Presumably, more associative strength between two concepts in semantic memory should facilitate recognition of concepts relative to concepts that are unrelated or to those that are less associated with the first concept. The magnitude of this
facilitation should represent the relative association of the underlying concepts.

It has been difficult to find relationships between implicit and explicit measures of prejudice. This may be due to a combination of small effect size and measurement error. Kawakami, Dion, and Dovidio (1998), after finding a .17 correlation between implicit and explicit stereotyping, called for more precise techniques for the study of stereotype activation.

In addition to needing more precise techniques for the measurement of implicit processes, more precise statistical analyses of these activation data are also needed. Response latencies tend to be noisy measures. Statistically, between-person differences become obscured in the enormous within-person variability of individual response latencies. “Because judgment latencies tend to show substantial within-person variability, obtaining measures with adequate reliability requires averaging the subject’s response latencies to large numbers of similar stimuli” (Greenwald & Banaji, 1995).

The present study examines how these individual differences in implicit prejudice are related to personality variables. Unlike previous research, which
has been limited to relating implicit and explicit prejudice, a collection of personality variables were used that are theoretically related to implicit prejudice. In addition, this study utilized Hierarchical Linear Modeling (Bryk & Raudenbush, 1992) to analyze latency data. Presumably, HLM provides better variance estimates for the reaction time data than traditional ordinary least squares analyses because HLM separates random error variance from parameter variance (Nezlek & Gable, 1998).

Methods

Participants

Participants were 114 white undergraduates who participated in partial fulfillment of a class requirement. The data of three participants were deleted from the analyses because the participants did not follow directions, leaving a final sample of 111.

Stimulus materials

Participants made judgments about two types of stimuli, adjectives that were either positive or negative, and names that were stereotypically associated with either African- or White-Americans. The adjective stimuli were taken from a study by Wittenbrink et al. (1997). These adjectives are presented in Table 1. Thirteen positive
ambitious, charming, cheerful, educated, humorous, independent, intelligent, organized, playful, responsible, sensitive, successful, wealthy) and thirteen negative words (boring, dishonest, exploitative, greedy, ignorant, lazy, materialistic, poor, promiscuous, selfish, stubborn, threatening, violent) were used.

Stimulus names were generated in a pre-test. Twenty-four students in a social psychology class provided 138 names that they considered stereotypically African-American or stereotypically White-American. To determine which names on this list were clearly associated with African- or White-Americans, eight White-American students (from another psychology class) evaluated all 138 names using a computer-based evaluation task. Each name appeared centered on a monitor in white capital letters on a black background. Each name appeared once, and participants indicated whether the name was a White-American or African-American name. In addition to recording whether a name was judged to be associated with African- or White-Americans, response latencies were recorded.

Names were selected as stimuli on the basis of two criteria. First, at least seven of the eight raters had
to agree that a name was stereotypically African- or White American. Second, the mean response latency for the rating of a name needed to be less than one standard deviation for the mean of all response latencies. From the original list of 138, ten African-American names and ten White-American names were selected. These names are presented in Table 1.

---

Insert Table 1 here

---

Procedure

Upon arriving, participants were told that they would be completing two studies. They were told that the first study concerned personality differences and the second concerned speed of information processing. After receiving general directions for the study, participants went to individual rooms for the remainder of the study. The computers that presented the questionnaires and stimuli recorded all responses and latencies.

In the first part of the study, participants completed the following questionnaires that had been hypothesized as observed measures of the latent construct Propensity to think stereotypically (which will be
referred to as Propen), Personal Need for Structure (Neuburg & Newsom, 1993), Need for Closure (Kruglanski & Webster, 1996), Modern Racism (McConahay, 1986), Modern Sexism (Swim, Aikin, Hall, & Hunter, 1995), Right-Wing Authoritarianism (Altemeyer, 1981), Anti-Black, Pro-Black, Egalitarianism, and Protestant Work Ethic (Katz & Hass, 1988). The questionnaires are in Appendix A. The instructions and procedure were fairly straightforward. For each questionnaire, each question appeared on the computer screen (in white against a black background) until the participant responded at which point the screen cleared and the next question appeared. Participants responded using eight point scales. To avoid order effects, questionnaires were presented in a random order, and within each questionnaire the items comprising the questionnaire were also presented in random order. After completing these measures, participants took a two-minute break.

