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# Bias in Jury Selection: Justifying Prohibited Peremptory Challenges

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ABSTRACT

The United States Supreme Court has restricted attorneys from considering the gender and race of potential jurors in their use of peremptory challenges—the practice by which jurors may be removed from a jury without explanation or evidence of potential bias. We propose that forbidding peremptories based on social category information not only fails to decrease biased jury selection, but also encourages attorneys to search—successfully—for neutral justifications for their biased decisions. In Study 1, participants who acted as prosecutors in a jury selection paradigm eliminated female jurors more often than male jurors, but then justified these biased choices by citing gender-neutral information. Troublingly, Study 2 showed that explicit instructions against the use of gender failed to eliminate selection bias, and in fact resulted in even more elaborate justifications. Copyright © 2007 John Wiley & Sons, Ltd.

KEY WORDS jurors; biases; prosecutors; gender bias

## INTRODUCTION

The 6th Amendment to the Constitution of the United States guarantees defendants the right to a trial by a fair and impartial jury. There are two stages designed to ensure this process, each with inherent difficulties. First, the pool from which juries are drawn must be representative of the community (e.g., Lockhart v. McCree, 1986); the jury selection process (*voir dire*)—in which attorneys for both the prosecution and defense can excuse individual jurors—is then intended to identify and remove jurors who cannot be impartial in a given case (see Holland v. Illinois, 1990; Taylor v. Louisiana, 1975). Creating jury pools that are representative of their communities is a task typically left to policymakers, an objective that remains elusively difficult to achieve (see Cohn & Sherwood, 1999). The challenging task of ensuring the impartiality of individual jurors, on the other hand, is left up to those who interview prospective jurors during jury selection: judges and attorneys. Because attorneys are expected to win cases, however, their motivation to select unbiased jurors is

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cause for concern. In practice, prosecutors often excuse jurors who they feel are biased *in favor* of defendants, and defense attorneys tend to excuse those who they believe to be biased *against* their clients (see Baldus, Woodworth, Zuckerman, Weiner, & Broffitt, 2001; Rose, 1999; Turner, Lovell, Young, & Denny, 1986).

The present research explores the processes underlying such decisions during jury selection, examining how attorneys' desire to select jurors favorable to their case may bias their decision-making. Specifically, we consider the trial of a female defendant accused of murdering her abusive husband, and ask individuals playing the role of prosecutor to choose to excuse either a male or female juror. We examine whether these mock prosecutors—who presumably believe that female jurors will more sympathetic toward the female defendant—will exclude female jurors more frequently than otherwise identical male jurors. We then explore the extent to which the actual basis for such jury selection decision—juror gender—is masked by the use of gender-neutral justifications. Thus this investigation has practical implications for understanding bias in the jury selection process, while also shedding light on decision justification processes more generally.

## JUSTIFYING DECISIONS

Decades of research suggest that individuals motivated to reach desired outcomes seek to justify and excuse their questionable behavior (e.g., Batson, Thompson, & Chen, 2002; Monin & Norton, 2003). In Sommer, Horowitz, and Bourgeois (2001), for example, jurors biased their interpretations of evidence at trial in order to justify awarding their preferred levels of damages (see also Sommers & Ellsworth, 2000), while in Hsee (1996), participants biased their valuations of property to benefit family members. When faced with difficult choices, individuals interpret—and distort—information to support their preferences prior to a choice (e.g., Brownstein, 2003), as choices are being made (e.g., Russo, Medvec, & Meloy, 1996; Russo, Meloy, & Medvec, 1998; Simon, Krawcyzk, & Holyoak, 2004), and subsequent to choice (e.g., Brehm, 1956; Festinger, 1957; Mather, Shafir, & Johnson, 2000). Thus individuals are skilled at masking biased decisions by justifying their behavior and decisions in more acceptable terms, part of a general tendency to provide compelling explanations for their decisions (e.g., Nisbett & Wilson, 1977; Scott & Lyman, 1968; Shafir, Simonson, & Tversky, 1993).

An attorney who wishes to select a favorable jury similarly may consider the gender of prospective jurors despite proscriptions against doing so, and then be likely to justify such decisions by offering compelling—and perfectly plausible—gender-neutral explanations for those decisions. The influence of gender on such decisions may occur both unconsciously, rendering individuals' self-report justifications unintentionally inaccurate, and consciously, as individuals may actively decide to consider gender and then intentionally mask evidence of bias.

## JURY SELECTION

Attorneys have two different means at their disposal for excluding prospective jurors during jury selection. A *challenge for cause* requires convincing a judge that a prospective juror has a bias that precludes impartiality; a *peremptory challenge*, on the other hand, affords attorneys tremendous leeway by allowing for the exclusion of jurors without explanation or evidence of potential impartiality. Peremptory challenges are often based on ''gut feelings,'' and are therefore likely to be colored by observable characteristics of potential jurors; indeed, it is well-documented that attorneys systematically consider categories such as gender, occupation, and nation of origin in their efforts to eliminate jurors they believe to be unfavorable to their clients (Hastie, 1991; Kovera, Dickinson, & Cutler, 2002; Olczak, Kaplan, & Penrod, 1991; Zeisel & Diamond, 1978), despite the sometimes tenuous link between such characteristics and jurors' verdict



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tendencies (see Hastie, Penrod, & Pennington, 1983). For example, jury selection training manuals and trial consultants sometimes advise defense attorneys to favor poor jurors in civil cases due to their discomfort with large sums of money, while plaintiffs in civil cases are encouraged to avoid jurors with professions based on precision, such as bank tellers and accountants (Fulero & Penrod, 1990). Though these strategies may seem capricious, the very nature of the peremptory challenge allows any criterion—however unsubstantiated or bizarre—to be used in excusing jurors (for a critical review of attorney performance in jury selection, see Hastie, 1991).

