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Whither the Silly Goose: Clarifying Women's Preference for Men's Successful Humor Displays Across Mating Contexts and Social Affordance Judgments

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One of the evolutionary functions of humor for men is to connote their interest to women. However, women's prioritization of humor from prospective mates could foster especially judicious criteria for humor quality, which may have led selection to favor particularly funny men. The current research presents four studies comparing the desirability of men whose humor displays vary in quality (i.e., funny vs. unfunny). Women prefer men capable of successful humor despite viewing both humor displays as similarly friendly (Study 1). This preference appears to be rooted in perceptions of investment potential (Study 2) and especially apparent for long-term mating (Study 3). Physical attractiveness additionally heightened a preference for funny men (Study 4). These findings provide continued evidence for the desirability of successful humor displays in women's mate preference by identifying the underpinnings and boundaries of these preferences. We contextualize results from complementary perspectives of humor being sexually selected and connoting interest.

Public Significance Statement

Various theories exist describing the evolutionary functions of humor, with most centering around the facilitation of pairbonds. However, competing perspectives suggest that humor can aid in the sexual selection process, which leads women to prioritize humor production in mates. These studies sought to integrate these perspectives by comparing humor of different qualities. Although funny and unfunny men appeared similarly friendly, women preferred funny men. Results suggest that the function of humor is multifaceted within mating domains.

Keywords: humor, mate preferences, evolutionary psychology, sexual selection

Women's successful navigation of mating markets requires acuity to both men's sexual receptivity and their ability to increase a mate's inclusive fitness. Women must consider the extent to which men's displays of reproductive quality reliably connotes their ability to satisfy mating goals. This acuity would afford women the opportunity to identify and avoid low-quality mates to minimize their fitness costs (Zebrowitz & Rhodes, 2004). Given

women's greater minimal reproductive costs (i.e., gestation, lactation) compared to men (i.e., sperm provision), women set particularly high thresholds for mate selection to reduce their likelihood of erroneously selecting low-quality mates (Haselton & Buss, 2000; Kenrick et al., 1993; Trivers, 1972; Zhang et al., 2019). Such high thresholds in mate selection would have led to women's especially judicious criteria.

One heuristic on which women rely to determine men's reproductive value is their sense of humor. Women commonly prioritize men's ability to produce humor (Bressler & Balshine, 2006; Buss, 1988; Feingold, 1992; for a systematic review of the evidence, Hofmann et al., 2023). Although both men and women prefer funnier mates (Li

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et al., 2009), this preference for humor production appears to be more of a necessity for women (Hone et al., 2015; Thomas et al., 2020; but see Li et al., 2002). Despite this interest in humor, the extant literature has been limited in its comparisons of categorically funny and unfunny displays in favor of comparing humor displays to no attempt at humor. Previous research's consideration of differing levels of quality in a humor display have been limited insofar as they rely on subjective interpretations of humor about which limited information of their quality existed (see Wilbur & Campbell, 2011). These methodological shortcomings ambiguate the full extent to which humor veridically signals men's competence (Driebe et al., 2021), especially considering how humorous men experience greater reproductive success (Greengross & Miller, 2011).

A lack of consideration for how categorically failed humor influences women's mate preferences further precludes a fuller understanding of this signal value. Indeed, previous research has shown that categories of unfunny humor mitigate interest toward failed humorists to a more reliable extent than interpretations of relative funniness (e.g., Sacco et al., 2018; Senko & Fyffe, 2010). Consideration of this methodological rigor could afford researchers the opportunity to understand how women's prioritization of humor leads to funnier men enjoying an adaptive advantage and being selected more readily. Women demonstrate heightened romantic interest toward relatively more successful humor displays in a manner that does not happen for men (Wilbur & Campbell, 2011). This research sought to expound upon this research for how the quality of humor displays informs women's mating decisions by considering categorically distinct levels of humor quality. In addition to these methodological refinements, we sought to identify ancestrally informed boundary conditions, underpinnings of this preference for successful humor, and domains in which such displays are central to women's preferences.

Interpersonal Functions of Humor

The reliance on group living for humans has led to the evolution of social exchanges that facilitate closeness. Humor is one process in which individuals can facilitate this closeness, namely through its production and appreciation (Treger et al., 2013). Such closeness elicited from humor displays is further associated with greater relationship satisfaction

(Hall, 2017). With the resulting laughter's ability to strengthen social bonds, various evolutionary explanations of humor production have emerged that seek to explain more domain-specific functions of humor in mating contexts.

Two notable perspectives of humor have emerged to describe the complementary functions of humor in somatic and reproductive domains. First is the interest indicator model, which posits that humor functions primarily to indicate affiliative interest for the producer toward another (Li et al., 2009). Although men and women are similarly like to employ humor across various somatic domains (e.g., affiliative), a sexual asymmetry exists in humor production and quality that could suggest a degree of sexual selection in humor production. Previous research has extensively suggested that humor itself may be a nonphysical fitness indicator (G. Miller, 2000; G. F. Miller, 2007), as humor may connote underlying fitness (i.e., good genes) or potential to increase heritable fitness for one's offspring (i.e., parental investment). Previous research suggests that humorous people tend to exhibit higher levels of intelligence across various measures, with funny men reporting larger numbers of lifetime sexual partners (Greengross & Miller, 2011; Nusbaum et al., 2017).

Women's Preferences for Humor

Women's reproductive success has historically necessitated the identification of mates capable of satisfying reproductive goals. When considering the relevant goals for both short-term mating (STM) and long-term mating (LTM; Buss & Schmitt, 1993), selection would have favored men capable of producing offspring exhibiting heritable fitness (STM), while providing extensive investment (LTM; Conroy-Beam & Buss, 2017; Li et al., 2002, 2013; Walter et al., 2020). However, expectations of the opportunities that men could afford women are merely probabilistic. The inherent uncertainty of men's mate value necessitates women to employ a multimodal assessment of men's capabilities to inform their preferences (Jonason et al., 2012). For example, women find physically strong men attractive, given its connotation of heritable fitness necessary for short-term pairbonds (Brown, Brown, & O'Neil, 2022; Frederick & Haselton, 2007). Additionally, prosociality implicates men as desirable due to the connotation of their

willingness to invest in offspring (e.g., Bhogal et al., 2019; Brown & Sacco, 2019; Brown, Keefer, & Sacco, 2020; Brown, Westrich, et al., 2020; Brown, Keefer, et al., 2022; Farrelly & Bhogal, 2021).

Another behavioral repertoire from which women could infer reproductive value is their sense of humor, given their prioritization of humor over several other pertinent traits (e.g., Buss, 1988; Feingold, 1992; Wilbur & Campbell, 2011). Nonetheless, it remains less clear which aspect of this inferred fitness from humor is most apparent (e.g., Bressler & Balshine, 2006; DiDonato et al., 2013), thereby precluding our understanding of which mating context is more influenced by humor displays.

