Interpretations of blame regarding distinctive depictions of police killings

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1 Introduction

Media sources have proven to be an incredibly rich source of information, with the potential to influence the ways in which people understand events, and perceive morality and responsibility. As the role of the media in information spread is generally apparent, there has been an increase in metalinguistic awareness about the particular grammatical structures that sources often use when reporting on violent events. A chief example of such discussions revolves around the use of bureaucratic voice or exonerative tense (Balko, 2021), meaning the use of obfuscatory language. This grammatical tactic has been criticized heavily for being used to describe violent events, especially regarding depictions of police violence (Dickey, 2022; Kramer, 2020). An example of such linguistic constructions include the use nominalization in order to transform a violent action into an event with ambiguous semantic roles ('man dies in officer-involved shooting') (Moreno-Medina et al., 2022).

Journalists are often expected to maintain a neutral tone in reporting such events in order to limit negative judgements towards police departments and curtail stereotypes (Dukes & Gaither, 2017). As such, linguistic constructions such as passive voice and non-agentivity allow for them exclude certain details, in favor of tempering any sense of brutality or prominence of police activity (Entman, 2007; Ziems & Yang, 2021). However, as public consciousness grows, it is of empirical interest to interrogate whether or not these linguistic devices are effective in curtailing negative stereotypes towards police officers.

While there has been much work demonstrating how the use of particular syntactic structures influences how people interpret headlines and sentences generally (Fausey & Boroditsky, 2010), there is much less experimental work on the effect of obfuscatory language on people's understanding of violent, police-related events. Considering the tumultuous relationship between the general public and police force that is marred by decades of reported mistreatment, heightened surveillance and brutality (Camp et al., 2021); possessing explicit attitudes towards police could be considered a ubiquitous human experience (Verhaeghen & Aikman, 2022). That being said, it is reasonable for

experimental work to consider the effect of participant priors on their interpretation of a highly-contested subject.

Moreover, work in criminal justice and social psychology has demonstrated that a person's general perception of law enforcement has a strong influence on their assessment of interpersonal police encounters, regardless of whether the encounter was personally experienced (Brandl et al., 1994) or perceived in an experimental setting (Camp et al., 2021; Maguire et al., 2017). As global attitudes towards policing have presented a barrier to police departments attempting to form positive police-community relationships, empirical analyses on interpretations of police-related events should always assume an effect of participant priors, on processing.

Given the fact that humans process information from headlines by weighting and interpreting incoming evidence against previously existing information (Ecker et al., 2014), the present study seeks to investigate whether linguistic cues provide enough of an effect to mitigate the influence of prior attitudes on attribution. In order to examine the role of obfuscatory language and participant attitudes on blame assignment, I conducted a web-based study in which users' were presented with headlines ranging in agentivity and semantic role and provided their own interpretations on whether or not a particular character was at fault. In the rest of this introduction, I present two main linguistic effects that were used to construct the experimental headlines. In Section 2, I report the present study, including the experimental design. After presenting the results and statistical analyses in Section 3, I move on in Section 4 to discuss the implications of the evaluated factors on attribution, and present future sites of inquiry.

1.1 Language of Obscurity

In the present study, participants were presented with constructed headlines of police-related events of varying grammatical constructions and varying semantic roles of the law enforcement officer. In each headline, a law enforcement officer was embroiled in a conflict with an individual, where either the officer or the individual served as the *agent* (deliberately performs the action) or *theme/patient* (often used interchangeably as they both undergo the action).

In this section, I describe two linguistics cues that describe the different headlines. The constructions have been identified to provide a level of semantic ambiguity, by scholars in fields such as criminology, sociology, economics, psychology and linguistics (Moreno-Medina et al., 2022; Toolan, 2013). I focus on three key types of narrative structures:

- Voice: the use of passive voice in lieu of active voice
- Semantic Role: the lack of a semantic agent

In Table 1, I provide examples of the two main linguistic factors, as I describe and employ them in my analysis. Please note that the nonagentive examples in the table also utilize passive voice.