Reflecting this deliberately permissive view, use of peremptory challenges was unrestricted for 200 years until the Supreme Court ruled that peremptories—intended to facilitate the selection of impartial jurors—could also violate other key elements of fairness, such as the Constitutional rights of every citizen to serve as a juror. Consider, for example, that in the 15 years before the Supreme Court's ruling in Swain v. Alabama (1965), no African American served as a criminal juror in Talladega County, Alabama, a region with a Black population of 25% at that time (see also Sommers & Ellsworth, 2001). The first practically meaningful restrictions on peremptory use were implemented in Batson v. Kentucky (1986), when the Court ruled that prospective jurors could not be removed from a jury solely on the basis of membership in a ''cognizable racial group,'' a restriction subsequently extended to peremptory challenges based on a juror's gender (J. E. B. v. Alabama, 1994).

The present investigation explores the practical effectiveness of these prohibitions. Given that attorneys traditionally have been licensed to use any criteria they wish in issuing peremptory challenges, coupled with their motivation to select juries favorable to their clients, it seems unlikely that attorneys will fully comply with restrictions against considering race or gender. Indeed, in addition to the examples above, another piece of juror folklore advises prosecuting attorneys to avoid female jurors because that they are less likely to convict than are male jurors (Fulero & Penrod, 1990). So pervasive is this notion that several Supreme Court cases regarding the exclusion of female jurors have been brought by *male* defendants (e.g., Duren v. Missouri, 1979; Taylor v. Louisiana, 1975) who claimed that the challenges in question violated *their* right to a fair trial. In light of these beliefs about juror gender, will prosecutors—motivated to exclude jurors likely to vote for acquittal—honor the restriction set forth in J. E. B. v. Alabama (1994), or are they likely to continue to deem juror gender to be an important criterion? Perhaps most importantly, if attorneys do consider gender in their jury selection judgments, will their use of this information be detectable, or will they generate gender-neutral explanations for their gender-based decisions, masking their use of this proscribed criterion?

## OVERVIEW

In the present studies we explore the biasing influence of social category information in the domain of jury selection, capitalizing on individuals' motivation to excuse jurors based on gender and their presumed facility at masking this bias. More specifically, we propose that in a mock jury selection paradigm, people engage in casuistry—specious reasoning in the service of justifying questionable behavior—by excusing jurors on the basis of their gender yet explaining these decisions by recruiting other, gender-neutral attributes of these jurors (see Norton, Vandello, & Darley, 2004). In the studies reported below, participants are asked to play the role of a prosecuting attorney whose job it is to convict a female defendant on trial for murdering her abusive husband. Participants are asked to choose between two prospective jurors for the final spot on the jury: one male and one female. We expected our mock prosecutors to be motivated to exclude female jurors, but to offer other explanations for those choices, which we provided in the form of gender-neutral information about each juror (Study 1). In Study 2, we included a condition in which we gave participants an explicit reminder of the proscription against using gender in order to explore the impact of warnings against bias on decision-making and justification.



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## STUDY 1

In this first study we assessed whether participants playing the role of prosecutors in a criminal case would exhibit a bias to exclude female jurors while masking their reasons for that choice. We used a paradigm similar to one developed by Norton et al. (2004), which explored gender discrimination in an employment setting. In one study, Norton et al. (2004) provided participants with two finalists—one male and one female—for a construction job, but varied the qualifications of those applicants: In one condition, the male had more experience while the female had more education, while in the other the qualifications were flipped, such that the male had more education while the female had more experience. Results indicated that participants overwhelmingly selected the male candidate for this stereotypically male job regardless of qualifications. Rather than citing gender as the basis for their choice, however, participants used other qualifications to do so. When the male was more experienced, they claimed that experience was the more important qualification; when the female was more experienced they claimed that education—the qualification now associated with the male candidate—was more important (see also Hodson, Dovidio, & Gaertner, 2002). We use a similar paradigm in the present investigation, creating profiles for two prospective jurors, but manipulating the gender associated with these profiles: for half of the participants, the first prospective juror was female and the second male; for the other half, the first prospective juror was male and the second female. Holding all factors constant except the gender associated with these two profiles allows us to determine whether participants who eliminate female jurors will admit to using gender as a basis for challenge, or whether they will use other gender-neutral information contained in these profiles to justify those decisions.

### Method

*Stimulus development*

The trial scenario used in this research provided a brief summary of a female defendant on trial for first-degree murder. The summary indicated that the defendant admitted to fatally shooting her husband while he slept (both wife and husband were described as White). At trial, she testified that her husband had been emotionally and physically abusive toward her and their four children for many years. She explained that she feared for her safety and the well-being of her children, and that she only acted out of self-defense.

In pretesting, college students ($n = 46$) were given this scenario and descriptions of seven potential jurors for the case. For each juror, participants were asked to respond to the following statement: ''As a prosecutor, I would not want this juror on the jury'' on a 7-point scale (1: *strongly disagree* to 9: *strongly agree*). Each juror profile included at least one characteristic that could be construed as unattractive to a prosecutor. For example, one juror said she had recently divorced her unfaithful husband; another juror mentioned a sister who had been the victim of domestic abuse. Analyses identified two juror profiles that were rated as relatively comparable in terms of their attractiveness to the prosecution: a schoolteacher who had also spent time at home caring for three young children ($M = 5.72$) and a psychologist who counseled victims of emotional and physical abuse ($M = 5.93$).

