Photographs Elevate Truth Judgments About Less Well-Known People (But Not Yourself)

Erica Abed
Claremont Graduate University, United States

Elise Fenn
California State University Northridge, United States

Kathy Pezdek
Claremont Graduate University, United States

When people judge the veracity of statements, nonprobative photos increase “true” responses relative to when statements appear alone—“truthiness.” Two experiments tested whether photos influence truth judgments about people’s personality traits as a function of the amount of knowledge possessed about the target person. In Experiment 1, participants indicated whether traits described an unknown person presented with varying amounts of descriptive information. Photos inflated truth judgments only with minimal information provided. In Experiment 2, photos inflated truth judgments for an unknown person but not for a best friend or one’s self. When judging veracity, photos help prime related thoughts and images, increasing processing fluency, a metacognitive cue to truth. Consistent with findings that fluency effects result from the discrepancy between expected and actual fluency, it appears that it is the amount of information primed by the photo to that primed by other sources that affects how photos influence truthiness.

General Audience Summary

In light of the fact that every day, people are inundated with a wealth of photos from many different sources (e.g., advertisements, newspapers, social media, etc.), it is important to understand the effect these photos have on our understanding of and response to information. According to previous research, when information is presented alongside a photo, people are more likely to think that information is true, even when the photo doesn’t provide any information about the truth of a statement (e.g., Newman, Garry, Bernstein, Kantner, & Lindsay, 2012). We tested whether photos can similarly affect people’s judgments about personality traits, and if it matters whether the person being judged is well-known (i.e., the self or a best friend) or not at all known (i.e., a stranger). We found that people were more likely to say that personality traits were descriptive of a stranger when the personality trait appeared alongside a trait-descriptive photo than when the personality trait appeared by itself. However, photos did not affect judgments about well-known people (the self or a best friend), and when we gave people background information about a stranger, photos no longer affected personality judgments about them, either. These results may indicate that photos can affect our judgments about people, but only if we don’t have much information about them.

Keywords: Truthiness, Self-judgments, False memory, Judgment and decision making
“A picture is worth a thousand words.” This adage conveys the significance that people assign to photos. Photos convey a wealth of information that can enhance the conceptual understanding of a statement. Alternatively, photos can be “nonprobative,” that is, conceptually related to a statement but providing no evidence to support its veracity. Researchers have reported that when making rapid truth judgments about statements, nonprobative photos accompanying the statements (e.g., “turtles are deaf”) can increase the likelihood that participants will respond “true” to those statements regardless of the actual veracity of the semantic information. These rapid intuitive feelings of truth are referred to as “truthiness,” a term coined by Stephen Colbert (Fenn, Newman, Pezdek, & Garry, 2013; Newman et al., 2012).

In the absence of evidence, how do people make rapid judgments about whether information is true or false? One answer is that people rely on metacognitive cues such as the ease with which information is processed—processing fluency—to determine whether a statement is true (Alter & Oppenheimer, 2009). Statements that are easier to process perceptually (e.g., presented in an easier-to-read font compared to a difficult-to-read font), or conceptually (e.g., semantically primed) are more likely to be (a) evaluated as true (Reber & Schwarz, 1999) or (b) falsely remembered (Whittlesea, 1993). Nonprobative photos may function similarly, increasing the processing fluency of statements by serving as a memory cue that boosts the ease of retrieving related information.

It appears from previous research that nonprobative photos are more likely to affect truth judgments for unfamiliar than familiar stimuli. For example, dead or alive truth judgments are inflated for unfamiliar celebrities (e.g., “John Key is dead/alive”) but not familiar celebrities (e.g., “Stephen King is dead/alive”), and truth judgments are inflated for difficult trivia statements (e.g., “Turtles are deaf”) but not easy statements (e.g., “The player who guards the net in soccer is called the goalie”; Newman et al., 2012). However, because these studies involve making truth judgments about objective factual statements, presumably based on some real knowledge, it is not surprising that more knowledge about the target stimuli affects the influence of the photo. For example, any related information about a turtle that already exists in memory (e.g., turtles can swim) may be primed by a photo of a turtle, and subsequently may make the statement, “turtles are deaf,” easier to process, making it feel more familiar. Because previous truthiness studies have used stimuli for which an unspecified amount of related (yet nonprobative) knowledge likely existed in memory, the true role of the amount of background knowledge on truthiness remains unclear. In our study participants made judgments about targets for which no related knowledge existed in memory.