Passive Voice A passive construction occurs when an object of an action becomes a promoted subject. In Table 1, an example of such a sentence is "Protesters shot by officers outside Texas church

X	Police Agent	Police Patient
Linguistic Factor	Example	Example
Passive	Protesters shot by officers outside Texas church service	Officers shot by protesters outside Texas church service
Nonagentive	Protesters shot during clash with officers outside Texas church service	Officers shot during clash with protesters outside Texas church service

Table 1: Examples of Obfuscatory Linguistic Factors

service." In such a structure, the agent (officers) of an active sentence (Officers shot protesters outside Texas church service) is back-grounded and demoted, lowering its prominence to the reader. The terms *subject* (noun doing the action) and *object* (noun action is done to) refer to grammatical roles of a sentence. The grammatical subject of the sentence is now the noun receiving the action of the transitive verb.

Passive voice is regularly scorned, given its perception of being evasive and indirect. It is regularly discouraged from use, especially in regards to academic and scientific writing. For example, the APA publication manual clearly recommends writers to use active voice in order to create clear and direct sentences (Association, 2020; Ferreira, 2021). Moreover, although the function of the passive construction is to foreground the object, there is evidence that its use leads to obfuscation.

In an experiment where participants watched a video depicting a sexual assault and were asked to write about it, participants tended to use passive grammatical structures more frequently when describing the perpetrator's actions during the rape itself (Bohner, 2001). Participants who used more passive constructions reported to perceive the incident as less severe and ascribed more responsibility to the victim.

Agentivity Agentivity refers to whether or not the agent is included in the sentence. In their 2010 study, experimenters Fausey & Boroditsky presented evidence for how non-agentive linguistic framing may influence a reader's perception of an event. In focusing on the linguistic contrast between transitive agentive descriptions involving an agent and inanimate object ("Mrs. Smith followed her friends and as she stood up, she flopped her napkin on the centerpiece candle") and intransitive nonagentive descriptions ("Mrs. Smith followed her friends and as she stood up, her napkin flopped on the centerpiece candle"), they found that agentive depictions led participants to assign more blame and 30%–50% more in requested financial damages.

Variation in agentivity can also be achieved through the use of other grammatical structures, notably passive voice and nominalization (Pinelli & Zanchi, 2021). In the nonagentive sentence from Table 1, "Protesters shot during clash with officers outside Texas church service", although both verbs are transitive, the people responsible for the shooting (the officers), are not linked directly to the agent, and are instead made a constituent of the *clash*, leaving some ambiguity about who was responsible. In contrast, the purely passive construction counterpart sentence, "Protesters shot by officers outside Texas church service," clearly identifies the agent with the "by" phrase.

Linguistic Factors in Analysis As I will detail in the following section, the linguistic contrast of focus is between Passive Nonagentive headlines and Active Agentive headlines. This contrast was delineated in order to maintain standard use of the main transitive verb (shot) across all headlines. Please note that my later references to the labels agentive and nonagentive only refers to present study's version, which includes passivity. It does not strictly refer to previous conceptualizations of agentivity in previous studies.

For the current study, I have identified four different hypotheses for each independent variable, and their interactions:

- H1 (Agentivity): Removing the mention of an explicit agent reduces perceptions of responsibility and blame, for the agent
- H2 (Agent Identity): The agent will be assigned more blame and responsibility for the event, regardless of status as law enforcement officer or not
- H3 (Participant Priors): Participants with a negative bias towards law enforcement would assign more blame and responsibility towards the officer, in all contexts
- H4 (Interaction): Participants with negative attitudes towards law enforcement would assign the **most** blame and responsibility, than any other population, in the following situation (Agent = officer; Grammar = agentive)

2 The Present Study

The experiment was distributed in June 2023 via Prolific. My hypotheses and research and analysis design were registered on the OSF registry (https://doi.org/10.17605/OSF.IO/NJCBS).

2.1 Materials and Methods

The experiment was developed using JsPsych (de Leeuw, 2015), making use of JavaScript, HTML, and CSS for implementing the study's functionalities.

Participants Participants were required to reside in the United States and to be adults fluent in English. 127 Prolific users completed the survey and paid \$1.50 upon completion. Approximately 78% of participants identified as white, and 45% of participants were Democrats. 23% of participants were between the ages of 25-34, and 60% identified as women. Figure 1 categorizes participant population by age, race, gender and political party. The most popular participant pool involve white, female Democrats that were 55+ in age.

