

## **Mock Juror's Perceptions of Polygraph Tactics Used to Obtain a Confession**

Joseph Ray and Paige Skinner  
Ron Craig, Ph.D., Faculty Mentor

Department of Psychology  
Edinboro University

### **ABSTRACT**

Confessions are very influential pieces of evidence in the U.S. judicial system, often accepted by jurors even when exculpatory evidence is present. However, research indicates that legal interrogation tactics, like the use of deception, increases the risk of a false confession. One tactic used in interrogations is the polygraph test where, regardless of the outcome, the suspect is told the test indicated their guilt. This study examines mock jurors' perceptions of the impact of this tactic on an obtained confession. Participants read a mock-crime scenario where an interrogation leads to a recanted confession. Four versions were developed varying the use of the polygraph in the interrogation, the feedback the suspect is given, and its accuracy. Participants then determined the defendant's guilt, the importance of evidence presented and answered questions related to their attitudes toward confessions. Demographic information, including knowledge about false confessions, was also obtained. The presence of the polygraph had no significant effect on mock jurors' verdicts; however, when the stated outcome of the polygraph was consistent with the guilt of the defendant, it was used by participants to validate the confession. Also, those participants who have discussed the topic of false confessions in class were more likely to ignore the confession and vote not guilty.

**Keywords:** False Confession; Interrogation; Interrogation Tactics; Mock Jury

### **INTRODUCTION**

A confession is one of the most powerful pieces of evidence in the U.S. legal system. In the case of *Bruton v. the United States* (1968), the U.S. Supreme Court argued that confessions are "probably the most probative and damaging evidence that can be admitted" (Kassin & Neumann, 1997). Research by Chojnacki, Cicchini, and White (2008) argues that when a confession is introduced at trial, the jury is likely to treat the confession as more probative of the defendant's guilt than any other piece of evidence. Given the immense weight jurors give confessions when deciding guilt, the evidence that not all confessions are true is concerning. The literature regarding the issue of false confessions is

growing, and many factors have been identified to increase the potential for a false confession, several of which occur in during the interrogation of the suspect (Kassin & Gudjonsson, 2004; Kelly, Miller, Redlich & Kleinman, 2013). Thus, jurors are now being asked to critically evaluate the interrogation process and determine whether the confession given is accurate or false.

Given the influence of a confession on the legal system, there is great pressure in the interrogation process to obtain an admission of guilt from the suspect. However, some of the coercive interrogation tactics, legally used by today's U.S. law enforcement, have been shown to contribute to a person confessing to a crime they did not commit (Kassin & Gudjonsson, 2004; Kelly, Miller, Redlich

& Kleinman, 2013). An examination of exoneration cases indicated false confessions had occurred in as many as 38% of the cases (Watson, Weiss, & Pouncey, 2010). While jurors are aware of the coercive nature of interrogation (Blandón-Gitlin & Gerkens, 2010), when a confession is present, jurors and judges often decrease the amount of physical and other evidence necessary to convict the suspect of the crime (Chojnacki, Cicchini, & White, 2007). Many people express that a person confessing to a crime must mean they are guilty and that they would be able to detect a false confession if they saw one (Costanzo, Shaked-Schroer, & Vinson, 2010).

One tool utilized by law enforcement in the course of the interrogation process is to offer the accused an opportunity to take a polygraph test. Should the suspect refuse to accept the offer, the interrogator can then use the refusal as an implication of the guilt of the suspect (Inbau, Reid, Buckley, & Jayne, 2011). Should the suspect agree to take the test, they are often told the test indicated deception, regardless of the actual results of the polygraph test (truthful or deceptive); these “deceptive results” are then used by the interrogator as an indicator of guilt in confronting the suspect to obtain a confession (Kassin et al., 2007). This tactical use of the polygraph may contribute to suspects feeling either trapped, or they come to mistrust their memory and subsequently falsely confess (Kassin & Gudjonsson, 2004). Kelly, Miller, Redlich, and Kleinman (2013) set forth a taxonomy of tactics used in the interrogation process, listing the use of a polygraph in the domain of “Presentation of Evidence” related to the suspect’s guilt. The authors suggest that with the polygraph in this domain this tactic could be viewed as being “used for leverage for purposes of gaining cooperation, information, intelligence of administration of guilt or

involvement in illegal or suspicious activity” (p. 173). Within this taxonomy, the presentation of a false deceptive polygraph result could bolster the use of other confrontational techniques, increasing the potential coerciveness of the interrogation process.