Building on these two comparable profiles, we created more elaborate descriptions of two prospective jurors by adding information about their marital status, age, jury experience, educational background, and career history. In the final juror profiles, the *Parent Juror* was identified as a married 39-year-old with previous jury experience. This juror was described as a high school English teacher and soccer coach who took some time off work to help raise three young children. The *Counselor Juror* was identified as a single 34-year-old who had no previous jury experience. This juror was described as a domestic abuse counselor with 6 years of experience, who specialized in helping women find employment after leaving their abusive relationships. Both jurors were reported to have responded to *voir dire* questioning with clear statements that



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their personal experiences—raising young children or working with abused women—would not prevent them from being impartial jurors in the case.

*Participants*

One hundred and one college students participated in partial completion of a course requirement. Of these, 72 (71%) were female and 29 (29%) male; 72 (71%) identified themselves as White, 8 (8%) as Asian, 8 (8%) as Black, 7 (7%) as Latino, and 6 (6%) used other racial identifiers.

*Procedure*

Participants were given written instructions to assume the role of a prosecuting attorney in a criminal trial and were reminded that their objective was to convict the defendant. They were then given the trial scenario described above, along with a photo of the defendant, a 32-year-old White female. Background information about the jury selection process was also provided; participants were instructed that as prosecutors they were able to remove from the jury a certain number of jurors ''because (a) you don't think they would be able to be fair jurors or (b) you do not think they would be sympathetic to your case.''

The second page of the questionnaire provided the two juror profiles and a photograph of each juror, which comprised the experimental manipulation. In one condition, the *Parent Juror* was female while the *Counselor Juror* was male, while in the other condition the qualifications were switched, such that the *Parent Juror* was male while the *Counselor Juror* was female. Both jurors were White.

The third page of the questionnaire informed participants that they had one challenge remaining and could therefore only remove one of the two jurors. They were asked which juror they would excuse from the jury. We next assessed their justifications: An open-ended question instructed them to explain to the trial judge why they removed the juror they chose. Finally, participants rated how likely each juror would have been to vote guilty in the case, on a 7-point scale (1: *very unlikely* to 7: *very likely*).

## Results

*Selection*

As predicted, juror selection was driven by gender: Across conditions, 71% of participants chose to eliminate the female juror, $\chi^2(1) = 18.3$, $p = 0.001$.[1] Most importantly, this effect was impacted by our manipulation: When the *Parent Juror* was female, the majority of participants (67%) chose to excuse her (while just 33% chose to exclude the male *Counselor Juror*); in the other condition, however, when the *Parent Juror* was male, he was excused just 24% of the time, meaning that 76% now excluded the female *Counselor Juror*, $\chi^2(1) = 17.8$, $p = 0.001$ (see Table 1). In short, jurors with otherwise identical profiles were likely to be retained when male but excused when female. Indeed, there was no actual preference for one profile or the other in the absence of gender information: across conditions, 44% of participants elected to remove the *Parent Juror*, while 56% elected to remove the *Counselor Juror*, $\chi^2(1) = 1.68$, *ns*.

*Justification*

Participants' jury selection judgments were driven by the gender of prospective jurors, not by jurors' actual qualifications. We predicted that participants would justify their decisions not by citing gender, but rather by

[1]In both Studies 1 and 2, gender of the participant did not impact any of our analyses. In Study 1, for example, the majority of both male (64%) and female (75%) participants chose to exclude the female juror; we thus do not discuss this variable further.



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Table 1. Peremptory challenge use and justification of challenges (Study 1)

| | Challenging Parent Juror (%) | Citing parental status (%) | Challenging Counselor Juror (%) | Citing counseling job (%) |
|---|---|---|---|---|
| *Parent Juror* is female/*Counselor Juror* is male | 67 | 61 | 33 | 39 |
| *Parent Juror* is male/*Counselor Juror* is female | 24 | 19 | 76 | 81 |

*Note*: Because one prospective juror was always depicted as female and the other as male, the first and third columns sum to 100%, as do the second and fourth columns.

claiming that whichever gender-neutral characteristic was paired with the female juror was the most important basis for eliminating a juror. To test this hypothesis, open-ended explanations were coded for the use of gender as a justification, and for which of the two gender-neutral characteristics—having young children and working as an abuse counselor—was cited as most influential in participants' justifications.[2]

First, as expected, just 10% of participants cited gender as a justification for their decision, despite the clear impact of gender on judgments. We expected that this underutilization of gender was due to participants' preference for using the gender-neutral characteristics we provided, and this was, indeed, the case. Mirroring participants' selections, when the *Parent Juror* was female, parental status was cited as the most important characteristic 61% of the time, while just 39% thought that counseling experience—the characteristic paired with the male juror—was the most important. In the other version, however, when the *Parent Juror* was male, parental status was cited as the most important just 19% of the time, while 81% of participants felt that counseling experience—the characteristic now paired with the female juror—was more biasing, $\chi^2(1) = 16.8$, $p = 0.001$ (see Table 1).