Section 3.2 provides more information on how Trust and attitudes towards police were calculated for each participant. In general, a higher, positive value correlated to a higher level of trust in police. As evidenced by Figure 2, Trust appeared to have a negative correlation with age, as older individuals reported higher levels of trust towards police. Moreover, more Republicans appeared to express more trust towards police officers, as well.

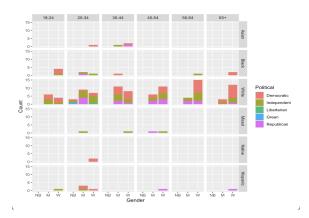


Figure 1: Participant Demographic Profile by Age, Race, Gender and Political Party

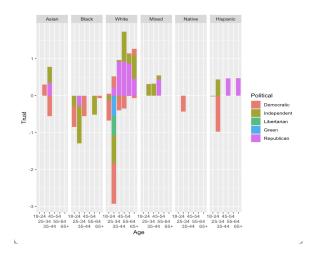


Figure 2: Average Participant Trust levels by demographic information

Stimuli The stimuli included 16 different headline topics, 8 of which were Target or Control headlines. Table 2 provides an example of control and target sentences for a given topic.

All target sentences depicted a violent, police-related event, in which an individual was shot and killed. For each Target headline, there were four different versions of the same headline that ranged in agentivity (agentive vs nonagentive) and identity of the agent (aw enforcement officer vs person).

The control sentences depicted a range of violent events that did not involve a law enforcement officer as one of the main semantic roles. Each headline had two different versions that solely ranged in agentivity. As such, there were 48 different headlines that a participant could view.

All agentive Headlines involved an active sentence construction with a clearly defined agent. All nonagentive headlines involved a passive sentence construction with an agent that was obscured by pairing the individual with a preposition (with, during or after) that referred to a hostile situation that is implied to have either lead to the violent action.

Table 2: Examples Stimuli

	Control	Target		
		Police Agent	Police Patient	
Agentive	Father beats drunk driver after Cobb County crash	Jacksonville police officer fatally shoots man during confrontation	Jacksonville man fatally shoots police officer during confrontation	
Nonagentive	Drunk driver beaten after Cobb County crash with father	Jacksonville man fatally shot during confrontation with police officer	Jacksonville police officer fatally shot during confrontation with man	

2.1.1 Experimental Design

Procedure On each trial, participants read a headline about a violent event. All participants saw at least one of the 16 topics once, but were randomly assigned to variations in how it was described, using a 2 X 2 design. The first level of randomization was for narrative structure. Participants were randomized to one of four structures: (1) Agentive, (2) Nonagentive. The second level of randomization determined whether the agent was the law enforcement officer, or the other individual in the headline. Participants were then asked the following attention check questions:

- 'Who was harmed?'
- 'Who caused the harm?'

Each question was presented with an choice to select either the patient or the agent of the sentence. Participants also had the option to designate another individual. For all target trials, participants who did not select "Other," correctly identified the patient as the harmed individual, and the agent as the harmer. Generally, any "Other" answers pertained to the *harmer* in nonagentive headlines, where participants often claimed that either there wasn't enough information to determine the harmer, additional unmentioned individuals may have been involved, or that the shooting and hostile situation were separate events (man **shot** vs **confrontation**).

The main experimental question(s) would be presented on the following screen, where a likert table displayed the prompts: 'Who is to blame for the harmful event?' and 'Who is responsible for the harmful event?'. For these two questions, participants could identify the appropriate level of attribution according to the following 1-5 scale: ("Only the (Agent1)", "Mostly the (Agent1)", "Both the (Agent1) and (Agent2) equally", "Mostly the (Agent2)", and "Only the (Agent2). For the target headlines, the law enforcement officer was always designated as Agent1, and would therefore correspond to the lower values.

Although participants were given the option to assign both Blame and Responsibility to the different social actors, the various visualizations and regression analyses did not appear to demonstrate a much different effect between the two attribution scores. As such, the current paper only relates the various predictor variables to Blame¹, as the analysis of Responsibility assignments did

¹Given the fact that the current paper is limited to 4000 words, I chose to focus on the regression relationships to

not appear to provide any new information to the overall point. In future analyses and papers, the effect on responsibility will be considered and discussed at length.