Woody and Forrest (2009) examined the impact of knowing false evidence had been used to obtain a confession (e.g., fake eyewitness evidence) on mock jurors’ perceptions of guilt. Mock jurors did find that the use of false information tactic coercive; however, it only had a marginal effect on perceptions of guilt, though the recommend sentences were less severe. In their survey of jury-eligible participants, Costanzo, Shaked-Schroer, and Vinson (2010) found that lying to a suspect about his polygraph results was rated as least acceptable of all tactics they assessed, even less than lying about DNA evidence. However, little research has looked at the effects of jurors’ perceptions of this application of the polygraph in evaluating the veracity of a suspect’s confession. Having this tactic pointed out to jurors, in the context of evaluating a confession, may result in being more skeptical of its validity. Conversely, a polygraph that points to guilty and results in a confession may result in that confession being viewed as more valid since the polygraph is corroborating with the confession.

The current study examined the impact of the presence and type of polygraph feedback given during an interrogation on a mock juror’s perspective of the resulting confession. It was hypothesized that the presence of polygraph feedback in the interrogation would impact perceptions of the confession compared to confessions obtained without reference to a polygraph test. The addition of the polygraph that then resulted in a confession would serve as an indicator of guilt and collaborate the confession. When presented with the

actual results of the polygraph, it was hypothesized that when the suspect was given accurate (guilty) feedback, the suspect's confession would be viewed as more valid compared to the suspect being given inaccurate feedback about their test. The presence of a validated polygraph indicating guilt would further validate the confession, whereas the presence of contradictory evidence and deception in the interrogation process would cast doubt on the confession.

## METHODS

### Participants

Ninety-three undergraduate students from a Western Pennsylvania university were recruited via email. Three participants were dropped from the study for inaccurately responding to a validity check question. The resulting sample of 90 participants had a mean age of 22.1 (SD=6.97); in the sample, 30% self-identified male, 67.8% female, and 2.2% indicated other or preferred not to answer. Only 1.1% indicated they had served on a jury, and 26.7% (24 participants) reported they had discussed the topic of false confessions in a class.

### Materials

An online survey was created that asked participants to read a mock trial scenario that included a confession and then answer several questions about the case. The scenario portrayed a mock trial of a crime where a hiker in a park was assaulted and robbed. Based on circumstantial evidence a homeless man, who usually wandered through the park, was accused of the crime. The suspect was interrogated and subsequently confessed to the crime. Four scenarios were developed where the use and validity of a polygraph in the interrogation process were varied. The first version had no mention of a polygraph during the interrogation. The other three versions

indicated that the suspect had been given a polygraph test and informed, during the interrogation, that the test indicated he had committed the crime. The actual outcome of the test was then varied; in one condition, no mention of the test's true outcome was provided (just that the suspect was told during the interrogation the test indicated they were guilty). To examine the effects of the use of deception regarding the polygraph results during the interrogation, an expert was introduced in the final two conditions to either validate or contradict the information given during the interrogation. In one condition, an expert testified that the suspect had in fact not failed the test (indicating he did not commit the crime), thus had been lied to during the interrogation. In the final condition, an expert testified that the suspect had failed the test (indicating he had committed the crime).

Following each scenario, participants responded to several questions, including a validity check question to make sure the participants had read the scenario. First, participants were asked if they "believe the defendant is Guilty or Not Guilty?" Participants were then asked to rate, on a scale from 1 to 10, how certain they were of their verdict. Impact of the confession and polygraph (when present), were assessed by asking participants to rate on a scale of 1 to 10 how much each influenced their decision. Then, participants were asked to rate the accuracy of the defendant's confession and the accuracy of the polygraph on a scale of 0 to 100%. Next, participants rated, on a scale of 1 to 10, if they felt the length of the interrogation or the presentation of the polygraph information influenced the confession. The Attitudes Towards Confessions scale (ATC) (Wrightsmann & Engelbrecht, 1991) was then presented. The ATC asks participants to respond on a 5 point Likert scale how much they agree with 18 statements like, "Most confessions are given freely by the suspect" and "A

suspect cannot be tricked into confessing to a crime he or she did not commit.” Finally, basic demographics questions were asked that included a question regarding participant’s exposure to the topic of false confessions in their classes.