*Juror ratings*

Finally, we explored the process underlying exclusion of female jurors, assessing whether participants' beliefs about the likelihood of female jurors voting guilty led to the exclusion of females. As expected, the female juror was rated as less likely to vote guilty ($M = 3.06$) than was the male juror ($M = 4.39$) across conditions, $F(1, 98) = 5.83$, $p < 0.001$. We calculated a new variable equal to the difference in participants' ratings of the two jurors' likelihood of voting guilty, expecting this relative difference to mediate the impact of gender on participants' choice of juror. Following the procedure outlined by Baron and Kenny (1986), we examined whether these ratings mediated the relationship between gender and peremptory use. First, a logistic regression revealed that juror gender predicted use of peremptories, Wald $(1) = 16.7$, $p < 0.001$. A linear regression indicated that the juror gender was a significant predictor of this difference in ratings of the two jurors, $\beta = 0.50$, $p < 0.001$, and in a logistic regression, the difference in ratings of the two jurors emerged as a significant predictor of whether or not the female juror was removed, Wald $(1) = 30.4$, $p < 0.001$. When the potential mediator was entered into the original logistic regression analysis, juror gender was no longer a significant predictor of whether or not this juror was challenged, Wald $(1) < 1$, $p = 0.58$. In short, this analysis indicates that participants' beliefs that female jurors were more likely to vote guilty were the driving force behind their bias in use of peremptories against this juror.

[2]A second student naïve to the purpose of the study coded these same responses, confirming the reliability of the first coder's assessments, $\kappa = 0.94$.



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**Discussion**

As predicted, participants excused female jurors more frequently than otherwise identical male jurors and were also likely to generate gender-neutral reasons for those decisions. When the female juror had young children, participants were likely to cite this characteristic as the reason for excluding her, but when the female juror had worked as an abuse counselor, participants suddenly felt that having young children—the characteristic now associated with the male juror—was not nearly as important, instead citing counseling experience as the more biasing characteristic. Whether this masking of the influence of gender reflects intentional or unintentional processes is unclear from these data, a theoretically important question to which we return in the General Discussion. We note, however, that either mechanism is problematic from a legal perspective, as the legal prohibition against basing peremptories on gender is not confined to intentional discrimination. In Study 1, gender influenced participants' peremptory decisions, yet their justifications for these decisions did not reflect this influence, a pattern of results that casts doubts on the practical effectiveness of current restrictions placed on peremptory use.

## STUDY 2

To the extent that participants in Study 1 were consciously motivated to avoid acknowledging the influence of gender, this tendency likely depended on their general knowledge that using gender to make decisions is socially taboo, or politically incorrect (see Norton, Sommers, Apfelbaum, Pura, & Ariely, 2006). Participants' failure to cite gender as justification for their decisions suggests they were aware of this social norm, but it is likely that our college-aged participants were not aware of the official legal proscription against using gender introduced in J. E. B. v. Alabama (1994). Therefore, in Study 2 we explore whether explicit information about this restriction—of which real attorneys are certainly aware—leads our mock attorneys to forgo using gender to eliminate jurors. There is mixed evidence on the general effectiveness of such warnings in improving legal decision-making (e.g., Carlson & Russo, 2001; Smith, 1993; Smith & Greene, 2005). We suspected that given intuitions and stereotypes regarding juror gender—particularly in the trial of a defendant using a ''battered wife'' defense—such a warning would not decrease gender bias. Indeed, putting additional pressure on people to justify their decisions—as specific instructions on how to perform often do—can in some situations *enhance* bias as people become more committed to their decisions (Simonson & Staw, 1992; see Lerner & Tetlock, 1999). We expected that if this explicit warning manipulation were to have an impact, it might be in the form of ironically leading participants to go to greater lengths to ''cover their tracks.''

**Method**

*Participants*

Ninety-one college students participated in partial completion of a course requirement. Of these, 48 (53%) were female and 43 (47%) male; 62 (68%) identified themselves as White, 15 (17%) as Asian, 7 (8%) as Latino, 4 (4%) as Black, and 3 (3%) used other racial identifiers.

*Procedure*

Participants were given the same materials used in Study 1, in which the trial described a female defendant accused of murdering her spouse while he slept. Once again, two juror profiles and photographs were provided. Because our primary interest was in exploring the impact of an explicit warning, we included just one version: The *Parent Juror* was always female, while the *Counselor Juror* was always male.[3]

[3]Because female jurors were excluded at the same rate regardless of their role in Study 1 (*Parent Juror*: 67% and *Counselor Juror*: 76%), indicating that juror gender and not role was the critical variable impacting decision-making, we used only one pair of stimuli in Study 2.



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The between-groups manipulation was found in the written instructions provided to participants. In the *control* condition, participants were given the same instructions as in Study 1, which explained the role of the peremptory challenge as enabling them to remove jurors ''because (a) you don't think they would be able to be fair jurors or (b) you do not think they would be sympathetic to your case.'' In the *warning* condition, the following instruction was added to clarify that gender was not a consideration on which a peremptory could be based: ''Keep in mind, however, that according to the U.S. Supreme Court, you may not decide to remove a juror because of his or her gender.'' This warning was emphasized a second time before participants completed the dependent measures for the study. Participants in the *control* condition were simply told, ''You have one juror challenge left and can only remove one of these two potential jurors from the jury.'' In the *warning* condition, an additional sentence read. ''Remember, you may not remove a juror because of his or her gender.'' As in Study 1, participants were then asked which juror they would excuse from the jury and, in an open-ended question, how they would explain this decision.