Men's humor production is central to women's mating decision. Women evaluate men's humor judiciously when considering them as prospective mates, whereas men report greater interest in women willing to appreciate their humor (Hone et al., 2015; Wilbur & Campbell, 2011). Selection would have thus favored those who have not only signaled their interest through humor but also those whose humor signals competence in some capacity (see Montoya & Horton, 2014). Although humor displays could initially connote warmth and gregariousness, the desirability of the humorist for subsequent interactions could be contingent upon their ability to use humor competently, both in humor construction and contextual appropriateness (e.g., Brown, Brown, & O'Neil, 2022; Medlin et al., 2018; Senko & Fyffe, 2010).

Inferences From Men's Successful Humor

A consequence of women's judiciousness toward humor production could be especially funny men on the mating market. Recent meta-analyses corroborate this possibility by suggesting that men produce more humor compared to women that tends to be funnier (Greengross et al., 2020). These asymmetries may reflect the necessity of humor production in women, whereas women's humor production is less important in men's decisions.

The confluence of production and appreciation would suggest that selection favored women who could discern between successful and failed humor. Humorous men appear socially competent (Bressler & Balshine, 2006; Driebe et al., 2021; Gerlach et al., 2019). Several downstream inferences emerge implicating such men as exhibiting

more desirable personalities to increase success in group living (e.g., social intelligence, extraversion; Figueredo et al., 2006; Greengross & Miller, 2011; Hall, 2015). This competency could implicate funny men as exhibiting heritable fitness that satisfies the mating goals of women for STM that prioritize good genes (Buss & Schmitt, 1993; Li & Kenrick, 2006) and those of LTM that see men invest in offspring to increase their own inclusive fitness (Li et al., 2013; Thomas et al., 2020).

Conversely, failed and contextually inappropriate humor elicit disinterest and may connote an inability to satisfy women's relevant mating goals. Women are particularly discerning toward whether a display would be successful in mating domains that failed displays could implicate a man as affording fewer reproductive opportunities (Medlin et al., 2018; Sacco et al., 2018; Senko & Fyffe, 2010; Wilbur & Campbell, 2011; Zeigler-Hill et al., 2013). Failed humor could be heuristic for a prospective mate to satisfy the various reproductive goals women have across contexts.

Current Research

This program of research sought to identify the depth of women's preference for successful humor in mating domains through four experiments. Namely, these experiments sought to clarify previously reported effects of sexual selection to determine the specific motivational underpinnings of this preference while identifying the contextual factors under which successful humor is most desirable and potential boundary conditions. Study 1 served as an initial replication and extension effort to determine whether the preference for successful humor is based on an interest in the display or derision of a failed display by providing a neutral comparison. Following this replication, Study 2 sought to consider the specific relational affordances inferred through successful humor display as means of determining the most salient reproductive benefits of funny men.

Upon identifying these inferred reproductive benefits, we sought to determine whether these inferred benefits tracked contextually dependent mating preferences that would ostensibly favor some traits in a mate over others. Study 3 considered the specific importance of humor displays in LTM and STM contexts. Finally, we addressed the potential limits of this nonphysical fitness indicator by pitting humorous displays against

more veridical cues to good genes in the form of physical attractiveness. Study 4 considered whether women would invoke a tradeoff with their consistently heightened preference for successful humor when a prospective mate is physically attractive. Data, materials, and syntax for these studies are available at: <https://osf.io/rgjk5>.

Study 1

This study sought to clarify the basis of women's interest in funny men by considering a comparison of successful displays of humor versus failed attempts. Like previous work (Wilbur & Campbell, 2011), we presented prospective mates employing pretested humor displays that varied in quality without having to rely on relative comparisons of humor appreciation in favor of experimental controls on the humor displayed. We also compared evaluations of various humor displays with control displays that involved no effort to produce humor, thereby combining different types of stimuli across studies. The presence of targets not displaying humor further served to determine whether this preference for funny men is based on perceptions of failed humorists as derisive or merely unable to reach the standard of competence inferred through successful displays (Bressler & Balshine, 2006; Driebe et al., 2021). We hypothesized that women would prefer funny displays than unfunny displays while viewing funny men as more successful in attracting mates. This study considered whether the hypothesized preference would be rooted in attraction toward funny jokes and/or aversion to bad jokes by providing a series of control statements in which a target made no effort to be funny.

Method

Participants

We recruited 167 women from a large public university in the Southeastern United States for course credit. Five participants were excluded from final analyses for not reporting heterosexual attraction or being older than 40 years of age, as menopause could start as early as 41 and alternative mating goals (Brown, Keefer, & Sacco, 2020; Brown, Westrich, et al., 2020; te Velde & Pearson, 2002; $n_{\text{final}} = 162$; $M_{\text{age}} = 18.97$, standard deviation, $SD = 1.28$; 84% White). Sensitivity analyses indicated that we were adequately powered to

detect small within-subjects effects (Cohen's $f = 0.10$, $1 - \beta = .80$).

Materials and Procedures

Participants evaluated six men as potential mates in a hypothetical speed dating session. Much like a standard speed dating set-up, these studies tasked women to consider meeting different men who were instructed to "market" themselves to women in these interactions, given both the nature of mating markets in which women serve as the "investors" (Baumeister & Vohs, 2004). These evaluative processes afforded greater ecological validity for how men and women facilitate pairbonds, particularly when considering previous work's use of one-liners could be seen as risky (Senko & Fyffe, 2010).

Targets were represented by a single facial image that was pretested as exhibiting similar levels of middling attractiveness with neutral expressions from previous incarnations of this paradigm (Medlin et al., 2018). Accompanying each prospective mate was a statement that was either a joke or a control statement, ostensibly provided by each target. Participants read about these prospective mates early in the study and were informed that they provided a statement as a form of icebreaker as prompted by the speed dating service. This decision sought to capitalize on the nature of humor's relative spontaneity on a methodological level, wherein humor is often rooted in expectancy violations (e.g., Warren & McGraw, 2016). The control statements were meant to elicit no humor. Initial descriptions of statements as jokes could have elicited an expectancy violation that could have made the control statements funny in their own right (i.e., anti-humor; Doerfler, 2012).

Jokes were from a list of pretested jokes deemed either categorically funny or unfunny through objective ratings (Sacco et al., 2018). This methodological decision afforded additional experimental control not seen in previous studies to prevent reliance on relative preferences in humor that could impede causal inferences and to minimize subjective differences in humor appreciation (e.g., Ruch et al., 2018). Table 1 provides the full list of jokes and statements across studies. Participants viewed two funny jokes, two unfunny jokes, and two control statements in randomized and counterbalanced orders.