### Procedures

Participants were sent an email request containing an explanation of the study, a link to participate, and link to an alternative extra credit assignment. The students who elected to participate in the study read and agreed to the informed consent and then were randomly assigned to one of the four scenario conditions. Participants read the case summary, responded to the questions about the case, completed the ATC (Wrightsmann & Engelbrecht, 1991), and finally provided the requested demographic data. After the survey was completed, participants were directed to a separate page to provide information to obtain the extra credit for participation.

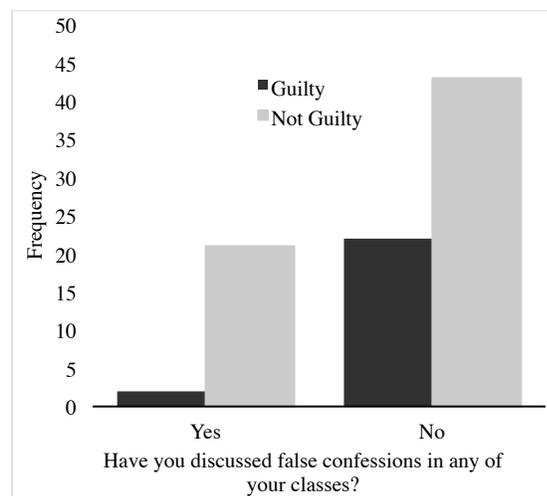
## RESULTS

A total of 93 participants completed the survey; however, three were dropped for answering the validity check question incorrectly. Of the remaining 90 participants, 25 read the no polygraph scenario, 18 polygraph without accuracy, 20 polygraph indicating guilt (consistent), and 27 polygraph indicating innocence (inconsistent). Across all conditions, 72.2% of participants found the defendant not-guilty. The not-guilty votes broken down by condition were, 84% in the no-polygraph, 66.7% for polygraph without accuracy, 63.2% polygraph indicated guilt (consistent), and 74.1% polygraph indicated innocence (inconsistent). A 2 x 4 Chi Square analysis identified no significant differences in verdicts between the four conditions. Planned comparisons between no polygraph and polygraph (no expert) and between polygraph consistent

and inconsistent were conducted via Chi Square (2 x 2), neither test was significant.

To further evaluate any impact of condition on verdict, a certainty scale was produced that also reflected the participant’s verdict (Lieberman, Carrell, Miethe, & Krauss, 2008); the scale could range from -10 to 10, with -10 representing participants’ absolute certainty of the suspect being not guilty and 10 representing absolute certainty of guilt. To test the specific hypothesis proposed, independent t-tests between no polygraph and polygraph (no expert), and the polygraph consistent and inconsistent conditions were not significant. An exploratory one-way ANOVA comparing the four conditions on the verdict certainty found no significant differences between the groups.

Exploratory analysis examining the impact of academic exposure to the topic of false confessions were then conducted, one subject did not provide information on their exposure to the topic in class and was removed from the remaining analysis. A significant difference in verdicts was found for participants who had discussed false confessions in class ( $X^2(1) = 5.418$ ,  $p = .02$ ), with participants who reported discussing false confessions in a class being more likely to vote not guilty than those who had not (Figure 1).



**Figure 1.** Guilty verdicts by discussion of false confessions in course work

Two by four (class exposure by condition) ANOVAs were conducted for participants' responses to the impact of evidence (confession and polygraph), impact of the interrogation tactics (length and polygraph feedback), ATC scores, accuracy of the confession, and verdict certainty. A significant main effect was found for both condition ( $F(3, 81) = 4.176$ ,  $p = .008$ ) and class exposure ( $F(1, 81) = 4.87$ ,  $p = .030$ ) regarding the influence of the confession on participant's decision. Those who had discussed the topic were less influenced ( $M = 4.05$ ,  $SE = .463$ ) than those who hadn't ( $M = 5.209$ ,  $SE = .281$ ). Post-hoc tests for condition identified that the feedback consistent condition (the expert testified the polygraph indicated deception) relied more on the confession compared to the other three conditions.