After the break, participants completed the Implicit Association Test. This test compared the simultaneous activation of two mental representations, race and positivity-negativity of evaluation. Following the procedure established by Greenwald, McGhee, & Schwartz
(1998), participants responded to two blocks of trials, which will be referred to as compatible and incompatible. Within each block, each trial consisted of the presentation of a name or an adjective in white capital letters on a black background. For trials in the compatible block, participants were instructed to press one key (f) if an adjective was positive or a name was stereotypically White and another key (j) if an adjective was negative or a name was stereotypically African-American. For trials in the incompatible block, participants were instructed to press one key (j) if an adjective was positive or a name was stereotypically African-American and another key (f) if an adjective was negative or a name was stereotypically White-American. The order in which blocks were presented was counterbalanced across participants.

Within each block, names and adjectives were presented in random order. To remind participants of the correct key responses, for trials in the compatible block, the words WHITE and POSITIVE were displayed on the left side of the screen (the side of the screen corresponding to the side of the keyboard nearest to the f key) and BLACK and NEGATIVE were displayed on the right side of the screen.
screen (the side corresponding to the j key). For trials in the incompatible block, the words WHITE and NEGATIVE were displayed on the left side of the screen, whereas BLACK and POSITIVE were displayed on the right side of the screen.

To acquaint participants with the procedure and to minimize trial or practice effects, participants evaluated all the stimuli in each block twice, and the first set of responses in each block was treated as practice trials. A tone was sounded if a participant pressed an incorrect key during any trial.

**Results**

**EXPLICIT QUESTIONNAIRE ANALYSES**

Explicit personality and attitude questionnaires were scored according to the protocol for each measure. Descriptive statistics and reliabilities for each measure are in Table 2.

Insert Table 2 here

Scale scores were then submitted to a maximum-likelihood factor analysis followed by a direct quartermin rotation (Jennrich & Sampson, 1966). A maximum-likelihood factor was
used because it takes measurement error into account and the quartermvisn rotation allows factors to be correlated. Four factors with eigenvalues greater than 1.0 were found. Because the only scale that loaded on factor 4 was Need for Closure subscale 3 (decisiveness), Need for Closure (3) was removed from the analysis and the factor analysis was rerun. Three factors emerged, \( \chi^2 (33) = 40.9, p = .16 \). These factors were labeled Racism, Cognitive Miser, and Protestant Work Ethic. Factor loadings for each factor are provided in Table 3.

Scores for each factor were calculated for each participant based on factor loadings. Because these factors were highly correlated, these three factors were then factor analyzed, and a single second-order factor emerged. This factor was labeled the Propensity to Think Stereotypically (PROPEN). Scores for PROPEN were calculated for each participant based on factor loadings.

**IMPLICIT ASSOCIATION TEST ANALYSES**

Unlike previous research, which has relied on the aggregation of reaction times to measure individual
differences in implicit prejudice, this study utilized Hierarchical Linear Modeling (HLM; Bryk & Raudenbush, 1992) to analyze these individual differences. HLM, by nesting persons within observations, models measurement error. Techniques that account for measurement error "provide more accurate measures of underlying constructs and their relationships to other constructs than analyses that do not (Nezlek & Gable, 1998)."

With perfect measurement, each response within a condition would have the same value. This is rarely, if ever, true and these differences in responses represent measurement error. Traditional techniques try to account for measurement error by aggregating multiple observations. A participant's response, $y$, is assumed to be a pure measure of the person's true score, $\beta$. An aggregated means analysis relies on the measurement model of:

$$y = \beta$$

with each response assumed to be an error-free measure of the underlying construct. In contrast, techniques that model random variation do not assume that each response is a perfect measure of a construct. These techniques model each score as:
\[ y = \beta + r \]

where \( r \) represents measurement error. Such analyses separate random variance and parameter variance.