Table 1
Funny and Unfunny Jokes Used in This Study

Category	Joke
Funny	Cremation: My only hope for a smoking hot body!*
	The past, present, and future were having an argument. It was tense.*
	“Doctor, I’ve broken my arm in several places.” “Well, don’t go to those places.”
Unfunny	What is Mozart doing right now? Decomposing.
	What do you call a tiger with glasses on? A scientist tiger.*
	How can you open a banana? With a monkey!*
	What does a farmer say when he’s looking for a tractor? “Where’s my tractor?”
Control	What is small, grey, and triangular? The shadow of a green triangle!
	My favorite color is green.
	I really like pepperoni pizza.

Note. Jokes marked with an asterisk were utilized in all studies; those without were used in Studies 2–4. The control statements were only utilized in Study 1. Yes, we realize how bad some of these are....

Evaluations

Participants evaluated targets across several dimensions, including a manipulation check to indicate how funny they viewed each statement (1 = *not at all funny* to 7 = *very funny*). They also indicated the extent they perceived each target as successful in attracting mates along a single item (1 = *very unsuccessful* to 7 = *very successful*). Another item assessed the extent to which targets appeared friendly (1 = *very unfriendly* to 7 = *very friendly*). We further tasked participants with responding to a single item assessing behavioral attraction (Montoya et al., 2018). That is, we assessed the likelihood participants would want to give their phone number to each target (1 = *not at all* to 7 = *very much*).

Results

We conducted four one-way repeated analyses of variance (ANOVAs) to compare perceptions of each target (see Table 2). Differences in degrees of freedom reflect Greenhouse–Geisser corrections following violations of sphericity assumptions.

Funniness

A main effect emerged, $F(1.83, 295.18) = 130.93$, $p < .001$, $\eta_p^2 = .449$. The funny jokes were funnier than both the unfunny jokes and control statements. The unfunny jokes were funnier than the control statements ($ps < .001$, $ds > 0.48$).

Friendliness

An additional main effect emerged, $F(2, 322) = 7.56$, $p = .001$, $\eta_p^2 = .045$. The funny and unfunny targets appeared friendlier than the control targets

($ps < .001$, $ds > 0.28$). No difference emerged between the funny and unfunny targets ($p = .949$, $d = 0.01$).

Dating Success

Another main effect emerged, $F(2, 322) = 8.84$, $p < .001$, $\eta_p^2 = .052$. The funny targets appeared more successful than unfunny and control targets ($ps < .004$, $ds > 0.24$). No difference emerged for the unfunny and control targets ($p = .282$, $d = 0.09$).

Attraction

A main effect emerged, $F(2, 322) = 10.42$, $p < .001$, $\eta_p^2 = .061$. Participants liked funny targets more than unfunny and control targets ($ps < .001$, $ds > 0.30$). No difference emerged for unfunny and control targets ($p = .893$, $d = 0.01$).

Discussion

This study contributes to the extant literature indicating that the mere production of humor is insufficient in fostering women’s interest. Importantly, this study relied on normed stimuli that afforded

Table 2
Means (With SD) for Evaluations of Funny, Control, and Unfunny Targets in Study 1

Outcomes	Funny	Control	Unfunny
Funniness	3.63 (1.48) ^a	1.45 (0.92) ^b	1.93 (1.04) ^c
Friendliness	4.06 (1.14) ^a	3.74 (1.06) ^b	4.05 (1.12) ^a
Mating success	3.18 (1.24) ^a	2.88 (1.18) ^b	2.77 (1.11) ^b
Liking	2.64 (1.36) ^a	2.24 (1.09)	2.26 (1.16) ^b

Note. Letters denote which means were significantly different from each other.

categorical comparisons of actually funny (vs. unfunny) humor. Despite both types of humor displays being similarly diagnostic of men's friendliness (Li et al., 2009), only funny men were more desirable than control men. Control and unfunny men being deemed similarly desirable to each other. Women's attraction to humor from prospective mates required the display to connote interest *and* ability (Montoya & Horton, 2014). Given the fact that humor displays similarly connote interest in a prospective mate, these results remain unclear in identifying the potential assets (or deficits) connoted through displays. Study 2 sought to identify the potential social affordances connoted through humor in mating-relevant domains by comparing whether a display is successful or unsuccessful.

Study 2

The desirability of successful humor in Study 1 suggested that prospective mates would have more success in satisfying reproductive goals while similarly demonstrating a sufficient level of friendliness to women in these domains. Nonetheless, despite this desirability, Study 1 remains limited in its ability to identify the underpinnings of this preference when considering that humor production itself connotes numerous socially desirable traits to perceivers. Within this general desirability could be awareness of specific connotations about a social target's ability to satisfy relevant reproductive goals critical to women's mate preferences (see Neel & Lassetter, 2019). From a social affordances perspective (Neuberg et al., 2020), the benefits of a humorous man may be specific to a particular reproductive priority that women consider in the psychological calculus of their mating decisions. Individuals rely on heuristics of prospective mates' reproductive goals (Sng et al., 2020), with humor displays being particularly informative in how one may facilitate or impede goals (Brown & Holt, in press).

While recognizing the perceived friendliness of humor in a prospective mate, these displays are heuristics for specific traits. Given previous research demonstrating that funnier men appear more intelligent to women (Driebe et al., 2021), we predicted that successful humor use would implicate a prospective mate as more intelligent. We further assessed earning potential, given its importance to women's mating decisions and parental abilities, which women value in mating decisions (e.g., Buss, 1988; Li et al., 2002;

Zhang et al., 2019). We predicted that successful humorists would be perceived as exhibiting higher levels of these affordances.

Method

Participants

We recruited 81 women espousing heterosexual attraction from a large public university in the Southeastern United States for course credit ($M_{\text{Age}} = 18.57$, $SD = 1.16$; 77.8% White). A sensitivity analysis indicated that we were adequately powered to detect medium effects (Cohen's $d_z = 0.31$, $1 - \beta = .80$). No data were excluded from the final analyses.

Materials and Procedures

Participants were tasked with evaluating eight men telling one of the eight jokes pretested as categorically funny or unfunny paired with faces from the same selection of men as Study 1. There were four jokes in each category (Sacco et al., 2018). The similar signal value of mate value between the control statements and unfunny jokes afforded us the opportunity to make a comparison between successful and unsuccessful humor displays. The presentation order was randomized and counterbalanced. The targets were specifically described as having told a joke ahead of time as a conversation piece in each speed date. Importantly, this study did not have a control condition, nor did Studies 3 and 4.