There was a significant main effect of class exposure ( $F(1, 80) = 10.69$ ,  $p = .002$ ) on influence of the polygraph evidence, those exposed to the topic of false confessions relying on it less ( $M = 3.188$ ,  $SE = .534$ ) than those who had not ( $M = 5.233$ ,  $SE = .326$ ). In addition, those exposed to false confessions in class felt the length of interrogation ( $F(1, 81) = 10.164$ ,  $p = .002$ ) ( $M = 8.75$ ,  $SE = .476$  vs.  $M = 7.223$ ,  $SE = .248$ ) and the use of the spurious polygraph feedback ( $F(1, 81) = 5.032$ ,  $p = .027$ ;  $M = 8.717$ ,  $SE = .472$  vs.  $M = 7.474$ ,  $SE = .288$ ) were more influential on the suspect's willingness to confess. Finally, those who had discussed false confessions had significantly lower ( $F(1, 72) = 7.162$ ,  $p = .009$ ) ATC scores ( $M = 43.03$ ,  $SE = 1.337$ ) than those who had not ( $M = 47.227$ ,  $SE = .838$ ). No other significant impacts for condition or exposure were identified.

## DISCUSSION

The majority of participants found the suspect not guilty, with no significant differences in verdicts between the four

interrogation conditions. This is inconsistent with research that has found confessions as a key element in guilty verdicts (Chojnacki, Cicchini, & White 2008; Kassin & Neumann, 1997). While a pilot testing of the scenario, without the confession, did find a reasonably even split in guilty verdicts, it appears that the evidence in the case was too vague to warrant a guilty verdict even with the confession present. Also, while there was a validity check to make sure participants had read the scenario, there was no specific manipulation check to ensure they understood the nature of the polygraph information provided to the suspect.

The outcome of the polygraph did impact how much influence the confession had on participants when making their decision. Consistency between the suspect being told they failed the test and the expert's testimony, was associated with the confession being more influential in determining the verdict. Thus, the deceptive polygraph results may have validated the veracity of the confession for those individuals. The opposite effect for truthful polygraph outcomes, a decrease in the perceived validity of the confession, was not present in this data. However, it is important to note that across all conditions rates of not-guilty verdicts were high, thus indicating a general skepticism about the guilt of the suspect and the confession on the part of all participants.

The exploratory analysis of the impact of discussing the topic of false confessions in an academic course did identify an interesting difference. Participants who had been exposed to the topic of false confessions were less likely to identify the suspect as guilty. Moreover, those who had discussed the issue in a class relied on the confession less in making their decision, were impacted less by the polygraph evidence, and were more concerned about the role the length of the interrogation played in obtaining the confession. Finally, they had lower ATC

scores than the non-exposed participants indicating greater skepticism about confessions in general. These findings support the notion that exposure to the topic of false confessions has a lasting impact and influences decision making of those exposed. This suggests that education about false confessions may lead to a greater skepticism and critical evaluations regarding confession evidence.

Some limitations to the study included a limited sample size, drawn from an undergraduate student population rather than from an actual jury pool. The study was also based on a written mock crime summary compared to a real-world trial where evidence is presented live. In addition, the scenario appears to have been too one-sided, making the suspect look more innocent rather than guilty even in the control condition. Thus, there is a ceiling effect, where most participants chose not guilty across all of the scenarios, and may not have allowed for the identification of differences due to the use of polygraph in the interrogation. A potential confound was that in two of the four scenarios there was a polygraph “expert” who provided feedback on the actual outcome of the test, where the other two had no “expert” evidence. Thus, the simple presence of an “expert” could have influenced participants’ decision making. Future research should reexamine the influence of the polygraph tactic in the interrogation with more incriminating evidence in, and pilot testing of, the scenario than the present study. Having a more even split in the verdict for the control condition would allow for greater ability to identify differences due to the polygraph tactic. Comparisons could also be made between an expert presenting the validity of the test and the interrogator explaining that they did or did not provide deceptive results to the suspect.

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