Implicit prejudice, as measured by the Implicit Association Test, was analyzed by a series of 2-Level Hierarchical Linear Models in which reaction times were nested within participants. Incorrect responses were excluded from these analyses. Initial analyses modeled individual reaction \( i \) of participant \( j \) as a function of an intercept \( \beta_0 \), which represented an individual’s mean latency time, and a single predictor \( \beta_1 \), which represented the IAT effect. The IAT effect was defined as the difference between the compatible (black/negative and white/positive) and the incompatible condition (black/positive and white/negative). All subsequent analyses modeled individual reaction times \( (y_i) \) as:

\[ y_{ij} = \beta_{0ij} + \beta_{1ij}(IAT) + r_{ij} \]

with \( r_{i} \) representing measurement error. No coefficients at Level-1 were modeled at Level-2. The Level-2 models were:

\[ \beta_{0j} = \gamma_{00} + \mu_{0j} \]

\[ \beta_{1j} = \gamma_{10} + \mu_{1j} \]
where $\gamma_{00}$ represented the participants' mean reaction time, $\gamma_{10}$ represented the participant's overall IAT effect, and $\mu_0$ and $\mu_1$ represented the residual variance of $\beta_0$ and $\beta_1$.

The IAT effect was entered as a contrast with $-1$ representing compatible and $1$ representing incompatible. Therefore, the IAT coefficient represented the decrease in reaction time for the compatible condition and the increase in reaction for the incompatible condition. The $\beta_1$ coefficient was significant, $t = 6.5$, $p < .01$, indicating that the IAT condition was related to response latency. More specifically, participants responded more quickly ($M = 806$ msec) in the compatible condition than in the incompatible condition ($M = 976$ msec). Thus, the average IAT effect, defined as the difference between compatible and incompatible trials, was 170 msec.

Negativity and Blacks, and positivity and Whites were more associated in implicit memory than positivity and Blacks, and negativity and Whites. Participants, in general, had implicit prejudice toward African-Americans.

A second HLM analysis examined whether the IAT effect varied as a function of order a presentation (compatible first vs. incompatible first). The IAT effect ($\beta_1$) was modeled as a function of the participant's overall IAT
effect ($\gamma_{10}$), the order effect ($\gamma_{11}$), and the residual variance of $\beta_1$. For this analysis, the Level-2 equations were:

$$
\beta_0 = \gamma_{00} + \mu_0
$$

$$
\beta_1 = \gamma_{10} + \gamma_{11}(\text{ORDER}) + \mu_1
$$

The $\gamma_{11}$ coefficient was not significant ($p > .50$) indicating that there were no order effects. Therefore, order was not included in any subsequent analyses.

Initial analyses showed the IAT effect to be significantly correlated with overall reaction time, $r = .86$. Participants who had higher average response times also had larger IAT effects. To eliminate this covariation, average response time was calculated for each participant. The IAT effect, $\beta_1$, then was modeled as a function of overall IAT effect ($\gamma_{10}$), mean response time ($\gamma_{11}$), and residual variance of $\beta_1$ ($\mu_1$). The Level-2 models were:

$$
\beta_0 = \gamma_{00} + \mu_0
$$

$$
\beta_1 = \gamma_{10} + \gamma_{11}(\text{MEAN RT}) + \mu_1
$$

The $\gamma_{11}$ coefficient was significant, $t = 6.2, p < .01$, indicating that mean reaction time was related to the IAT effect. Mean reaction time accounted for 63% of IAT error
variance. As expected, including mean reaction time at Level-2 reduced the correlation between mean reaction time and the IAT effect to near zero, $r = .02$. Mean reaction time was included in all subsequent analyses.