Once participants completed the experimental questions, they were then prompted to a demographic survey. In addition to filling out general information related to gender, age, race, as well as their political leanings. Importantly, they also completed the following yes/no questions inquiring about their global views on policing, general trust and confidence in law enforcement (Camp et al., 2021; Maguire et al., 2017):

- Do you generally trust the police?
- Do the police usually listen to people's views before making a decision?
- Do the police respect a person's basic rights?
- Do you think that the police are generally honest?

3 Results

3.1 Agent Identity and Agentivity

3.1.1 Agent Identity

Figure 3 shows the mean blame assignments by agent identity².

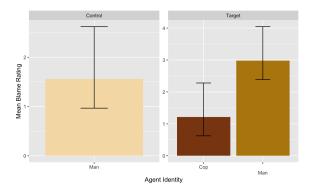


Figure 3: Mean Blame Ratings grouped by Agent Identity

In regards to the Target trials, headlines involving a cop agent led to lower blame scores, whereas headlines involving a non-cop agent led to higher blame scores. However, this effect was expected, given the role of the agent. The perception of blame was presented on a likert scale (1= Cop is fully to blame, 5 = non-cop is fully to blame). The visualization demonstrates that the identity of the agent has an effect in how Blame was assigned, in that the agent was generally assigned more blame. Although the graph suggests blame values to be lower, numerically, in the control trials, the fact

blame, in greater detail

²For all plots describing any effect of agent identity, all non-law enforcement agents (protesters, fisherman, teacher, etc.) were coded as "Man" for the various visualizations and regression models.

that the headlines did not involve a cop vs non-cop interaction. Therefore, the numerical values do not correspond the same scale, as the target trials. The mean blame rating for the control trials are still included for visualization purposes, as the effect of agent identity only pertains to the Target trial.

3.1.2 Agentivity

Figure 4 shows the mean blame assignments by agentivity. The current visualization demonstrates that agentivity, on its own, did not have much of an effect on Blame assignments.

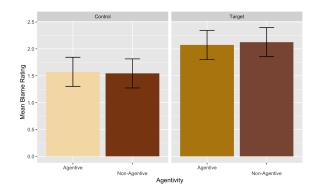


Figure 4: Mean Blame Ratings grouped by Agentivity

Considering the little differences in blame attribution between the target and control sentences, the current analysis was interested in first determining whether or not there was a significant difference in blame ratings between the two trial types. Despite the lack of police mention, we hypothesized that the overall effect of agentivity would produce statistically similar ratings across trial types, regardless of whether or not blame assignments would differ based on grammatical type (Fausey & Boroditsky, 2010).

In order to compare attribution ratings between the Target and Control headlines, I conducted a mixed-effects linear regression models³. The model compared the fixed effects and interactions between agentivity and trial type, and included random intercepts and slopes for individual participants and headline performances. As expected, the model produced no significant main effects or interactions for any of the variables, suggesting that there was not a difference in attributions across the two trial types, when only considering agentivity.

3.1.3 Agentivity and Agent Identity

Figure 5 shows the mean blame assignments by agent identity and agentivity. The interaction between the two variables demonstrates an interesting effect. As evidenced by the target data, participants interpretation of the headline was highly influenced by the identity of the agent, given the corresponding blame levels between the man and cop headlines. However, agentivity also appears

³ All mixed effects analyses reported in this paper were conducted with the lme4 package (Bates, M¨achler, Bolker, & Walker, 2015) in R (R Core Team, 2017)

to provide a slight effect, given the fact that non-agentive headlines with a non-cop agent yield slightly lower blame assignments (in other words, less blame was assigned to the non-cop individual). Similarly, the slightly higher mean blame rating for the nonagentive cop headlines also suggest that participants assigned slightly less Blame to the cop in these grammatical constructions. All in all, the target means suggest that agent identity has a large effect on blame assignments, that is only slightly mitigated by agentivity.