**Results and Discussion**

As in Study 1, the majority of participants (59%) again elected to remove the female *Parent Juror*, $\chi^2(1) = 3.18$, $p = 0.075$. Most important, a reminder of the prohibition against considering gender in making this decision did not have a significant effect on participants' selection: In the *control* condition, 60% of participants chose to remove the female *Parent Juror*, while 59% chose to do so in the *warning* condition, $\chi^2(1) < 1$. In addition, the manipulation also had no impact on participants' likelihood of citing the female *Parent Juror's* experiences raising young children as the most important factor in their decision: Participants in the *control* (51%) and *warning* conditions (50%) were equally likely to cite this factor, $\chi^2(1) < 1$. Also replicating Study 1, few participants used gender as a justification for their decision (just 9% in each condition).

Giving participants an explicit warning against using gender failed to decrease gender bias. To examine the possibility that the warning led participants to provide more elaborate justifications for their judgments, we counted the number of words in each participant's open-ended response. Overall, participants averaged 37.8 words in explaining their decisions. We observed an interaction between condition and the gender of the juror excused, $F(1, 87) = 4.12$, $p < 0.05$. In the *control* condition, participants used a comparable number of words to justify excusing the female *Parent Juror* ($M = 37.5$) and the male juror ($M = 39.6$), $t(87) < 1$ via planned contrast. In the *warning* condition, however, participants who excluded the female *Parent Juror* ($M = 43.7$) used significantly more words to justify that decision than did participants who excluded the male juror ($M = 30.5$), $t(87) = 2.44$, $p = 0.02$, presumably in an effort to further mask the true basis for their decision in the face of a proscription against using that information.[4] Problematically, warnings against bias led participants to go to greater lengths to conceal that bias. While we cannot be sure that these longer explanations are necessarily more compelling, by providing additional information to justify their decisions, participants who challenged a female juror despite an explicit warning not to consider gender may be even more persuasive in their effort to explain their peremptory use in gender-neutral terms.

## GENERAL DISCUSSION

Across two studies using a mock jury selection paradigm, we found consistent evidence that individuals use gender when making peremptory challenge decisions, but use gender-neutral explanations to justify their

[4]The same analysis for Study 1 revealed no effect of gender of juror challenged on word count—not surprisingly, given that Study 1 is comparable to the control condition of Study 2—with an average word count of 41.8 for those who excluded the female juror and 41.2 for those excluding the male, $F < 1$.



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choices. Worse, explicit warnings about the proscription on using gender not only failed to attenuate gender bias, but actually led participants to provide even more elaborate justifications for their decisions. These findings, combined with the fact that recent Supreme Court decisions have set a very low standard for the quality of explanation required to justify a potentially biased peremptory (see Page, 2005), hardly lead to optimistic conclusions regarding the practical effectiveness of restrictions governing peremptory challenge use. Indeed, this preliminary investigation of jury selection judgments indicates that the legal domain is by no means immune from the well-documented ability of decision-makers to rationalize questionable choices in unbiased, legitimate terms.

We have been somewhat agnostic in this investigation as to the extent to which the biased behavior we observe is strategic or unintentional, partly because on a practical level, the legal standard by which judges determine if a *Batson* violation has occurred does not include determination of an attorney's intent. Determining whether attorneys intentionally mask their use of gender or whether the process occurs more unconsciously, as a result of the subtle influence of gender on perception and judgment (e.g., Eagly & Karau, 2002; Schein, 1973, 1975) is clearly of interest, however. In the domain of employment discrimination, in fact, determining whether discrimination has occurred historically has hinged on determination of intent (McDonnell Douglas Corp. v. Green, 1973; Price Waterhouse v. Hopkins, 1989). In Desert Palace v. Costa (2003), however, the Court reinterpreted Title VII of the Civil Rights Act of 1964 to conclude that discrimination can occur whenever membership in a protected class is one of the motivating factors for an employment practice, even when other, legitimate factors also influenced the decision (see Krieger, 1995; Norton, Sommers, Vandello, & Darley, 2006). Applying this standard to our results, gender clearly influenced decision-making such that females with the same profiles as men were eliminated more frequently; while our results are not conclusive on the intentionality of the decisions, they do demonstrate clear discrimination from a practical standpoint. While people's use of more words to justify questionable decisions in Study 2 seems somewhat strategic—and thus perhaps the result of a conscious effort to dissemble—these results are only suggestive, and future investigations should explore further the conscious and unconscious components of this kind of biased judgment.

**Implications for understanding preferences**

Many investigations of preference formation provide participants with two options, each with relevant information, and then track the distortion of information as a favorite begins to emerge (e.g., Russo et al., 1998): The current studies add to this literature by examining preference formation when people are trying to *hide* their preferences—or at least couch the reasons for their preferences in other terms. Results from Study 1 showed that people accomplished this goal by reweighting non-gendered attributes to justify their gender-based decisions. Interestingly, if we look only at the juror attributes participants chose and their post-choice rankings of these attributes, it would be impossible to discern bias. After all, most participants who excluded the juror who was the parent of young children subsequently claimed that this characteristic was the reason for their choice, a result that implies that people are simply choosing based on their prior preference for these characteristics. Only by varying which characteristic was paired with which juror were we able to demonstrate our mock attorneys' bias against female jurors.

Much research has been devoted to showing that the degree to which people's stated attribute weights actually predict their choices is much lower than would be expected (see Slovic & Lichtenstein, 1971). Barlas (2003) showed that one reason for this lack of correspondence may be due to people's unwillingness to give high weights to ''irrational'' attributes, as when choosing contraceptives based on pleasure or convenience rather than more rational criteria such as risk prevention. In some sense, our participants are behaving in the same way, masking the questionable reasons for their decisions by generating less controversial explanations. But while people may be reluctant to cite pleasure as a reason for their choice of contraceptives, they are actually proscribed by law from using gender in jury selection. Taken together, the present investigation and



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Barlas (2003) suggest that concerns about justifying preferences can have a large impact on the formation of preferences, as individuals attempt to justify their choices in acceptable ways.