Evaluations. As a more specific manipulation check, participants indicated the extent to which they perceived each joke as funny using a single item (1 = *very unfunny* to 7 = *very funny*). They further indicated the extent each target would be seen as successful in dating like Study 1. In addition to the same single attraction item from Study 1, we tasked participants with assessing each target in terms of their social affordances, with single ad hoc items: intelligence (1 = *not very intelligent* to 7 = *very intelligent*); being good with children (1 = *not very good* to 7 = *very good*); and earning potential (1 = *not at all high* to 7 = *very high*).

Results

Manipulation Checks

Paired samples *t* tests indicated funny jokes were funnier than unfunny jokes. Funny men appeared

more successful in acquiring mates. Table 3 provides descriptive and inferential statistics.

Primary Analyses

Participants reported greater attraction toward the funny targets than unfunny targets. They deemed funny targets as more intelligent and possessing a higher earning potential. No difference emerged in perceptions of their abilities with children.

Our next step was to identify the bases of participants' attraction toward successful and unsuccessful humor. We conducted bivariate correlations between perceived intelligence and earning potential for targets with the respective attraction scores. Perceptions of intelligence and earning potential were positively correlated with the respective attraction scores, although the effects were larger for funny targets (see Table 4).

Discussion

Once again, women preferred successful humor. We found additional evidence of affordance judgments that highlight the social value of these displays. Funny men appeared more intelligent and capable of a higher earning potential, suggesting a perception of social competence that corresponds with their similar levels of friendliness. These heuristics could implicate funny men as better able to satisfy mating goals based around their interest through humor and the perceived competence to navigate group living.

Despite the consistency between these findings, various contextual factors in the content of the humor used in previous studies have produced a heterogeneity in results as to when humor is desirable (e.g., Bressler & Balshine, 2006). The friendliness of a humor display could implicate men as

exhibiting the requisite kindness for long-term pairbonds, which would correspond with the desirability of extraversion in relationships (DiDonato et al., 2013; Figueredo et al., 2006). Conversely, the dynamics of humor in mating domains could have masculine undertones connoting a dominance that limits the desirability of extraversion to short-term pairbonds (Brown & Sacco, 2017). Masculinity is broadly an ambivalent cue in mating connoting both heritable fitness and extraversion while similarly connoting the potential for hostility and disinterest in long-term relationships (Brown, Boykin, & Sacco, 2022; Brown, Tracy, & Boykin, 2022; Frederick & Haselton, 2007; Geniole & McCormick, 2013). Humorous men appear competent, yet certain displays remain untrustworthy that would undermine women's interest in them beyond a one-night stand (Bressler & Balshine, 2006). Study 3 considered women's valuation of successful humor in LTM and STM.

Study 3

Although women have consistently preferred humorous men in the previous studies and extant literature, such preferences could be contextual and rooted in connotations of humor in mating domains. According to sexual strategies theory (Buss & Schmitt, 1993), women prioritize mates capable of facilitating specific reproductive goals and prefer specific displays based on the extent to which they perceive them as capable of facilitating these salient goals (Kenrick et al., 1993). In LTM, women prioritize men's investment potential, whereas STM sees women prioritize men particularly masculine men who could afford healthier offspring (Jones et al., 2018; Li et

Table 3
Means (With SD) for Evaluations of Funny and Unfunny Targets in Study 2

Outcomes	Funny	Unfunny	<i>t</i>	<i>d</i>
Funniness	3.14 (1.33)	1.77 (0.89)	9.90*	1.10
Mating success	3.18 (1.07)	2.50 (0.99)	5.84*	0.65
Earning potential	3.72 (1.08)	3.23 (1.04)	4.63*	0.51
Intelligence	3.81 (1.07)	3.20 (1.00)	5.20*	0.58
Good with children	3.38 (1.06)	3.26 (1.06)	1.06	0.12
Attraction	2.52 (1.17)	2.02 (0.92)	4.32*	0.48

* $p < .001$.

Table 4
Bivariate Correlations Between Perceived Intelligence and Earning Potential and Attraction Toward Funny and Unfunny Targets

Outcomes	Perceived intelligence	Perceived earning potential
Attraction to funny target	0.48**	0.50**
Attraction to unfunny target	0.28*	0.24*

Note. Reported effects are for the respective funny and unfunny targets.

* $p < .05$. ** $p < .01$.

al., 2013). The general desirability of humor production in mating ambiguates whether successful humor is more relevant to STM or LTM.

Effective humor use could present an adaptive solution to women, given that funnier men appear more socially competent. The competence connoted through humor could implicate funny men as capable of satisfying LTM goals, as shown by the previous study. Conversely, the general masculinity of humor as a mating display from men could implicate them as particularly dominant and limit their desirability to STM (Frederick & Haselton, 2007). Additionally, previous research has suggested that humor displays in mating domains could implicate men as disinterested in monogamous pairbonding and untrustworthy in LTM (Bressler & Balshine, 2006; Medlin et al., 2018). This study considered whether successful humor is more relevant to LTM or STM with alternative predictions centered around how women would evaluate humor displays in both contexts.

Method

Participants

We recruited 109 women espousing heterosexual attraction from a large public university in Southeastern United States for course credit. One participant was excluded from final analyses for being older than 40 ($n_{\text{final}} = 108$; $M_{\text{age}} = 18.62$, $SD = 0.97$; 81.5% White). Sensitivity analyses indicated adequate power to detect small effects (Cohen's $f = 0.13$, $1 - \beta = .80$).

Materials and Procedure

We utilized the same paradigm as previous studies while contextualizing participants' interest for a given relationship. Participants indicated how desirable they found each target to be in both STM and LTM along separate 9-point scales (1 = *not at all desirable* to 9 = *very desirable*; Brown & Sacco, 2018). We continued to assess joke funniness and perceived mating success like Study 2.

Results

Manipulation Checks

Participants found funny jokes funnier and funny men more successful in dating. Table 5 provides relevant means for this study.

Table 5

Mean Values of Outcome Variables (and SDs for Funny and Funny Targets in Study 3)

Outcomes	Funny	Unfunny	<i>t</i>	<i>d</i>
Funniness	3.27 (1.29)	1.78 (0.85)	11.79*	1.13
Mating success	3.02 (1.11)	2.37 (0.99)	7.07*	0.68
General desirability	2.82 (1.51)	2.29 (1.27)	—	—
STM desirability	2.82 (1.52)	2.40 (1.35)	—	—
LTM desirability	2.82 (1.50)	2.18 (1.20)	—	—

Note. General desirability refers to target desirability as a main effect (i.e., collapsed across both LTM and STM). Desirability effect sizes are reported in the omnibus analyses through η_p^2 . STM = short-term mating; LTM = long-term mating.

* $p < .001$.