To examine how PROPEN was related to the IAT effect, $\beta_1$ was modeled as a function of PROPEN. Propensity to Think Stereotypically (PROPEN) scores ($\gamma_{12}$) were added to the level-2 model of the IAT effect. The Level-2 models were:

$$
\beta_0 = \gamma_{00} + \mu_0
$$

$$
\beta_1 = \gamma_{10} + \gamma_{11} (\text{MEAN RT}) + \gamma_{12} (\text{PROPEN}) + \mu_1
$$

The $\gamma_{12}$ coefficient was significant, $t = 2.4$, $p < .05$, indicating that individual differences in PROPEN were significantly related to the size of the IAT effect. This relationship can be examined in two ways. First, effect size for the relationship between PROPEN and the IAT effect was calculated by subtracting the error variance for the IAT effect with PROPEN (608) from the error variance for the IAT effect without PROPEN (742) and then dividing this result by error variance without PROPEN. This calculation indicated that 18% of the IAT effect could be predicted from PROPEN.
This relationship can also be examined by calculating predicted IAT effects at different levels of PROPEN. Participants one standard deviation above the mean on PROPEN had an average IAT effect of 206 msec, whereas participants one standard deviation below the mean on PROPEN had an average IAT effect of 134 msec.

In addition, each of the factors of PROPEN was entered at Level-2. No first order factor predicted the IAT effect as well as PROPEN. These tests, compared with PROPEN, are listed in table 4.

Discussion

This study investigated automatic activation of racial prejudice toward African-Americans and individual differences in this activation. First, the present study found that participants, in general, have implicit prejudice as measured by the Implicit Association Test. Participants took more time to respond to words in the incompatible condition (black/positive vs. white/negative) compared with the compatible condition (white/positive vs. black/negative). Greenwald et al. (in press) argue that
trials in which two concepts are more strongly associated will have a shorter latency than trials in which two concepts are less strongly associated. This negative evaluation toward African-Americans, averaged across participants, is particularly interesting because it was found in a sample that explicitly reported strong non-prejudiced beliefs and egalitarian values.

Second, the present study found that people varied in the strength of their implicit prejudice. The variance in the IAT effect was considered as an indicator of the associative strength of underlying implicit prejudice. The greater the difference between reaction times in the compatible and incompatible conditions, the greater the implicit prejudice (assuming that latencies in the incompatible condition are longer than latencies in the compatible condition).

Relationships between individual differences in the IAT effect and a set of personality variables provided convergent validity for the assertion that there were individual differences in implicit prejudice. This personality set was thought to be the factor that underlies explicit racism, cognitive miser tendencies, and a Protestant-Work Ethic. The shared variance of these
Personality and Implicit Prejudice 34

constructs was labeled the Propensity to Think Stereotypically (PROPEN). Analyses found that PROPEN was significantly related to implicit prejudice. Propensity to Think Stereotypically accounted for more IAT error variance than any of the individual factors (racism, cognitive miser, work-ethic) alone. Whereas previous research has reported weak effect sizes, PROPEN accounted for 18% of the residual variance in the IAT effect. This study suggests that egalitarian people have less implicit prejudice than closed-minded racists.

These results have implications for theoretical conceptualization of prejudice and non-prejudice. More specifically, the present study calls into question some of the major premises of dissociation theory (Devine, 1989). Dissociation theory posits that cultural stereotypes and personal beliefs about prejudice exist in two distinct cognitive structures. All people are equally knowledgeable of the cultural stereotype of African-Americans and activate these stereotypes equally automatically. Personal beliefs, in contrast, are activated through controlled effortful processes. By definition, stereotype control must occur after stereotype activation.
The present findings suggest that this dissociation may be less clear. First, the data suggest that automatic activation, as measured by the IAT, differs across people. Second, personal beliefs moderate this activation. Participant’s conscious attitudes and personality characteristics were related to implicit prejudice such that people who report more explicitly prejudiced beliefs, more cognitive miserly tendencies, and more Protestant Work-Ethic values show more implicit prejudice. This suggests that either personal beliefs are activated in parallel with cultural stereotypes or that people have differences in the accessibility of their automatic stereotypes.

Previous research has assumed that people are completely unaware of their implicit biases and that self-report measures of attitudes are not valid measures of implicit tendencies. The present research demonstrates that conscious tendencies and implicit prejudices covary. The causal direction of this covariation can be explained either by implicit attitudes affecting explicit attitudes or explicit attitudes affecting implicit attitudes.