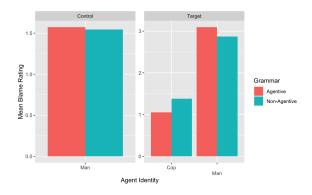


Figure 5: Mean Blame Ratings grouped by Agent Identity and Agentivity

In order to assess whether the grammatical structure or semantic role of headline had an effect on blame assignments, I conducted a mixed-effects linear regression models⁴. The model examined the relationship between blame ratings and the agentivity of a target headline (reference level = agentive), the identity of the agent (reference level = cop) and their interaction. This model also included random intercepts and slopes to account for the nesting of data within the different Headlines and individual participants, respectively.

The effect of the man (non-cop) as the semantic agent was significant ($\beta=2.0328$, SE = 0.1375, t = 14.787, p < 0.0001). This demonstrates the expected effect that was visualized in Figure 3, in that headlines involving a non-cop agent yielded high Blame amounts. Our model also suggests that the interaction between nonagentive constructions and non-cop agent identity demonstrated a significant effect as a negative relationship to blame rating ($\beta=-0.5209$, SE = 0.1733, t = 3.005, p < 0.01). This suggests that more Blame was attributed to the law enforcement officers in nonagentive constructions, despite agent identity.

I ran additional regressions which compared control ratings to target ratings of specific sentences, distinguished by agent identity. In other words, the overall performance of control headlines was compared to either target sentences with a cop or a non-cop agent. Like previous models, the interaction between trial type and agentivity was included, alongside random intercepts and slopes regarding headline type and individual participants. The first model did not produce a significant difference between control ratings and target ratings with a cop agent, but the other model produced a main effect of Trial type (reference = Control) ($\beta = 1.54077$, SE = 0.46157, t = 3.338, p < 0.05). In other words, among sentences that involved a non-cop agent, blame ratings within the target

⁴All mixed effects analyses reported in this paper were conducted with the lme4 package (Bates, M¨achler, Bolker, & Walker, 2015) in R (R Core Team, 2017)

condition were stressed towards the agent and, on average, 1.5 points higher than control sentences.

This result is corroborated by Figures 3 and 5, as target headlines of type "man" were approximately 1.5 points higher than the control headlines. The statistically significant difference between trial types suggests that participants assigned blame differently by trial type. In understanding the specific factor(s) that may have influenced this difference, the sole difference between the target and control trials involved whether or not police officers were mentioned. As such, the lack of a significant interaction or main effect with agentivity suggests that *police activity* may have affected this significant difference.

3.2 Global Trust

The purpose of the questions inquiring about participant trust in law enforcement was to determine their general attitudes towards cops. In order to calculate their attitudes towards cops, a Confirmatory factor analysis (CFA) was conducted, using the *lavaan* package in R. A CFA is a multivariate statistical procedure that is used to test how well measured variables represents a construct or outcome.

Trust and Political leaning was treated as a latent variable, as I sought to determine how much each participant trusted police officers, by virtue of their experimental answers. I also included an additional latent variable to represent participant political leanings by virtue of their self-reported political party, and measurements on the conservative and liberal scales.

The model linked the variables to the experimental responses on policing and political attitudes and appeared to fit the data very well according to multiple fit indices (CFI = 0.985; TLI = 0.977; RMSEA= 0.075). Conventional CFA analyses believe Root Mean Square Error of Approximation (RMSEA) values of .06 to .08 to constitute a good fit. For the Confirmatory Fit Index (CFI) and the Tucker–Lewis Index (TLI), values greater than 0.95 indicate close fit (Maguire et al., 2017). However the composite reliability of the two measures differed. While trust produced a high index of 0.923, the measure of political attitudes produced a 0.494, which were estimated using coefficient omega (Ω) .

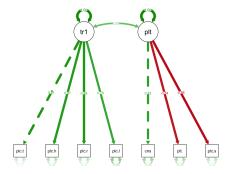


Figure 6: Structural equation model for Trust measurement

Figure 6 illustrates the general form of the simple, structural equation model being tested. The following interpretation of the model is adapted from Maquire et al. (2017). The squares represent

the observed variables and circles at the top represents the latent variables, 'Trust' and 'Political leaning'. The curved two-headed arrows represent correlations, and straight arrows represent causal effects. The straight arrows that link the observed variables to the latent outcomes represent the structural (regression) part of the model. The straight arrows linking the outcomes to the observed variables represent part of the measurement (confirmatory factor analysis) model. Lastly, the short arrows pointing from right to left into the observed variables represent error terms.