Why might background knowledge moderate the effect of photos on truth judgments? We predict that if a great deal of background knowledge about a statement is available, that statement will be processed with a high level of fluency even when no photo is present (see Whittlesea & Williams, 1998, 2000). Thus, the relative amount of information primed by an accompanying nonprobative photo will be small, causing any additional processing fluency to be minimal or discounted. This hypothesis is consistent with the fluency-conditional model proposed by Fazio, Brashier, Payne, and Marsh (2015). According to this model, in evaluating the veracity of a statement people (1) automatically assess the processing fluency of the statement and then (2) if processing fluency is high and there is no obvious reason to discount the high fluency, they rely on that processing fluency to decide veracity, or (3) if processing fluency is low, they then search memory for information to decide veracity. According to this model, when people have a reason to discount processing fluency or if processing fluency is low, they should rely on existing background knowledge to decide veracity.

Indeed, according to the discrepancy-attrition hypothesis (Whittlesea & Williams, 1998), processing fluency alone does not affect judgments; rather, it is the discrepancy between expected and actual processing fluency that is important (see also Whittlesea & Williams, 2000). In other words, people must be “surprised” by the fluency with which a stimulus is processed to experience feelings of familiarity, an explanation that supports Newman et al.’s (2015) finding that photos inflate truthiness only when manipulated within, rather than between subjects. In addition, when a great deal of background knowledge exists about a to-be-judged statement, that statement is predicted to be processed fluently even when no photo is present. Thus, the contribution to boosted fluency by a nonprobative photo should be relatively lower when more rather than less background knowledge exists about a statement. In other words, when there is more information present in memory, then the discrepancy between actual and expected fluency should be smaller. Similarly, using a related paradigm involving the illusory truth effect, Srull (1983) reported that self-rated car experts showed a smaller truth bias to endorse repeated statements about cars than non-experts. A similar effect was reported by Parks and Toth (2006) in a task that required rating known and unknown companies.

Research on memory suggestibility also suggests that background knowledge may affect the impact of fluency manipulations—a relevant finding considering that a nonprobative photo may function as a source of suggestibility. Generally, smaller effects of suggestibility have been reported on memory for better-known stimuli. Relevant findings include (a) more suggestibility for information viewed only once (i.e., a weaker memory trace) than repeatedly (i.e., a stronger memory trace; Pezdek & Roe, 1995), and (b) more suggestibility after a longer (1 month) than shorter (10 min) delay (Underwood & Pezdek, 1998). Taken together, these findings suggest that increased knowledge for and familiarity with stimuli can reduce the impact of suggestive influences (e.g., a nonprobative photo) when evaluating the truth of related stimuli.

Our study explores whether nonprobative photos inflate subjective truth judgments about personality traits of people who vary in how well they are known, from unknown people to people who are relatively better-known or even very well-known. The proposed mechanism for the effect of photos on truth judgments is that when judging the veracity of a statement, photos help prime related thoughts and images and the resulting ease
of retrieval is used as a metacognitive cue for judging veracity (Newman et al., 2015). However, when a relatively larger amount of background knowledge exists about a statement, the statement is predicted to be processed relatively fluently already (see Whittlesea & Williams, 1998, 2000) because of the priming of the related content-based information. We predict that it is the amount of information primed by the photo relative to that primed by other sources (i.e., content-related information primed by the actual target stimulus) that influences the effect of a photo on truthiness; further, when there is more information present in memory, then the discrepancy between actual and expected fluency should be smaller. Accordingly, nonprobative photos are predicted to have a greater impact on truth judgments when there is less background information in memory about the to-be-judged target. This is consistent with the fluency-conditional model of Fazio et al. (2015), that people are more likely to search their memory for evidence of truth when general processing fluency cues are discounted or absent. It is through this mechanism that background knowledge is predicted to moderate the impact of nonprobative photos on truthiness.