**Debiasing**

From both a practical and theoretical standpoint, a better understanding of how to debias the specious reasoning we observe is clearly needed. Clearly, explicit warnings against bias were not sufficient in this paradigm. Another possibility to decrease bias might be to have participants commit to their attribute weights prior to making their decisions. In our studies, this would involve participants committing a priori to whether they thought counseling or having young children was a more biasing characteristic before they read about the potential jurors. Carlson and Pearo (2004) showed that such prior valuations of attributes (at least for consumer goods such as backpacks and wine) limited subsequent distortion of preferences. Using a college admissions task similar to the jury selection paradigm used in the present investigation, however, Norton et al. (2004) showed that such a priori weighting did not alter selection biases in favor of preferred candidates: Participants in that study simply shifted their attribute weights post hoc to be consistent with their selection. We suggest that strength of motivation to arrive at a desired outcome will be a key predictor of the effectiveness of preweighting. In other words, when stakes are high—as when prosecutors choose jurors in an effort to win in court—people may be willing to forgo their stated attribute weights, while in less crucial domains—such as consumer choice—preweighting may well serve as a debiasing technique. From a purely practical standpoint, such interventions would be extraordinarily difficult to implement in a court of law, where attorneys on both sides—as well as some judges (e.g., Batson v. Kentucky, 1986, Burger, C., dissenting)—strongly resist any further restrictions on peremptories.

**From mock attorneys to real attorneys**

Our paper-and-pencil studies used only college students playing the role of attorneys: Would the results obtained here be similar in the real-world, for attorneys engaged in jury selection in a court of law? Do attorneys—aware of the proscription against the use of race and gender outlined in *Batson* and *J. E. B. v. Alabama*—continue to use race and gender in an effort to select juries favorable to their clients? The limited available evidence suggests that they do. Rose (1999) observed jury selection proceedings for 13 criminal trials, 12 of which had a Black defendant. Based on the logic underlying our experiments, we would expect prosecutors to challenge Black jurors—presumed to be sympathetic to a Black defendant—while defense attorneys would want to retain such jurors, making them more likely to challenge White jurors. This is exactly what Rose (1999) observed: 71% of observed Black juror challenges were made by the prosecution and 81% of White juror challenges were made by the defense (see also Baldus et al., 2001; Turner et al., 1986). Are attorneys also as skilled as our participants at generating neutral explanations for their gender- and race-related challenges? Again, the limited available evidence suggests that they are. Given the leeway attorneys are given with regard to the type of information they can use to justify peremptories, they are generally quite successful at convincing judges that their peremptories were not based on these proscribed criteria (e.g., Melilli, 1996; Raphael & Ungvarsky, 1993). These findings bolster the conclusion of Olczak et al. (1991) that students and trial attorneys demonstrate similar jury selection judgment strategies and processes in the evaluation of jurors. The fact that our results so closely parallel the data from these analyses of real cases suggests that the processes we observe map onto actual jury selection.

It is even possible that attorneys' increased motivation to select favorable jurors given the real-world consequences may make them *more* likely than our relatively disinterested participants to consider using any criteria—including race and gender—that they believe will facilitate the empanelling of a sympathetic jury. Given their knowledge of the illegality of using race and gender as the basis for challenging a juror, attorneys may also be even more likely to mask their use of these criteria. In fact, in a related investigation that explored racial bias in jury selection, Sommers and Norton (in press) showed that college students, law students, and



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practicing attorneys engaged in similar selection and justification strategies in eliminating Black jurors in a case involving a Black defendant; the only difference among the populations was that attorneys went to *greater* lengths to justify their decisions.

**Result-oriented jurisprudence**

In his now-famous critique of decision-making on the Supreme Court, Herbert Wechsler called for judges to curtail their tendency to cite only cases and arguments that supported their desired rulings rather than evenhandedly reviewing the evidence and case law to arrive at unbiased, logical conclusions. Wechsler (1959, p. 11) asked that judges use ''criteria that can be framed and tested as an exercise of reason and not merely as an act of willfulness or will.'' Countless investigations—including the results of the two studies presented here—suggest that Wechsler's call for objective reasoning rather than motivated reasoning (see Kunda, 1990; Kruglanski, 1989; Lord, Ross, & Lepper, 1979; Pyszczynski & Greenberg, 1987) is unlikely to be heeded. Individuals have a difficult time insulating the judgment process from their desired outcome, whether they are laypeople, attorneys, or judges (see Landsman & Rakos, 1994). The decision-making process simply unfolds in a more willful, and less rational, sequence than Wechsler desired.

One of the most prominent debates in current legal discourse is between two ends of a seemingly polarized spectrum whose endpoints can roughly be labeled originalists, advocates for adhering to the original intent of the U.S. Constitution, and judicial activists, advocates for a view of the Constitution as a living document that must be reinterpreted to address issues unforeseen by its authors. Both sides see themselves as rational, while the other side is seen as engaging in result-oriented jurisprudence, using (or misusing) the Constitution to support their desired positions (Greenberg & Litman, 1998; Scalia, 1997). We would suggest that for both sides, notions of what is rational are likely to be colored by their views of what is correct. Wechsler's (1959) call for neutrality is particular striking in light of the fact that one of the thrusts of his review was to criticize the decision in Brown v. Board of Education (1954). Both proponents and opponents of that decision cited different passages from the Constitution and previous Supreme Court decisions in support of their positions on segregation. Each side engaged in a seemingly rational enterprise, yet both were motivated by their desires—conscious or otherwise—to support their preferred conclusions. Though we have focused the present investigation on such processes in the domain of jury selection, there is reason to believe that a wide range of legal decisions are made and justified in a similar manner.