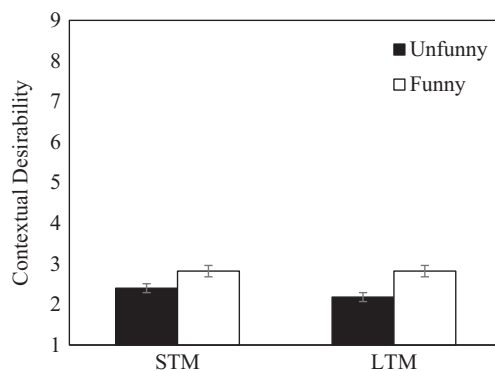
Primary Analyses

We conducted a 2 (target humor: funny vs. unfunny) \times 2 (mating context: STM vs. LTM) repeated-measures ANOVA. A target humor main effect indicated that participants found funny targets more desirable than unfunny targets, $F(1, 107) = 26.88$, $p < .001$, $\eta_p^2 = .201$. No main effect emerged for mating context, $F(1, 107) = 2.05$, $p = .155$, $\eta_p^2 = .019$. A Target Humor \times Mating Context interaction emerged, $F(1, 107) = 6.19$, $p = .014$, $\eta_p^2 = .055$ (Figure 1). Simple effects tests indicated funny targets were more desirable for STM than unfunny targets, $F(1, 107) = 12.49$, $p = .001$, $\eta_p^2 = .105$. Funny targets were more desirable in LTM than unfunny targets, with this effect being larger, $F(1, 107) = 39.09$, $p < .001$, $\eta_p^2 = .268$.

Discussion

Although funny men remained desirable to women across mating contexts, the effect size for LTM was double the size for STM. This discrepancy in effect sizes could align with previous studies considering successfully funny men as capable of satisfying LTM goals, including the conveyance of social competence and warmth (DiDonato et al., 2013). The reduced effect for STM could reflect that the degree of competency in a humor display may be less relevant to these decisions. Alternatively, the content of the humor could be less indicative of receptivity to STM, which previous studies demonstrated with humor displays that heightened STM desirability (Betz & DiDonato, 2020; Brown, Brown, & O'Neil, 2022; Medlin et al., 2018).

Figure 1
Contextual Desirability of Funny and Unfunny Men for STM and LTM, With Standard Error Bars in Study 3



Note. STM = short-term mating; LTM = long-term mating.

Nonetheless, this prioritization of humor itself is merely one of several cues that women use as a heuristic for men's overall mate value (Jonason et al., 2012). Additional cues could compete with humor production in women's mate preferences that may provide additive effects or even supersede the importance of humor. Study 4 considered the competing signal values of humor and physical attractiveness to determine how and whether women invoke a tradeoff for attractiveness with funny men.

Study 4

The overall preference for funny men could reflect an interest in women attempting to secure prospective mates capable of satisfying goals for both LTM and STM. However, Study 3 was limited insofar as women only evaluated prospective mates as middlingly attractive. Not considering attractiveness as an independent variable may not represent a more complete consideration of what women prioritize in STM, given the especially heightened preference for physical attractiveness seen in that context (Li et al., 2013). Physical and behavioral cues of desirability could provide orthogonal signal values for a prospective mate's abilities that would have competing interests in women's preferences.

When pitting these competing signal values against each other, researchers could determine whether the desirability of funny men could

override the signal values of heritable fitness in other domains. For example, previous research indicates that the desirability of ostensibly prosocial behavioral repertoires is magnified when the prospective mate is attractive for LTM, although attractive men are tolerated in STM if their behavior does not connote sufficient prosociality (Brown, 2022). This study presented attractive and unattractive men to identify whether successful humor leads women to invoke this tradeoff. We considered if the prioritization of physical attractiveness in STM could impede the signal value of humor.

Method

Participants

We recruited 142 women espousing heterosexual attraction from a large public university in Southeastern United States for course credit. We excluded one participant for being older than 40 ($n_{\text{final}} = 141$; $M_{\text{Age}} = 19.06$, $SD = 2.09$; 80.1% White). Sensitivity analyses indicated we were adequately powered to detect small effects (Cohen's $f = 0.12$, $1 - \beta = .80$).

Materials and Procedure

Participants engaged in the same paradigm as the previous studies and responded to the same items as in Study 3. Importantly, this study differed in terms of the faces presented to participants. We presented the faces of the four White targets rated

as most attractive and four White targets rated as least attractive in the age range of 18–30 years from the Chicago Faces Database, presented with neutral expressions (Ma et al., 2015). Preliminary analyses from available database information indicated attractive targets were more attractive than unattractive targets ($d=11.35$; Brown, 2022). Based on pairings with the jokes, participants evaluated two attractive targets telling funny jokes, two unattractive targets telling funny jokes, two attractive targets telling unfunny jokes, and two unattractive targets telling unfunny jokes.

Results

Preliminary Analyses

We conducted two 2 (target humor: funny vs. unfunny) \times 2 (target attractiveness: attractive vs. unattractive) repeated ANOVAs. For funniness, a target humor main effect indicated participants deemed the funny jokes funnier ($M=3.27$, $SD=1.47$) than the unfunny jokes ($M=1.68$, $SD=0.87$), $F(1, 140)=260.50$, $p<.001$, $\eta_p^2=.650$. The target attractiveness main effect was not significant, $F(1, 140)=3.45$, $p=.065$, $\eta_p^2=.024$. A Target Humor \times Target Attractiveness interaction emerged, $F(1, 140)=10.32$, $p=.002$, $\eta_p^2=.069$. Simple effects indicated participants found funny jokes funnier when told by attractive targets ($M=3.47$, $SD=1.64$) than by unattractive targets ($M=3.08$, $SD=1.31$), $F(1, 140)=8.64$, $p=.004$, $\eta_p^2=.058$. For unfunny jokes, no difference emerged for attractive targets ($M=1.63$, $SD=0.81$) and unattractive targets ($M=1.73$, $SD=0.94$), $F(1, 140)=1.89$, $p=.171$, $\eta_p^2=.013$.

A target humor main effect additionally indicated participants perceived funny targets as more successful in mating ($M=3.15$, $SD=1.23$) than unfunny targets ($M=2.45$, $SD=1.12$), $F(1, 140)=56.76$, $p<.001$, $\eta_p^2=.288$. A target attractiveness main effect further indicated attractive targets were perceived as more successful in mating ($M=3.60$, $SD=1.43$) than unattractive targets ($M=2.15$, $SD=0.92$), $F(1, 140)=240.39$, $p<.001$, $\eta_p^2=.632$. No interaction emerged, $F(1, 140)=1.08$, $p=.301$, $\eta_p^2=.008$.