Participant estimated latent values for Trust were then calculated using R's lavPredict() function (Plieger et al., 2020). As these estimated values represent the best estimates of the participant's political attitudes, as well as their overall attitude towards police, the output was then used in further models to estimate the effect of participant trust on blame ratings.

According to the model, a high positive score for Political leaning correlated with a more conservative view. On the other hand, high positive Trust score also correlated with a more positive attitude towards law enforcement officers. The correlation coefficient between the two values demonstrated a moderately positive relationship (r=0.6), which is supported by Figure 7. The figure plots participant trust by political attitude, suggesting that participants who demonstrated more conservative views appeared to also maintain more positive attitudes towards law enforcement officers.

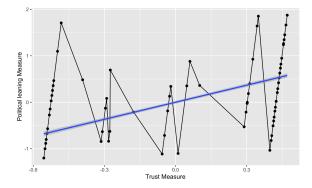


Figure 7: Plot of participant political attitudes and attitudes towards police

All indicators are listed in Table 3 together the CFA factor loadings. The factor loading values are uniformly strong, ranging from approximately -0.843 to 0.911. The strongly negative factor loadings for the Liberal and Political Party scale demonstrate its positive correlation with conservatism, given the fact that the higher values on the scales referred to more liberal political views. Responses on the individual Trust indicators were also binarized (1 = Yes; 0 = No).

Figure 8 compares the effect of participant Trust levels on mean blame assignments between the two trial types. Evidently, the plot for the target trial demonstrates a clear effect of participant trust, where individuals with more positive attitudes towards cops appeared to assign even more to the non-cop individual, generally. The next set of models extend this effect, by considering the incorporation of other variables.

Figure 9 graphs the interaction between trust, agent identity, and the effect on blame assignments within the Target trials. Interestingly enough, the graph illustrates that, when the cop was

Table 3: Standardized CFA factor loadings for Trust

Indicator	Factor Loading
Trust in Police	0.911
Police are honest	0.872
Police Respect	0.889
Police Listen	0.776
Conservative Scale	0.816
Political Party	-0.843
Liberal Scale	-0.884
	Trust in Police Police are honest Police Respect Police Listen Conservative Scale Political Party

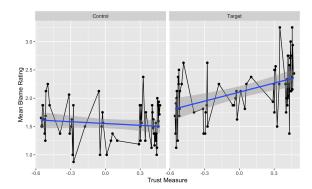


Figure 8: Plot comparing mean Blame assignments by Participant Trust between the two Trial types

presented as the agent, as participant trust in police increases, the level of blame attributed to the non-cop individual also increases. On the other hand, when the non-cop individual was presented as the agent, the level of blame attributed to the non-cop agent also increases, as participant trust in police increased. The plot suggests a clear effect of participant trust on blame attribution, in that individuals with positive attitudes towards cops appeared to downgrade towards them, regardless of agent identity.

The final model, Figure 10, illustrates the interaction between the four main variables of analysis. In considering the effect of Trust, agentivity and agent identity on Blame assignments, the present figure suggests that all three independent variables provide some sort of effect. To start, the effect of trust remains clear, in that individuals with higher Trust values appeared to allocate more blame towards the non-cop individual, generally. In considering the effect of Agent Identity, participants appeared to assign slightly more Blame towards the non-cop when they were identified as the agent. In contrast, there appeared to be less of an outright effect of agent identity in cases when the role was the police officer.

In considering the interaction between all three variables, the question of interest revolves around whether there was a larger effect on Blame assignment, for particular grammatical and social combinations. In honing in on the varying levels of Trust, the figure demonstrates that

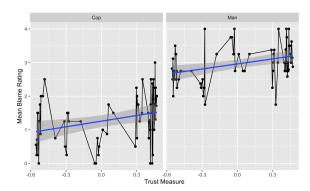


Figure 9: Plot illustrating mean Blame assignments by Agent Identity and Participant Trust, within Target Trials

participants with higher Trust values assigned Blame even more to the Non-Cop individual in the agentive sentence constructions, when compared to the nonagentive sentences. Likewise, individuals with lower Trust values appeared to assign the most Blame to the Cop within the agentive sentences. While the Figures 8-10 suggests that agentivity, agent identity and trust all had an effect on the blame assignments, the current analysis motivates an investigation as to whether or not the relationship between all four variables is statistically significant.