## REFERENCES

Baldus, D. C., Woodworth, G. G., Zuckerman, D., Weiner, N. A., & Broffitt, B. (2001). The use of peremptory challenges in capital murder trials: A legal and empirical analysis. *University of Pennsylvania Journal of Constitutional Law*, *3*, 3–169.

Barlas, S. (2003). When choices give in to temptations: Explaining the disagreement among importance measures. *Organizational Behavior and Human Decision Processes*, *91*, 310–321.

Baron, R. M., & Kenny, D. A. (1986). The moderator-mediator distinction in social psychological research: Conceptual, strategic, and statistical considerations. *Journal of Personality and Social Psychology*, *51*, 1173–1182.

Batson v. Kentucky, 476 U.S. 79. (1986).

Batson, C. D., Thompson, E. R., & Chen, H. (2002). Moral hypocrisy: Addressing some alternatives. *Journal of Personality and Social Psychology*, *83*, 330–339.

Brehm, J. W. (1956). Postdecision changes in the desirability of alternatives. *Journal of Abnormal and Social Psychology*, *52*, 384–389.

Brown v. Board of Education, 347 U.S. 483. (1954).

Brownstein, A. L. (2003). Biased predecision processing. *Psychological Bulletin*, *129*, 545–568.

Carlson, K. A., & Pearo, L. K. (2004). Limiting predecisional distortion by valuation of attribute components. *Organizational Behavior and Human Decision Processes*, *94*, 48–59.

Carlson, K. A., & Russo, J. E. (2001). Biased interpretation of evidence by mock jurors. *Journal of Experimental Psychology: Applied*, *7*, 91–103.



DOI: 10.1002/bdm

Cohn, A., & Sherwood, D. R. (1999). The rise and fall of affirmative action in jury selection. *University of Michigan Journal of Law Reform*, *32*, 323–333.
Desert Palace v. Costa, 539 U.S. 90. (2003).
Duren v. Missouri, 439 U.S. 357. (1979).
Eagly, A. H., & Karau, S. J. (2002). Role congruity theory of prejudice toward female leaders. *Psychological Review*, *109*, 573–598.
Festinger, L. (1957). *A theory of cognitive dissonance*. Stanford, CA: Stanford University Press.
Fulero, S. M., & Penrod, S. D. (1990). The myths and realities of attorney jury selection folklore and scientific jury selection: What works? *Ohio Northern University Law Review*, *17*, 229–253.
Greenberg, M. D., & Litman, H. (1998). The meaning of original meaning. *Georgetown Law Journal*, *86*, 569–619.
Hastie, R. (1991). Is attorney-conducted voir dire an effective procedure for the selection of impartial juries? *American University Law Review*, *40*, 1501–1524.
Hastie, R., Penrod, S., & Pennington, N. (1983). *Inside the jury.* Cambridge, MA: Harvard University Press.
Hodson, G., Dovidio, J. F., & Gaertner, S. L. (2002). Processes in racial discrimination: Differential weighting of conflicting information. *Personality and Social Psychology Bulletin*, *28*, 460–471.
Holland v. Illinois, 493 U.S. 474. (1990).
Hsee, C. K. (1996). Elastic justification: How unjustifiable factors influence judgments. *Organizational Behavior and Human Decision Processes*, *66*, 122–129.
J. E. B. v. Alabama, 511 U.S. 127. (1994).
Kovera, M. B., Dickinson, J. J., & Cutler, B. L. (2002). Voir dire and jury selection. In A. M. Goldstein (Ed.), *Comprehensive handbook of psychology, forensic psychology* (Vol. 11, pp. 161–175). New York: John Wiley and Sons.
Krieger, L. H. (1995). The content of our categories: A cognitive bias approach to discrimination and equal employment opportunity. *Stanford Law Review*, *47*, 1161–1248.
Kruglanski, A. W. (1989). *Lay epistemics and human knowledge: Cognitive and motivational biases*. New York: Plenum Press.
Kunda, Z. (1990). The case for motivated reasoning. *Psychological Bulletin*, *108*, 480–498.
Landsman, S., & Rakos, R. F. (1994). A preliminary inquiry into the effect of potentially biasing information on judges and jurors in civil litigation. *Behavioral Sciences and the Law*, *12*, 113–126.
Lerner, J. S., & Tetlock, P. E. (1999). Accounting for the effects of accountability. *Psychological Bulletin*, *125*, 255–275.
Lockhart v. McCree, 476 US 162. (1986).
Lord, C. G., Ross, L., & Lepper, M. R. (1979). Biased assimilation and attitude polarization: The effects of prior theories on subsequently considered evidence. *Journal of Personality and Social Psychology*, *37*, 2098–2109.
Mather, M., Shafir, E., & Johnson, M. K. (2000). Misremembrance of options past: Source monitoring and choice. *Psychological Science*, *11*, 132–138.
McDonnell Douglas Corp. v. Green, 411 U.S. 792. (1973).
Melilli, K. J. (1996). *Batson* in practice: What we have learned about *Batson* and peremptory challenges. *Notre Dame Law Review*, *71*, 447–503.
Monin, B., & Norton, M. I. (2003). Perceptions of a fluid consensus: Uniqueness bias, false consensus, false polarization and pluralistic ignorance in a water conservation crisis. *Personality and Social Psychology Bulletin*, *29*, 559–567.
Nisbett, R. E., & Wilson, T. D. (1977). Telling more than we can know. *Psychological Review*, *84*, 231–259.
Norton, M. I., Sommers, S. R., Apfelbaum, E. P., Pura, N., & Ariely, D. (2006). Color blindness and interracial interaction: Playing the Political Correctness Game. *Psychological Science*, *17*, 949–953.
Norton, M. I., Sommers, S. R., Vandello, J. A., & Darley, J. M. (2006). Mixed motives and racial bias: The impact of legitimate and illegitimate criteria on decision-making. *Psychology, Public Policy, and Law*, *12*, 36–55.
Norton, M. I., Vandello, J. A., & Darley, J. M. (2004). Casuistry and social category bias. *Journal of Personality and Social Psychology*, *87*, 817–831.
Olczak, P. V., Kaplan, M. F., & Penrod, S. (1991). Attorneys' lay psychology and its effectiveness in selecting jurors: Three empirical studies. *Journal of Social Behavior and Personality*, *6*, 431–452.
Page, A. (2005). Batson's blind-spot: Unconscious stereotyping and the peremptory challenge. *Boston University Law Review*, *85*, 155–262.
Price Waterhouse v. Hopkins. (1989). 390 U.S. 228.
Pyszczynski, T., & Greenberg, J. (1987). Toward an integration of cognitive and motivational perspectives on social inference: A biased hypothesis-testing model. In L. Berkowitz (Ed.), *Advances in experimental social psychology* (Vol. 20, pp. 297–340). San Diego, CA: Academic Press.
Raphael, M. J., & Ungvarsky, E. J. (1993). Excuses, excuses: Neutral explanations under *Batson v. Kentucky. University of Michigan Journal of Law Reform*, *27*, 229–275.
Rose, M. R. (1999). The peremptory challenge accused of race or gender discrimination? Some data from one county. *Law and Human Behavior*, *23*, 695–702.