Primary Analysis

We conducted a 2 (target humor: funny vs. unfunny) \times 2 (target attractiveness: attractive vs. unattractive) \times 2 (mating context: STM

vs. LTM) repeated ANOVA. A target humor main effect indicated funny targets were more desirable ($M=3.05$, $SD=1.65$) than unfunny targets ($M=2.05$, $SD=1.42$), $F(1, 140)=39.20$, $p<.001$, $\eta_p^2=.219$. A target attractiveness main effect indicated the attractive targets were more desirable ($M=3.71$, $SD=1.93$) than the unattractive targets ($M=1.85$, $SD=1.15$), $F(1, 140)=248.85$, $p<.001$, $\eta_p^2=.640$. A mating context main effect indicated participants appeared more desirable in STM ($M=2.91$, $SD=1.55$) than LTM ($M=2.64$, $SD=1.52$), $F(1, 140)=17.98$, $p<.001$, $\eta_p^2=.114$.

A Target Attractiveness \times Target Humor interaction emerged (Figure 2), $F(1, 140)=5.47$, $p=.021$, $\eta_p^2=.038$. Among attractive targets, simple effects indicated funny targets were more desirable ($M=4.07$, $SD=1.98$) than unfunny targets ($M=3.34$, $SD=1.88$), $F(1, 140)=27.57$, $p<.001$, $\eta_p^2=.165$. Unattractive targets who were funny were also more desirable ($M=2.03$, $SD=1.33$) than those who were unfunny ($M=1.67$, $SD=0.98$), although this preference was at a reduced magnitude compared to the former comparison, $F(1, 140)=15.07$, $p<.001$, $\eta_p^2=.097$.

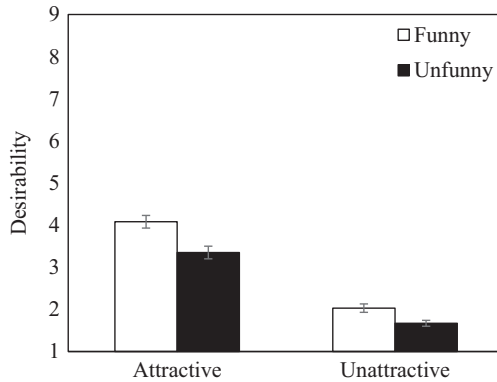
A Target Attractiveness \times Mating Context interaction emerged (Figure 3), $F(1, 140)=56.06$, $p<.001$, $\eta_p^2=.286$. Simple effects indicated attractive targets were more desirable for STM ($M=4.01$, $SD=2.03$) than LTM ($M=3.40$, $SD=1.83$), $F(1, 140)=41.24$, $p<.001$, $\eta_p^2=.228$. No difference emerged in the desirability of unattractive targets in STM ($M=1.82$, $SD=1.09$) and LTM ($M=1.88$, $SD=1.22$), $F(1, 140)=1.08$, $p=.300$, $\eta_p^2=.008$. No other interactions emerged ($ps>.628$).

Discussion

Women invoked a tradeoff for funny men, albeit not in a predicted capacity. Attractive men's desirability was amplified when they were funny for *both* STM and LTM, which led to similar desirability in both contexts. Such findings align with previous research indicating that desirability of attractive physical features is orthogonal to humor displays and could interfere with the evaluation of a competing signal value (e.g., Brown, Brown, & O'Neil, 2022).

This effect is unsurprising, given that women would prefer an attractive mate when possible and the targets appeared relatively benevolent

Figure 2
Desirability of Funny and Unfunny Men as a Function of Attractiveness, With Standard Error Bars in Study 4

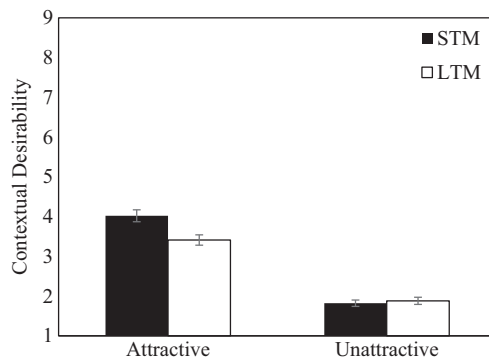


with their friendly humor displays (Li et al., 2002). When presented with prospective mates whose behavior and appearance can equally satisfy STM and LTM goals, it would be advantageous for women to prefer mates capable of satisfying as many needs as possible when the potential costs are less salient (Buss & Shackelford, 2008). These cues to attractiveness could have been the basis for why previously identified contextual effects did not emerge. Additionally, the desirability of attractive men in STM could have been more salient compared to the contextual effects in the previous study.

General Discussion

These four studies provided continued evidence for the importance of quality in humor displays while similarly addressing the potential nuance in relevant mating domains. Although humor itself serves as a primary function to indicate one’s interest toward others (Li et al., 2009), the mere display of warmth required additional evidence of competence to elicit attraction. Competence in that medium would foster greater attraction (Montoya & Horton, 2014). These findings complement perspectives on the function of

Figure 3
Contextual Desirability of Attractive and Unattractive Men for STM and LTM, With Standard Error Bars in Study 4



Note. STM = short-term mating; LTM = long-term mating.

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humor by addressing the myriad components of what constitutes actual humor and how various, and often subjective, evaluations shape interpersonal perceptions (Warren et al., 2021).

Heterogeneity exists in scientific literature for which context sees humor as most desirable. This may be contingent upon the type of humor men use which could vary in appropriateness across contexts and depend on whether the humorist appears to have the latitude in using certain humor. Humor connoting sexual receptivity and aggression appeals to women, although this appeal is limited to STM (Betz & DiDonato, 2020; Brown, Brown, & O'Neil, 2022; DiDonato et al., 2013; Medlin et al., 2018). The sophomoric and flippant humor employed in some studies certainly could have fostered desirability despite inferences of such men being less trustworthy if their displays were contextually inappropriate (Bressler & Balshine, 2006; Senko & Fyffe, 2010). A strength of the current research was its reliance on previously normed humor displays that differed in objective funniness to attempt to minimize the potential offensiveness that certain humor could convey in certain contexts. Nonetheless, future research would benefit from orthogonally manipulating both funniness and content to identify whether (in)appropriate humor moderates these perceptions of funniness.

The desirability of successful humor tracked several affordances implicating that funny men are perceived as exhibiting greater investment potential for relationships. These findings align with previous research indicating that perceived intelligence tracks humor displays in men, although actual intelligence appears not to correspond with these inferences (Driebe et al., 2021; Storey, 2003; but see Greengross et al., 2012). In light of the heterogeneity in the literature, our results could suggest that the inferred intelligence of funny men could be based on specific social competencies relevant to navigating social interactions rather than general intelligence.