In two experiments, we test the extent to which the amount of background knowledge possessed about a target person influences the effect of nonprobative photos on truth judgments about that person. In Experiment 1, participants made subjective truth judgments about the personality traits of a hypothetical unknown person. The amount of descriptive information that we provided about the person was varied to include low, medium, or high knowledge. In both experiments, each trait was either accompanied by a nonprobative photo or not, varied within subjects. Experiment 2 tests whether background knowledge moderates the effect of photos on truthiness when knowledge is naturally occurring and pre-existing rather than experimentally manipulated. Participants made truth judgments about whether personality traits described (a) an unknown person, (b) their best friend, or (c) themselves.

**Experiment 1**

**Method**

**Participants and design.** In both experiments, data were collected using Amazon’s Mechanical Turk (MTurk). Multiple studies have replicated truthiness with student and MTurk populations (see Cardwell, Henkel, Garry, Newman, & Foster, 2016; Newman et al., 2015), and other researchers have reported similar results for studies run on MTurk and in-person participants (Buhrmester, Kwang, & Gosling, 2011). In both of our experiments, participants were excluded if they consulted with family or friends regarding the events presented, had technical issues (such as computer glitches), or indicated a first language other than English. Further, participants were eliminated if they indicated (a) that their name or the name of a close friend or family member was Avery, or (b) that they were thinking of a specific person in their life named Avery when making judgments. After eliminating participants who met these criteria, there was a final sample of 352 adults (M age = 36.0 years, SD = 11.37; 56% female). In both experiments, the dependent variable was truth judgments measured on a scale from 1 (definitely false) to 9 (definitely true), as used in Newman et al. (2015; Exp. 4). Experiment 1 is a 2 (photo or no-photo) × 3 (target knowledge: low, medium, or high) mixed design with photo as the within-subjects variable. The sample size per condition is presented in Table 1.

**Materials and procedure.** Participants were told that they would view a series of personality traits, and were instructed

---

**Table 1**

<table>
<thead>
<tr>
<th>Target condition (n)</th>
<th>Mean (SD)</th>
<th>95% confidence interval for effect size</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Pilot study</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>“Avery,” low knowledge (n = 128)</td>
<td>Photo: 4.72 (1.14)</td>
<td>[0.28, 0.62]</td>
</tr>
<tr>
<td></td>
<td>No photo: 4.27 (0.88)</td>
<td></td>
</tr>
<tr>
<td><strong>Experiment 1</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>“Avery,” low knowledge (n = 113)</td>
<td>Photo: 4.55 (1.31)</td>
<td>[0.18, 0.53]</td>
</tr>
<tr>
<td></td>
<td>No photo: 4.20 (0.94)</td>
<td></td>
</tr>
<tr>
<td>“Avery,” medium knowledge (n = 112)</td>
<td>Photo: 3.75 (0.98)</td>
<td>[0.00, 0.24]</td>
</tr>
<tr>
<td></td>
<td>No photo: 3.63 (0.88)</td>
<td></td>
</tr>
<tr>
<td>“Avery,” high knowledge (n = 127)</td>
<td>Photo: 3.43 (0.75)</td>
<td>[−0.02, 0.18]</td>
</tr>
<tr>
<td></td>
<td>No photo: 3.36 (0.77)</td>
<td></td>
</tr>
<tr>
<td><strong>Experiment 2</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>“Avery,” low knowledge (n = 96)</td>
<td>Photo: 4.57 (1.22)</td>
<td>[0.17, 0.52]</td>
</tr>
<tr>
<td></td>
<td>No photo: 4.22 (0.93)</td>
<td></td>
</tr>
<tr>
<td>Best friend (n = 126)</td>
<td>Photo: 4.03 (0.93)</td>
<td>[−0.10, 0.17]</td>
</tr>
<tr>
<td></td>
<td>No photo: 4.00 (0.94)</td>
<td></td>
</tr>
<tr>
<td>Self (n = 122)</td>
<td>Photo: 4.23 (1.05)</td>
<td>[−0.13, 0.15]</td>
</tr>
<tr>
<td></td>
<td>No photo: 4.22 (1.13)</td>
<td></td>
</tr>
</tbody>
</table>