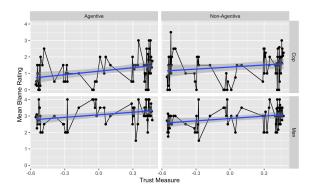


Figure 10: Plot graphing the relationship between Trust and mean Blame assignments, facet-wrapped for agentivity and agent identity

In order to assess whether the grammatical structure, participant prior attitudes and/or semantic role of a police officer had a significant effect on blame assignments, I conducted a mixed-effects linear regression. The model examined the relationship between blame ratings and the agentivity of a headline (reference level = agentive), the identity of the agent (reference level = Cop), the trust variable calculated in Section 3.2 and their interactions. The model also included by-headline and by-participant intercepts and slopes for agentivity and agent identity.

The independent effects of trust ($\beta=0.870757$, SE = 0.155864, t = 5.587, p < 0.0001), Man/Non-Cop agent identity ($\beta=2.031171$, SE = 0.136, t = 14.98, p < 0.0001), nonagentive category ($\beta=0.300$, SE = 0.145, t = 2.073, p < 0.1) all provided a significant effect in the prediction of Blame ratings. The interaction between Trust and Man/Non-Cop agent identity ($\beta=0.300$) and $\beta=0.300$.

-0.461692, SE = 0.209873, t = -2.200, p < 0.05), as well as the interaction between nonagentive headlines and man/non-cop agents (β = -0.519, SE = 0.173, t = -3.002, p < 0.01) all reached significance as well.

I ran additional models that included trust as a predictor, alongside trial type and agentivity. The models differed regarding the portion of target headlines included (all headlines, headlines with cop agents or headlines with non-cop agents). Like previous models, the regression also included random effects of participant and headline type. All resulting models produced a significant interaction between the target trials and participant trust values. The model that only compared the control sentences against headlines with a non-cop agent repeated the previous effect of trial type, where corresponding blame assignments were again, generally 1.5 points higher than control sentences ($\beta = 1.54077$, SE = 0.46239, t = 3.333, p; 0.05).

The model that included all target headlines produced the most significant interaction between trial type (reference level = control) and trust ($\beta = 0.765$, SE = 0.140, t = 5.453, p < 0.001), but the model also lacked an overall effect of either trust, agentivity or trial type on the blame assignments. The crossover interaction with trust and trial type, despite the lack of a main effect, suggests that not only does police mention influence blame attribution, but that these interpretations cannot be divorced from participant priors. Although our models accounting for the control trials could not include agent identity as a predictor, the significant effect of trust suggests that the identity of the agent, had an influence in how participants assigned blame, especially when headlines involved law enforcement personnel.

4 Discussion

The results of this study are consistent with theoretical perspectives at odds with the use of ambiguous grammatical structures when depicting violent events and situations (Bohner, 2001; Dickey, 2022; Kramer, 2020; Mastro et al., 2014; Moreno-Medina et al., 2022). Although questions surrounding systematic obfuscation of police responsibility in the media has received a great deal of attention in recent years, very rarely do studies consider whether or not certain linguistic cues has an effect on perception. Moreover, there has been even less work considering the implication and effect of prior bias on these interpretations.

The results of the present analyses provides clear and robust evidence that both participant attitudes and agent identity provide as much as an effect on Blame assignment, than agentivity. Considering empirical evidence demonstrating that media sources use more obfuscation when officer are the agent of a fatal encounter, relative to civilian homicides (Moreno-Medina et al., 2022), the current analysis indicates that the effect of narrative structure on interpretation is not limited to the grammatical type of the headline or sentence.

The present findings also specifically point to the unavoidable social consequence of individual attitudes, in that, although grammatical structures have a clear effect on interpretation, the dominating influence of individual attitudes and perspectives, on interpretation, maintains widespread prominence (Ecker et al., 2014). As such, the effect of Trust promotes questions of inquiry regarding whether or not it is possible for framing devices to surpass individual biases. What factors, if any,

motivate an individual, upon reading a new or troubling source of information, to change their mind or vote against their preconceived ideas?