DOI: 10.1002/bdm

Russo, E. J., Medvec, V. H., & Meloy, M. G. (1996). The distortion of information during decisions. *Organizational Behavior and Human Decision Processes*, *66*, 102–110.
Russo, E. J., Meloy, M. G., & Medvec, V. H. (1998). Predecisional distortion of product information. *Journal of Marketing Research*, *35*, 438–452.
Scalia, A. (1997). *A matter of interpretation: Federal courts and the law*. Princeton, NJ: Princeton University Press.
Schein, V. E. (1973). The relationship between sex role stereotypes and requisite management characteristics. *Journal of Applied Psychology*, *57*, 95–100.
Schein, V. E. (1975). Relationships between sex role stereotypes and requisite management characteristics among female managers. *Journal of Applied Psychology*, *60*, 340–344.
Scott, M. B., & Lyman, S. M. (1968). Accounts. *American Sociological Review 33*, 46–62.
Shafir, E., Simonson, I., & Tversky, A. (1993). Reason-based choice. *Cognition*, *49*, 11–36.
Simon, D., Krawcyzk, D. C., & Holyoak, K. J. (2004). Construction of preferences by constraint satisfaction. *Psychological Science*, *15*, 331–336.
Simonson, I., & Staw, B. M. (1992). Deescalation strategies: A comparison of techniques for reducing commitment to losing courses of action. *Journal of Applied Psychology*, *77*, 419–426.
Slovic, P., & Lichtenstein, S. (1971). Comparison of Bayesian and regression approaches to the study of information processing in judgment. *Organizational Behavior and Human Performance*, *6*, 649–744.
Smith, V. L. (1993). When prior knowledge and law collide: Helping jurors use the law. *Law and Human Behavior*, *17*, 507–536.
Smith, A. C., & Greene, E. (2005). Conduct and its consequences: Attempts at debiasing jury judgments. *Law and Human Behavior*, *29*, 505–526.
Sommer, K. L., Horowitz, I. A., & Bourgeois, M. J. (2001). When juries fail to comply with the law: Biased evidence processing in individual and group decision making. *Personality and Social Psychology Bulletin*, *27*, 309–320.
Sommers, S. R., & Ellsworth, P. C. (2000). Race in the courtroom: Perceptions of guilt and dispositional attributions. *Personality and Social Psychology Bulletin*, *26*, 1367–1379.
Sommers, S. R., & Ellsworth, P. C. (2001). White juror bias: An investigation of racial prejudice against Black defendants in the American courtroom. *Psychology, Public Policy, and Law*, *7*, 201–229.
Sommers, S. R., & Norton, M. I. (in press). Race-based judgments, race-neutral justifications: Experimental examination of peremptory use and the *Batson* challenge procedure. *Law and Human Behavior.*
Swain v. Alabama, 380 U.S. 202. (1965).
Taylor v. Louisiana, 419 U.S. 522. (1975).
Title VII of the Civil Rights Act of 1964, 42 U.S.C. Sec. 2000c-(a)(1). (1964).
Turner, B. M., Lovell, R. D., Young, J. D., & Denny, W. F. (1986). Race and peremptory challenges during voir dire: Do prosecution and defense agree? *Journal of Criminal Justice*, *14*, 61–69.
Wechsler, H. (1959). Toward neutral principles of constitutional law. *Harvard Law Review*, *73*, 1–35.
Zeisel, H., & Diamond, S. S. (1978). The effect of peremptory challenges on jury and verdict: An experiment in a federal district court. *Stanford Law Review*, *30*, 491–531.

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