**Note:** Truth judgments measured on a scale from 1 (definitely false) to 9 (definitely true).
to indicate on a scale from 1 (definitely false) to 9 (definitely true) whether they thought each word described a hypothetical person named “Avery.” Before viewing the adjectives, participants were randomly assigned to one of the three knowledge conditions and read the description of Avery presented in that condition. The text used to describe Avery in each of the three knowledge level conditions is presented in the Appendix. Participants then viewed a series of 32 single-word adjectives presented one at a time. Participants were randomly assigned to one of two photo counterbalance conditions, which were the same for each level of knowledge. In each counterbalance condition, half of the adjectives were presented with a photo and half without, and each participant viewed the adjectives in a different random order. Adjectives that appeared with a photo in one counterbalance condition appeared without a photo in the other counterbalance condition and vice versa. Examples of two adjective–photo pairs are presented in Figure 1. Across participants in each knowledge condition, each adjective appeared approximately equally often with and without a photo. Consistent with previous truthness experiments, the sequence was self-paced, although participants were instructed to answer each question as quickly as possible without making any mistakes. Stimuli were from the database of personality trait words rated by Anderson (1968). Items were selected for inclusion in this study if they were rated moderately on likableness, had a small likableness variance, and were rated high on meaningfulness. Synonyms were eliminated, as well as words for which a related nonprobative photo could not be found. The nonprobative photos were selected by using a Google image search to select a color photo that was related to each adjective.

Results and Discussion

A 2 (photo condition) × 3 (target knowledge) mixed factorial ANOVA was conducted on ratings of truth judgments. Descriptive statistics for each condition are reported in Table 1 along with the 95% confidence intervals for unstandardized effect sizes. Consistent with previous truthness findings, there was a significant main effect of photo $F(1, 349) = 22.31, p < .001$; $\eta^2_p = .06$. The main effect of target knowledge was also significant, $F(2, 349) = 38.97, p < .001$; $\eta^2_p = .18$. These effects were qualified by a significant photo × target knowledge interaction in the predicted direction, $F(2, 349) = 4.73, p = .009$; $\eta^2_p = .02$. Planned comparisons revealed that with low knowledge of the target person, mean truth judgments were higher in the photo ($M = 4.55, SD = 1.31$) than the no-photo condition ($M = 4.20, SD = .94$; $t(112) = 3.97, p < .001$). This difference was smaller but still significant in the medium knowledge condition (photo: $M = 3.75, SD = 0.98$; no-photo: $M = 3.63, SD = .88$; $t(111) = 2.06, p = .042$). However, in the high-knowledge condition, mean truth judgments in the photo ($M = 3.43, SD = .75$) and no-photo conditions ($M = 3.36, SD = .77$) did not significantly differ, $t(126) = 1.51, p = .134$.

Results of Experiment 1 suggest that the impact of photos on subjective truth judgments decreases with increasing knowledge in memory about the target. Current accounts of truthness (see Newman et al., 2015) suggest that photos help prime related thoughts and images when making rapid judgments under uncertainty, thus boosting processing fluency, a cue to truth. What our results add to this account is that when a person has more background knowledge about a judgment target, the relative increase in processing fluency contributed by a photo has less impact on truth judgments than when a person has less background knowledge about a judgment target. This finding is in line with the discrepancy-attribution hypothesis (Whittlesea & Williams, 1998). In other words, the discrepancy between actual and expected fluency is smaller when there is more rather than less information about a target present in memory. Our results are also consistent with the fluency-conditional model of Fazio et al. (2015) in which it is proposed that people are more likely to search their memory for evidence of truth when general processing fluency cues are discounted.