Although actual implicit processes may be unavailable to consciousness, the effects of these processes are
observable. For example, a person who has more implicit prejudice will perceive African-Americans more negatively than a person who has less implicit prejudice. Each time a negative evaluation is made, conscious attitudes about African-Americans may change. A more implicitly prejudiced person’s world will seem to have more lazy, violent African-Americans in it than a less implicitly prejudiced person’s would. These misperceptions may bias other opinions as well. For example, if implicitly prejudiced people have a tendency to perceive African-Americans as lazy, implicitly prejudiced people may believe that African-Americans are poor because of character flaws. Conscious rationalizations may arise from implicit prejudices influencing a Protestant Work-Ethic or explicit prejudice.

In addition, explicit beliefs may have affects on implicit prejudice. Conscious beliefs, with consistent and frequent activation, may become automatic (Bargh, 1990). These “auto-motives” may work to increase or decrease implicit prejudice. People who value egalitarianism will consciously attempt to counter prejudice. Each time they do this, the egalitarian beliefs become more automatized. In contrast, consciously
prejudiced individuals will think stereotypically when they encounter African-Americans. Each time they do this, they make the implicit prejudice more accessible. Thus, explicitly prejudiced people will increase the associative strength of implicit prejudice, whereas non-prejudiced people will increase the associative strength of egalitarian beliefs.

The present study may also have implications for personal responsibility in discriminatory behavior. Presumably, if automatic prejudice exists within all people, automatic discrimination will follow. If conscious intent does not influence implicit prejudice -- and all people share implicit prejudice -- responsibility and blame for discrimination become diminished (cf. Shaver, 1985). Although Fiske (1989) suggests that intent can reduce discrimination through controlled processing, these processes require motivation, cognitive resources and an awareness of the unconscious bias (Bargh, in press; Fazio, 1990). Bargh (in press) doubts that all three of these conditions of stereotype control are often simultaneously met, thus removing intent and responsibility from most acts of discrimination. Perhaps responsibility can be reestablished if there are
individual differences in these automatic effects that relate to conscious personality characteristics. Racists may discriminate and non-racists may not.

Although individual differences in the automatic component of prejudice have been demonstrated, it should not be inferred that people who have a low Propensity to Think Stereotypically are unaffected by implicit prejudice. The average IAT effect was 170 msec. This means that participants tend to respond to words in the compatible condition 170 msec more quickly than in the incompatible condition (showing implicit prejudice). Participants who scored one standard deviation below the mean on PROPEN still show a large implicit prejudice effect (134 msec). In fact, participants who scored three standard deviations below the mean for PROPEN (99% of the sample), still show a 60 msec implicit prejudice effect. No participant had a PROPEN score this low. People, regardless of their egalitarian values and non-prejudiced beliefs, remain vulnerable to unconscious biases.

Future directions

Further research should continue to investigate these individual differences in implicit prejudice and their relationships to personality variables. Implicit
prejudice is related to conscious personality tendencies such as the **Propensity to Think Stereotypically**. Individual differences should also exist in other prejudices such as sexism, ageism, and groupism. Further research should address the personality variables that more directly are related to each of these additional prejudices. Perhaps certain personality tendencies such as the cognitive miser are related to each of the prejudices indicating an implicitly prejudiced personality. In addition, just as explicit prejudices are correlated (Weigel & Howes, 1985), implicit prejudices may be correlated such that implicit racists are also implicit sexists, groupists, and ageists.
References


Bargh, J. A. (in press). The cognitive monster: The case against the controllability of automatic stereotype effects. To appear in S. Chaiken & Y. Trope (Eds.), Dual
process theories in social psychology. New York: Guilford.


Unintended Thought (pp. 253-286). New York: Guilford Press.


Gaertner (Eds.), Prejudice, discrimination, and racism (pp. 91-125). Orlando FL: Academic Press.