Interestingly, the inferred social affordances for humorous men were specifically related to their earning potential and intelligence but not their potential parental ability. These results could reflect that the humor in these studies may not have been contextually appropriate for demonstrating one's ability with children. These humor displays may not resonate with

children, thus impeding perceivers from identifying that affordance as easily. Humor's desirability varies across different contexts with specific definitions of appropriateness (DiDonato et al., 2013; Medlin et al., 2018). Future research would benefit from considering humor displays that could resonate with children more readily in identifying the full extent of affordance judgments in humor (e.g., making funny faces for babies; Hofer et al., 2018). Individuals are aware of contextual appropriateness of using certain types of humor across different interpersonal contexts and calibrate their behavior accordingly (DiDonato & Jakubiak, 2016). Future studies would benefit from considering such approaches to humor.

Our representation of humor in these studies was predicated upon more traditional joke formats that may not reflect some aspects of humor that exist beyond verbal displays. Despite the generally accepted understanding of humor from a standard approach to witticism, humor can assume many forms in terms of delivery. For example, humorous situations could arise from nonsensical displays due to the expectancy violations they elicit (Warren et al., 2021). Nonetheless, to understand whether certain nonsensical displays constitute successful humor versus a failed attempt at such a risky style, perceivers would need to recognize the context of the display to view it as humorous. As our studies had the opportunity to titrate humor within a controlled setting, future studies could extend this work by providing more dynamic cues of humor to identify potential boundary conditions of what aspects of humor could be deemed most desirable. This could be accomplished through video recordings of dyadic exchanges (see Li et al., 2009), which vary in the presentation of comic styles that range from conventional humor to absurdism (Ruch et al., 2018).

Limitations and Future Directions

Although these studies provide empirical bridges between complementary hypotheses for the function of humor in romantic relationships, several limitations emerged. Despite the pretesting that demonstrated the funny jokes in the current study are categorically funny (Sacco et al., 2018), women did not seem as receptive to these displays compared to other studies not using mating paradigms. This limitation is unsurprising given women's relatively judicious nature in mate selection to minimize the likelihood of incurring reproductive

costs (Haselton & Buss, 2000; Kenrick et al., 1993) and the challenge men face with producing humor that resonates with women's preferences (Martin, 2014). Future research would benefit from generating a more comprehensive stimulus set that offers a wider array of humor outlets that could become categorically funny in mating domains.

Another limitation of this research is the hypothetical nature of the speed-dating task. Actual speed dating paradigms could be advantageous in future studies, which could allow researchers to identify behavioral components of their interest in these actual displays. It could be possible that, although failed attempts at humor may elicit laughter, such laughter could be feigned to appear polite. Laughter's acoustic properties could correspond with women's mating interest in addition to greater eye contact and smiling (Montoya et al., 2018). The use of active speed dating paradigms could additionally lead to researchers to modify the standard script of these scenarios that oftentimes see men having to "market" themselves to women, wherein women could be in such a role (Finkel & Eastwick, 2008). Consideration of methodological changes would further inform how different paradigms are more conducive to finding sex differences relative to sex similarities (see Bhogal et al., 2019).

This research's focus on mating is a natural extension of previous literature. However, other social domains could prove fruitful to consider. Research on friendships suggests that men choose friends who could serve as coalitional allies (Krems & Conroy-Beam, 2020). Funny men could provide a coalitional advantage based on their desirability, which could lead men to prefer funny allies within their social groups (e.g., "wingmen"). Additionally, this consideration of coalitional utility could start a discussion on same-sex romantic relationships, wherein certain reproductive goals would be less salient. Although same-sex couples similarly value humor as opposite-sex couples (Lippa, 2007), this preference could be less relevant to reproductive goals in favor of goals related to closeness and commitment. The inferred masculinity of gay men who assume certain roles in their pairbonds could additionally shape the extent to which their partners would be receptive to their humor displays. For example, men assuming insertive roles in same-sex relationships (i.e., "tops") appear more masculine relative to those assuming receptive roles (i.e., "bottoms"; Tskhay & Rule, 2013). The masculinized nature of

humor in mating domains could lead to receptive men to have a heightened preference for humor similar to women.

Despite the considerable prioritization of humor production in women's mate preferences that could offset their considerable reproductive costs, it would be erroneous to assume the sexual dimorphism in men and women's humor production would preclude women from being able to produce humor effectively. Although men consider women's humor production a luxury (Hone et al., 2015), with other research suggesting it is less important in their mating decisions (Wilbur & Campbell, 2011), men still prefer funny women (Hall, 2019; Li et al., 2009; Thomas et al., 2020). Future research would benefit from identifying potential similarities in men's interest in women's humor production. Given that our research considered reproductive goals more relevant to women, it could be advantageous to identify social affordances of funny women to foster men's interest. For example, men could perceive women's humor as diagnostic of having "guy's girl" qualities, increasing access to sexual opportunities (Bradshaw et al., 2022).

Conclusions

The import of humor in relationships appears contingent upon its quality, an effect that has been demonstrated numerous times. More specifically, women appear to use the success of a humorous display to determine men's abilities in relationships, particularly as it relates to the fitness being indicated through the displays. These findings contribute to a comprehensive understanding of humor's interpersonal function while identifying how various selection pressures to satisfy various motives may lead to differences in humor quality between people.

References

- Baumeister, R. F., & Vohs, K. D. (2004). Sexual economics: Sex as female resource for social exchange in heterosexual interactions. *Personality and Social Psychology Review*, 8(4), 339–363. https://doi.org/10.1207/s15327957pspr0804_2
- Betz, D. E., & DiDonato, T. E. (2020). Is it sexy to be sexist? How stereotyped humor affects romantic attraction. *Personality Relationships*, 27(4), 732–759. <https://doi.org/10.1111/per.12346>
- Bhogal, M. S., Farrelly, D., & Galbraith, N. (2019). The role of prosocial behaviors in mate choice: A