---

1 The name Avery was chosen because it was rated as the most popular gender-neutral name in 2014 by a number of baby name websites.

2 To support the replicability of this effect, we also report in Table 1, data from a pilot study (a single factor: photo or no photo within-subjects design). This pilot study was exactly the same as the low-knowledge condition in Experiment 1.
Experiment 2

Experiment 2 tests the replicability of these findings with target people for whom there are pre-existing levels of background knowledge including: (a) an unknown person (the hypothetical unknown person Avery, replicating the low knowledge condition in Experiment 1), (b) a best friend, or (c) the self. Further, Experiment 2 tests whether truthiness applies to judgments about the self. Can judgments about your own personality traits be affected by accompanying nonprobative photos? Although results of Experiment 1 suggest that photos do not affect judgments of truth for well-known targets, judgments about the self may be different from those made about other well-known people. In fact, one truthiness study reported an effect of photos on judgments of one’s own actions. Cardwell et al. (2016) reported that truth judgments for episodic, self-performed events were inflated by the presence of a photo. Participants either gave food to, or took food from, animals by dragging a food icon from a food bag to a food bowl or vice versa. When asked later if they had given food to each animal, truth judgments were higher when a photo appeared with each animal name. These results suggest that truth judgments about one’s own recently-performed actions can be influenced by nonprobative photos.

But do Cardwell et al.’s (2016) findings apply as well to non-episodic judgments such as the subjective personality judgments made in the current study? Research on the difference between semantic and episodic autobiographical memory would suggest that the answer is “no.” According to Klein, Loftus, and Plog (1992), trait-knowledge about the self is semantic; people do not need to retrieve specific episodic memories to decide whether a trait is self-descriptive (see Klein, Cosmides, Tooby, & Chance, 2002 for a review of the differences between semantic and episodic self-judgments). Further, evidence from patients with neural damage suggests that trait knowledge about the self can remain intact even when episodic retrieval is impaired (Klein & Lax, 2010; Klein, Loftus, & Kihlstrom, 1996). Together, this evidence that semantic trait judgments about the self function differently from episodic judgments about the self leads to our hypothesis that photos are not likely to affect truth judgments regarding traits about oneself or one’s best friend. Experiment 2 tests this hypothesis.

Method

Participants and design. After applying the exclusion criteria, there was a final sample of 344 adults (M age = 35.5 years, SD = 11.71; 50% female). This experiment is a 2 (photo or no-photo) × 3 (target person: Avery low-knowledge, best friend, self) mixed design with photo as the within-subjects variable. The sample size per condition is presented in Table 1.

Materials and procedure. The unknown target condition was an exact replication of the low knowledge condition in Experiment 1. In the self condition, each personality judgment was made about the participant him/herself. In the best friend condition, each personality judgment was made about a person who each participant considered to be their best friend. For this condition, participants provided the first name of their best friend at the beginning of the experiment, and the instructions included their friend’s name as a reminder of the judgment target.

Results and Discussion

A 2 (photo condition) × 3 (target person) mixed factorial ANOVA was conducted on ratings of truth judgments, with photo as the within-subjects variable. Descriptive statistics for each condition are reported in Table 1 along with the 95% confidence intervals for unstandardized effect sizes. Consistent with truthiness findings, there was a significant main effect of photo F(1, 341) = 8.93, p = .003; η² = .03. The main effect of target person was also significant, F(2, 341) = 4.47, p = .012; η² = .03. The photo × target person interaction was also significant, and again, in the predicted direction, F(2, 341) = 5.62, p = .004; η² = .03. Only for truth judgments made about Avery was the mean truth rating significantly higher in the photo (M = 4.57, SD = 1.22) than the no-photo condition (M = 4.22, SD = .93; t(95) = 3.94, p < .001). This result replicates the findings in the low knowledge condition in both our pilot study and in Experiment 1. However, for truth judgments made about a best friend, mean ratings did not differ between the photo (M = 4.03, SD = 0.93) and no-photo conditions (M = 4.00, SD = .94; t(125) = .505, p = .615). Similarly, for truth judgments made about the self, mean ratings did not differ between the photo (M = 4.23, SD = 1.05) and no-photo conditions (M = 4.22, SD = 1.13; t(121) = .145, p = .885).