Table 1

Selected names, average recognition latency, and percentage correct

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<tr>
<th>WHITE-AMERICAN NAMES:</th>
<th>RT(msec)</th>
<th>correct</th>
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<tbody>
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<td>559</td>
<td>88%</td>
</tr>
<tr>
<td>Frank</td>
<td>594</td>
<td>100%</td>
</tr>
<tr>
<td>Jason</td>
<td>632</td>
<td>100%</td>
</tr>
<tr>
<td>Kevin</td>
<td>568</td>
<td>88%</td>
</tr>
<tr>
<td>Mark</td>
<td>713</td>
<td>88%</td>
</tr>
<tr>
<td>Patrick</td>
<td>453</td>
<td>100%</td>
</tr>
<tr>
<td>Richard</td>
<td>563</td>
<td>100%</td>
</tr>
<tr>
<td>Robert</td>
<td>499</td>
<td>100%</td>
</tr>
<tr>
<td>Scott</td>
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<td>88%</td>
</tr>
<tr>
<td>Steven</td>
<td>640</td>
<td>100%</td>
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<table>
<thead>
<tr>
<th>AFRICAN-AMERICAN NAMES:</th>
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<tr>
<td>Jamal</td>
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<tr>
<td>Jerome</td>
<td>856</td>
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<tr>
<td>Malcolm</td>
<td>873</td>
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<tr>
<td>Mikah</td>
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<tr>
<td>Montel</td>
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<td>Muhammad</td>
<td>577</td>
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<tr>
<td>Tyrell</td>
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<tr>
<td>Tyrone</td>
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Table 2
Descriptive statistics and reliabilities for explicit personality and attitude measures.

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<th>SD</th>
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<td>.85</td>
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<tr>
<td>Need for Closure 4 (Discomfort w/ ambiguity)</td>
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<td>.66</td>
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<tr>
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Table 3

Coefficients of measures: Lower-order factor analysis and coefficients of lower-order factors on second-order factor

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<th>Work-Ethic</th>
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</tr>
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<td>Protestant work</td>
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<td>Closed-mindedness</td>
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Table 4

HLM parameter estimates for personality variables

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<tr>
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<th>RACISM</th>
<th>MISER</th>
<th>WORK</th>
<th>ETHIC</th>
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<td>IAT effect</td>
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<td>IAT coefficient</td>
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<td>IAT effect</td>
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<tr>
<td>IAT residual</td>
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<td>Model with mean</td>
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<tr>
<td>IAT residual</td>
<td>742</td>
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<tr>
<td>Shared variance</td>
<td>63%</td>
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<td>Model with mean and</td>
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<td>Coefficient</td>
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<tr>
<td>Shared variance</td>
<td>18%</td>
<td>10%</td>
<td>12%</td>
<td>5%</td>
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</tr>
</tbody>
</table>
Appendix A

Modern Racism
1. Discrimination against blacks is no longer a problem in the United States.
2. It is easy to understand the anger of black people in America.
3. Blacks ought to have more influence upon school desegregation plans.
4. Blacks are getting too demanding in their push for equal rights.
5. Blacks should not push themselves where they are not wanted.
6. Over the past few years, blacks have gotten more economically than they deserve.
7. Over the past few years, the government and new media have shown more respect to blacks then they deserve.

Modern Sexism
1. Discrimination against women is no longer a problem in the United States.
2. Women often miss out on good jobs due to sexual discrimination.
3. It is rare to see women treated in a sexist manner on television.
4. On average, people in our society treat husbands and wives equally.

5. Society has reached a point where women and men have equal opportunities for achievement.

6. It is easy to understand the anger of women’s groups in America.

7. It is easy to understand why women’s groups are still concerned about societal limitations of women’s opportunities.

8. Over the past few years, the government and news media have been showing more concern about the treatment of women than is warranted by women’s actual experiences.

**Pro-Black**

1. Black people do not have the same employment opportunities that Whites do.

2. It’s surprising that Black people do as well as they do, considering all the obstacles they face.

3. Too many Blacks still lose out on job’s and promotions because of their skin color.

4. Most big corporations in America are really interested in treating their Black and White employees equally.

5. Most blacks are no longer discriminated against.
6. Blacks have more to offer than they have been allowed to show.
7. The typical urban ghetto public school is not as good as it should be to provide equal opportunities for Blacks.
8. This country would be better off if it were more willing to assimilate the good things in Black culture.
9. Sometimes Black job seekers should be given special considerations in hiring.
10. Many Whites show a real lack of understanding of the problems that Blacks face.