References

- Association, A. P. (2020). Publication manual of the american psychological association 2020: The official guide to apa style.
- Balko, R. (2021). The curious grammar of police shootings. https://www.washingtonpost.com/news/the-watch/wp/2014/07/14/the-curious-grammar-of-police-shootings/
- Bohner, G. (2001). Writing about rape: Use of the passive voice and other distancing text features as an expression of perceived responsibility of the victim. British Journal of Social Psychology, 40(4), 515-529.
- Brandl, S. G., Frank, J., Worden, R. E., & Bynum, T. S. (1994). Global and specific attitudes toward the police: Disentangling the relationship. *Justice quarterly*, 11(1), 119–134.
- Camp, N. P., Voigt, R., Jurafsky, D., & Eberhardt, J. L. (2021). The thin blue waveform: Racial disparities in officer prosody undermine institutional trust in the police. *Journal of personality and social psychology*, 121(6), 1157.
- de Leeuw, J. R. (2015). Jspsych: A javascript library for creating behavioral experiments in a web browser. https://www.jspsych.org/
- Dickey, C. (2022). The elements of bureaucratic style. https://longreads.com/2017/04/12/the-elements-of-bureaucratic-style/
- Dukes, K. N., & Gaither, S. E. (2017). Black racial stereotypes and victim blaming: Implications for media coverage and criminal proceedings in cases of police violence against racial and ethnic minorities. *Journal of Social Issues*, 73(4), 789–807.
- Ecker, U. K., Lewandowsky, S., Chang, E. P., & Pillai, R. (2014). The effects of subtle misinformation in news headlines. *Journal of experimental psychology: applied*, 20(4), 323.
- Entman, R. M. (2007). Framing bias: Media in the distribution of power. *Journal of communication*, 57(1), 163–173.
- Fausey, C. M., & Boroditsky, L. (2010). Subtle linguistic cues influence perceived blame and financial liability. *Psychonomic bulletin & review*, 17(5), 644–650.
- Ferreira, F. (2021). In defense of the passive voice. American Psychologist, 76(1), 145.
- $\label{lem:kramer} Kramer,\,M.\,\,(2020).\,\,How\,\,bureaucratic\,\,language\,\,strangles\,\,journalism's\,\,accountability.\,\,https://www.\,\,poynter.org/reporting-editing/2017/how-bureaucratic-language-strangles-journalisms-accountability/$
- Maguire, E. R., Lowrey, B. V., & Johnson, D. (2017). Evaluating the relative impact of positive and negative encounters with police: A randomized experiment. *Journal of experimental* criminology, 13, 367–391.
- Mastro, D., Tukachinsky, R., Behm-Morawitz, E., & Blecha, E. (2014). News coverage of immigration: The influence of exposure to linguistic bias in the news on consumer's racial/ethnic cognitions. *Communication Quarterly*, 62(2), 135–154.

- Moreno-Medina, J., Ouss, A., Bayer, P., & Ba, B. A. (2022). Officer-involved: The media language of police killings (tech. rep.). National Bureau of Economic Research.
- Pinelli, E., & Zanchi, C. (2021). Gender-based violence in italian local newspapers: How argument structure constructions can diminish a perpetrator's responsibility. In *Discourse processes between reason and emotion: A post-disciplinary perspective* (pp. 117–143). Springer.
- Plieger, T., Grünhage, T., Duke, É., & Reuter, M. (2020). Predicting stock market performance.

 Journal of Individual Differences.
- Toolan, M. J. (2013). Narrative a critical linguistic introduction. translated by abolfazl hori. *Tehran:* Niloofar.
- Verhaeghen, P., & Aikman, S. N. (2022). Police as threat: The influence of race and the summer of black lives matter on implicit and explicit attitudes towards the police. *Journal of community psychology*, 50(8), 3354–3370.
- Ziems, C., & Yang, D. (2021). To protect and to serve? analyzing entity-centric framing of police violence. arXiv preprint arXiv:2109.05325.