These findings replicate the results of Experiment 1, providing further support for the hypothesis that photos are more likely to affect truth judgments about unfamiliar than familiar targets. The contribution to boosted fluency by content-free fluency cues such as a nonprobative photo is relatively less when more background knowledge exists about a judgment target. The critical finding here is that the difference between the effect of photos on judgments made about unfamiliar and familiar targets also occurs when targets are highly familiar people, for whom there is a wealth of background knowledge in memory. Further, this difference is similar for judgments about the self and one’s best friend.

General Discussion

Two experiments tested whether truth judgments about personality traits are inflated by the presence of a nonprobative photo as a function of how well known the target person is–unknown, relatively better-known, or even very well-known. We found that nonprobative photos inflated rapid truth judgments about relatively unknown target people, but were less likely to affect truth judgments about more familiar, better-known people. In both experiments, truth judgments about an unknown person (Avery) were inflated by the presence of a photo in the low knowledge condition. However, in Experiment 1, the effect of photo was diminished when we provided additional information about Avery in the medium knowledge condition and was eliminated in the high knowledge condition. Similarly, in Experiment 2, photos did not affect truth judgments about well-known targets for whom a wealth of background knowledge was preexisting—the self or one’s best friend.
Together, these results are consistent with the notion that when people judge the veracity of statements, photos help prime related thoughts and images and the resulting ease of retrieval is used as a metacognitive cue for truth (Newman et al., 2015). However, our study contributes further to an understanding of the cognitive mechanism underlying this effect. When a judgment target is well known (at the extreme, the self or a best friend), there is already a wealth of related background knowledge in memory. Consequently, the relatively small amount of information primed by a nonprobative photo results in a small discrepancy between actual and expected fluency and is thus insufficient to affect truth judgments (see Whittlesea and Williams, 1998, 2000). In contrast, when a judgment target is relatively less well known, people have little related background knowledge in memory. Consequently, the contribution of the photo will be relatively greater (resulting in a relatively larger discrepancy between actual and expected fluency) than when people have a significant amount of background knowledge about a target person. Thus, it is the amount of information primed by the photo relative to that primed by other sources that influences the effect of the photo on truthness. An alternative account of these findings is that the nonprobative photo may have seemed less relevant (and thus less influential) to relatively better-known targets. Future truthness research may investigate the role of photo-target relevance on truth judgments.

These results also further our understanding of the relationship between fluency and familiarity and the impact of these processing variables on truth judgments. According to the fluency-conditioned model of Fazio et al. (2015), people search memory for information upon which to judge veracity only when processing fluency is discounted or very low. Our results extend this model and suggest that the contribution of a nonprobative photo to processing fluency will depend on the amount of related domain-general background information available. When there is a significant amount of background knowledge, the strength of the fluency cue elicited by a nonprobative photo will be minimal compared to the strength of fluency elicited in the no-photo condition.

One might argue that there is a contradiction between Fazio et al.’s findings (that participants relied on fluency cues regardless of actual knowledge) and our findings (that background knowledge reduced reliance on fluency cues). However, these two findings are not, in fact, contradictory. In our study background knowledge was defined more generally (e.g., expertise on the target person’s personality); on the other hand, Fazio et al. defined knowledge as specific to each statement (e.g., for the statement, “Oslo is the capital of Finland,” participants were asked if they knew the actual capital of Finland, Helsinki). In fact, participants in our study could not have possessed specific knowledge regarding the truth of each statement, because the judgment of personality traits is subjective, not factual. Further, Fazio et al. suggest that the level of domain-general knowledge, as was manipulated in our study, could moderate truth biases such as the illusory truth effect.