**Anti-Black**
1. The root cause of most of the social and economic ills of Blacks is the weakness and instability of the Black family.
2. Although there are exceptions, Black urban neighborhoods don’t seem to have strong community organization or leadership.
3. On the whole, Black people don’t stress education and training.
4. Many black teenagers don’t respect themselves or anyone else.
5. Blacks don’t seem to use opportunities to own and operate little shops and businesses.
6. Very few Black people are just looking for a free ride.

7. Black children would do better in school if their parents had better attitudes about learning.

8. Blacks should take the jobs that are available and then work their way up to better jobs.

9. One of the biggest problems for a lot of Blacks is their lack of self-respect.

10. Most Blacks have the drive and determination to get ahead.

Protestant Ethic

1. Most people spend too much time in unprofitable amusements.

2. Our society would have fewer problems if people had less leisure time.

3. Money acquired easily is usually spent unwisely.

4. Most people who don’t succeed in life are just plain lazy.

5. Anyone who is willing and able to work hard has a good chance of succeeding.

6. People who fail at a job have usually not tried hard enough.
7. Life would have very little meaning if we never had to suffer.
8. The person who can approach an unpleasant task with enthusiasm is the person who will get ahead.
9. If people work hard enough they are likely to make a good life for themselves.
10. I feel uneasy when there is little work for me to do.
11. A distaste for hard work usually reflects a weakness of character.

Egalitarianism
1. One should be kind to all people.
2. One should find ways to help others less fortunate than oneself.
3. A person should be concerned about the well-being of others.
4. There should be equality for everyone - because we are human beings.
5. Those who are unable to provide for their basic needs should be helped by others.
6. A good society is one in which people feel responsible for one another.
7. Everyone should have an equal chance and an equal say in most things.
8. Acting to protect the rights and interests of other members of the community is a major obligation for all persons.

9. In dealing with criminals the courts should recognize that many are victims of circumstance.

10. Prosperous nations have a moral obligation to share some of their wealth with poor nations.

**Personal Need For Structure**

1. It upsets me to go into a situation without knowing what I can expect from it.

2. I'm not bothered by things that interrupt my daily routine.

3. I enjoy having a clear and structured mode of life.

4. I like to have a place for everything and everything in its place.

5. I enjoy being spontaneous.

6. I find that a well-ordered life with regular hours makes my life tedious.

7. I don't like situations that are uncertain.

8. I hate to change my plans at the last minute.

9. I hate to be with people who are unpredictable.

10. I find that a consistent routine enables me to enjoy life more.
11. I enjoy the exhilaration of being in unpredictable situations.

12. I become uncomfortable when the rules in a situation are not clear.

Right-Wing Authoritarianism

1. Laws need to be strictly enforced if we are going to preserve our way of life.

2. People should pay less attention to the Bible and other old traditional forms of religious guidance, and instead develop their own personal standards of what is moral and immoral.

3. Women should always remember the promise they make in the marriage ceremony to obey their husbands.

4. Our customs and national heritage are the things that have made us great, and certain people should be made to show greater respect for them.

5. Capital punishment should be completely abolished.

6. National anthems, flags, and glorification of one’s country should all be de-emphasized to promote the brotherhood of all men.

7. The facts on crime, sexual immorality, and the recent public disorders all show that we have to crack down
harder on deviant groups and troublemakers if we are going to save our moral standards and preserve law and order.

8. A lot of our society’s rules regarding modesty and sexual behavior are just customs which are not necessarily any better or holier than those which other people follow.

9. Our prisons are a shocking disgrace. Criminals are unfortunate people who deserve much better care, instead of so much punishment.

10. Obedience and respect for authority are the most important virtues children should learn.

11. Organizations like the army and the priesthood have a pretty unhealthy effect upon men because they require strict obedience of commands from supervisors.

12. One good way to teach certain people right from wrong is to give them a good stiff punishment when they get out of line.