Our finding that photos did not affect truth judgments about either the self or one’s best friend suggest first, that it is the amount of background knowledge about a target that is critical in this process and not whether the judgment is about oneself versus another person, and second, that similar cognitive processes underlie judgments for these well-known targets. Thus, although Cardwell et al. (2016) reported that truth judgments about self-performed events were inflated by the presence of a photo, their findings may be unique to the episodic nature of the events used in their study. Although truth judgments about one’s own recently performed actions can be influenced by nonprobative photos (e.g., Cardwell et al., 2016), the results of our Experiment 2 suggest that the effect of photos on truth judgments about one’s self may be different for non-episodic judgments such as subjective personality trait judgments. This interpretation is supported by findings of cognitive differences in processing semantic and episodic self-judgments (e.g., Klein & Lax, 2010; Klein et al., 1992, 1996). An important issue for future research is clarifying the relationship between background knowledge, nonprobative information, and truth biases for various types of self-judgments.

The practical applications of these findings are vast. Where do common myths come from: that hair and fingernails continue to grow after death; that lightning never strikes the same place twice; that a full moon alters behavior? One possible influence is the fact that these statements are frequently repeated and are often presented with accompanying photos. Also, many news sources pair articles with nonprobative photos. Strange, Garry, Bernstein, and Lindsay (2011) reported that participants who read true and false newspaper headlines later described memories of previously reading those headlines more often when they appeared alongside nonprobative photos than alone. Given our finding that background knowledge moderates the impact of photos on truth judgments, it may be that with more background knowledge about a topic, the influence of such photos on impressions of news media is reduced. Specifically, if relatively more is known about a topic, then an accompanying nonprobative photo may be less likely to mislead people to agree with erroneous content. On the other hand, if relatively less is known about a topic (e.g., the common myths cited above), photos may be more persuasive to the reader. Of course, this latter situation is of greater concern as it is more likely to lead to the perpetuation of incorrect information.

**Conflict of Interest Statement**

The authors of this paper declare no conflicts of interest with respect to the authorship or the publication of this article.

**Author Contributions**

The three authors contributed equally to the conceptual development of this study and together crafted the research design. Erica Abed collected and analyzed the data as part of her Master’s Thesis requirements under the supervision of Kathy Pezdek. Together, all three authors drafted the manuscript and participated in the revision process.

**References**

Appendix.

Descriptions of the Hypothetical Person (Avery) in the Relatively Low Knowledge, Medium Knowledge and High Knowledge Conditions in Experiment 1

<table>
<thead>
<tr>
<th>Knowledge condition</th>
<th>Descriptions</th>
</tr>
</thead>
<tbody>
<tr>
<td>Low</td>
<td>Today, AVERY woke up at 8:00 and checked the mail. AVERY then ate breakfast. Later, AVERY will probably go to the grocery store. Next weekend, AVERY will attend an event that AVERY is interested in.</td>
</tr>
<tr>
<td>Medium</td>
<td>Today, AVERY woke up at 8:00 and checked the mail. AVERY then ate breakfast before going to work as a barista. He works at an independent coffee shop while pursuing a psychology degree at Penn State. Later, AVERY will go to the grocery store before returning home. He lives at home with his family, with whom he has a close relationship. AVERY enjoys listening to music, playing with his dogs, and hiking with a close group of his friends. Next weekend, AVERY will attend a concert that he is interested in.</td>
</tr>
<tr>
<td>High</td>
<td>Today, AVERY woke up at 8:00 and checked the mail. AVERY then ate some eggs before going to work. AVERY is a talented barista. He works at an independent coffee shop called “The Lion Café” in State College, Pennsylvania while pursuing a psychology degree at Penn State. After work, AVERY will go to the grocery store before returning home. He lives nearby with his parents, one brother, and one sister, with whom he has a close relationship. He has a talent for cooking and frequently caters dinners at his church. Next weekend, AVERY will attend a concert that he is interested in. He enjoys listening to world music, playing with his two labs, and hiking in the country outside of State College with a close group of his friends. Before going to college, he served one tour of duty in Iraq. His future plans are to run a counseling program for veterans.</td>
</tr>
</tbody>
</table>


Received 6 November 2016; accepted 15 January 2017
Available online 21 February 2017