13. Youngsters should be taught to refuse to fight in a war unless they themselves agree that the war is just and necessary.

14. It may be considered old-fashioned by some, but having a decent, respectable appearance is still the mark of a gentleman and, especially, a lady.
15. In these troubled times laws have to be enforced without mercy, especially when dealing with the agitators and the revolutionaries who are stirring things.

16. Atheists and others who have rebelled against the established religions are no doubt every bit as good and virtuous as those who attend church regularly.

17. Young people sometimes get rebellious ideas, but as they grow up they ought to get over them and settle down.

18. Rules about being “well-mannered” and respectable are chains from the past that we should question very thoroughly before accepting.

19. The courts are right in being easy on drug offenders. Punishment would not do any good in cases like these.

20. If a child starts becoming a little too unconventional, his parents should see to it that he returns to the normal ways expected by society.

21. Being kind to loafers or criminals will only encourage them to take advantage of your weakness, so it’s best to use a firm, tough hand when dealing with them.

22. A “woman’s place” should be wherever she wants to be. The days when women are submissive to their husbands and social conventions belong strictly in the past.
23. Homosexuals are just as good and virtuous as anybody else, and there is nothing wrong with being one.

24. It's one thing to question and doubt someone during an election campaign, but once a man becomes the leader of our country we owe him our greatest support and loyalty.

Need for Closure

1. I think that having clear rules and order at work is essential for success.

2. Even after I've made up my mind about something, I am always eager to consider a different opinion.

3. I don't like situations that are uncertain.

4. I dislike questions that can be answered in many different ways.

5. I like to have friends that are unpredictable.

6. I find that a well-ordered life with regular hours suits my temperament.

7. When dining out, I like to go places where I have been before so that I know what to expect.

8. I feel uncomfortable when I don't understand why an event occurred in my life.

I feel irritated when a person disagrees with what everyone else in a group believes.

10. I hate to change my plans at the last minute.
11. I don't like to go to a situation without knowing what I can expect from it.

12. When I go shopping, I have difficulty deciding exactly what it is that I want.

13. When faced with a problem I usually see the one best solution very quickly.

14. When I am confused about an important issue, I feel very upset.

15. I tend to put off making important decisions until the last possible moment.

16. I usually make important decisions quickly and confidently.

17. I would describe myself as indecisive.

18. I think it is fun to change my plans at the last moment.

19. I enjoy the uncertainty of going into a new situation without knowing what might happen.

20. My personal space is usually messy and disorganized.

21. In most social conflicts, I can easily see which side is right and which is wrong.

22. I tend to struggle with most important decisions.

23. I believe that orderliness and organization are among the most important characteristics of a good student.
24. When considering most conflict situations, I can usually see how both sides could be right.

25. I don't like to be with people who are incapable of unexpected situations.

26. I prefer to socialize with familiar friends because I know what to expect from them.

27. I think that I would learn best in a class that lacks clearly stated objectives and requirements.

28. When thinking about a problem, I consider as many different opinions on the issue as possible.

29. I like to know what people are thinking all the time.

30. I dislike it when a person's personal statement could mean many different things.

31. It is annoying to listen to someone who cannot seem to make up his or her own mind.

32. I find that establishing a consistent routine enables me to enjoy life more.

33. I enjoy having a clear and structured mode of life.

34. I prefer interacting with people whose opinions are very different from my own.

35. I like to have a place for everything and everything in its place.
36. I feel uncomfortable when someone's meaning or intention is unclear to me.

37. When trying to solve a problem I often see so many possible options that it's confusing.

38. I always see so many possible solutions to problems I face.

39. I'd rather know bad news than stay in a state of uncertainty.

40. I do not usually consult many different opinions before forming my own view.

41. I dislike unpredictable situations.

42. I dislike the routine aspects of my work (studies).
VITA

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The author was born on January 7, 1973 in Newport News, Virginia. He received his Bachelor of Arts with high honors in Psychology from the College of William & Mary in May 1995. In August 1996, he entered the Master of Arts program in psychology at the College of William & Mary.