- critical review of the literature. *Current Psychology*, 38(4), 1062–1075. <https://doi.org/10.1007/s12144-019-00308-8>
- Bradshaw, H. K., Cunningham, K., & Hill, S. E. (2022). Known by the company she keeps: Women's friendship preferences influence interpersonal evaluations. *Personality and Individual Differences*, 185, Article 111301. <https://doi.org/10.1016/j.paid.2021.111301>
- Bressler, E. R., & Balshine, S. (2006). The influence of humor on desirability. *Evolution and Human Behavior*, 27(1), 29–39. <https://doi.org/10.1016/j.evolhumbehav.2005.06.002>
- Brown, M. (2022). Preliminary evidence for an aversion to atheists in long-term mating domains in the Southern United States. *Journal of Social and Personal Relationships*, 39(3), 711–733. <https://doi.org/10.1177/02654075211045051>
- Brown, M., Boykin, K., & Sacco, D. F. (2022). Functional inferences of mating orientations through body fat and sex-typical body features. *Journal of Social and Personal Relationships*, 39(7), 2228–2238. <https://doi.org/10.1177/02654075221076455>
- Brown, M., Brown, M. R., & O'Neil, B. A. (2022). Contextual desirability of strong men employing affiliative and aggressive humor. *Personal Relationships*, 29(4), 795–810. <https://doi.org/10.1111/per.12456>
- Brown, M., & Holt, D. (in press). Motivated social affordance judgments of humor styles. *Psychological Reports*.
- Brown, M., Keefer, L. A., & Sacco, D. F. (2020). Relational insecurity heightens sensitivity to limbal rings in partnered women. *Personal Relationships*, 27(1), 61–75. <https://doi.org/10.1111/per.12308>
- Brown, M., Keefer, L. A., Sacco, D. F., & Brown, F. L. (2022). Demonstrate values: Behavioral displays of moral outrage as a cue to long-term mate potential. *Emotion*, 22(6), 1239–1254. <https://doi.org/10.1037/emo0000955>
- Brown, M., & Sacco, D. F. (2017). Unrestricted sociosexuality predicts preferences for extraverted male faces. *Personality and Individual Differences*, 108, 123–127. <https://doi.org/10.1016/j.paid.2016.12.023>
- Brown, M., & Sacco, D. F. (2018). Put a (limbal) ring on it: Women perceive men's limbal rings as a health cue in short-term mating domains. *Personality and Social Psychology Bulletin*, 44(1), 80–91. <https://doi.org/10.1177/0146167217733072>
- Brown, M., & Sacco, D. F. (2019). Is pulling the lever sexy? Deontology as a downstream cue to long-term mate quality. *Journal of Social and Personal Relationships*, 36(3), 957–976. <https://doi.org/10.1177/0265407517749331>
- Brown, M., Tracy, R. E., & Boykin, K. (2022). Covariation between formidability inferences and perceptions of men's preferred humor styles. *Personality and Individual Differences*, 197, Article 111792. <https://doi.org/10.1016/j.paid.2022.111792>
- Brown, M., Westrich, B., Bates, F., Twibell, A., & McGrath, R. E. (2020). Preliminary evidence for virtue as a cue to long-term mate value. *Personality and Individual Differences*, 167, Article 110249. <https://doi.org/10.1016/j.paid.2020.110249>
- Buss, D. M. (1988). The evolution of human intra-sexual competition: Tactics of mate attraction. *Journal of Personality and Social Psychology*, 54(4), 616–628. <https://doi.org/10.1037/0022-3514.54.4.616>
- Buss, D. M., & Schmitt, D. P. (1993). Sexual strategies theory: An evolutionary perspective on human mating. *Psychological Review*, 100(2), 204–232. <https://doi.org/10.1037/0033-295X.100.2.204>
- Buss, D. M., & Shackelford, T. K. (2008). Attractive women want it all: Good genes, economic investment, parenting proclivities, and emotional commitment. *Evolutionary Psychology*, 6(1), 134–146. <https://doi.org/10.1177/147470490800600116>
- Conroy-Beam, D., & Buss, D. M. (2017). Euclidean Distances discriminatively predict short-term and long-term attraction to potential mates. *Evolution and Human Behavior*, 38(4), 442–450. <https://doi.org/10.1016/j.evolhumbehav.2017.04.004>
- DiDonato, T. E., Bedminster, M. C., & Machel, J. J. (2013). My funny valentine: How humor styles affect romantic interest. *Personal Relationships*, 20(2), 374–390. <https://doi.org/10.1111/j.1475-6811.2012.01410.x>
- DiDonato, T. E., & Jakubiak, B. K. (2016). Strategically funny: Romantic motives affect humor style in relationship initiation. *Europe's Journal of Psychology*, 12(3), 390–405. <https://doi.org/10.5964/ejop.v12i3.1105>
- Doerfler, R. (2012). A comedy of errors or, how I learned to stop worrying and love sensibility-invariantism about 'funny'. *Pacific Philosophical Quarterly*, 93(4), 493–522. <https://doi.org/10.1111/j.1468-0114.2012.01436.x>
- Driebe, J. C., Sidari, M. J., Dufner, M., von der Heiden, J. M., Bürkner, P. C., Penke, L., Zietsch, B. P., & Arslan, R. C. (2021). Intelligence can be detected but is not found attractive in videos and live interactions. *Evolution and Human Behavior*, 42(6), 507–516. <https://doi.org/10.1016/j.evolhumbehav.2021.05.002>
- Farrelly, D., & Bhogal, M. S. (2021). The value of pro-environmental behaviour in mate choice. *Personality and Individual Differences*, 179, Article 110964. <https://doi.org/10.1016/j.paid.2021.110964>
- Feingold, A. (1992). Gender differences in mate selection preferences: A test of the parental investment model. *Psychological Bulletin*, 112(1), 125–139. <https://doi.org/10.1037/0033-2909.112.1.125>

- Figueroa, A. J., Sefcek, J. A., & Jones, D. N. (2006). The ideal romantic partner personality. *Personality and Individual Differences, 41*(3), 431–441. <https://doi.org/10.1016/j.paid.2006.02.004>
- Finkel, E. J., & Eastwick, P. W. (2008). Speed-dating. *Current Directions in Psychological Science, 17*(3), 193–197. <https://doi.org/10.1111/j.1467-8721.2008.00573.x>
- Frederick, D. A., & Haselton, M. G. (2007). Why is muscularity sexy? Tests of the fitness indicator hypothesis. *Personality and Social Psychology Bulletin, 33*(8), 1167–1183. <https://doi.org/10.1177/0146167207303022>
- Geniole, S. N., & McCormick, C. M. (2013). Taking control of aggression: Perceptions of aggression suppress the link between perceptions of facial masculinity and attractiveness. *Evolutionary Psychology, 11*(5), 1027–1043. <https://doi.org/10.1177/147470491301100507>
- Gerlach, T. M., Arslan, R. C., Schultze, T., Reinhard, S. K., & Penke, L. (2019). Predictive validity and adjustment of ideal partner preferences across the transition into romantic relationships. *Journal of Personality and Social Psychology, 116*(2), 313–330. <https://doi.org/10.1037/pspp0000170>
- Greengross, G., Martin, R. A., & Miller, G. (2012). Personality traits, intelligence, humor styles, and humor production ability of professional stand-up comedians compared to college students. *Psychology of Aesthetics, Creativity, and the Arts, 6*(1), 74–82. <https://doi.org/10.1037/a0025774>
- Greengross, G., & Miller, G. F. (2011). Humor ability reveals intelligence, predicts mating success, and is higher in males. *Intelligence, 39*(4), 188–192. <https://doi.org/10.1016/j.intell.2011.03.006>
- Greengross, G., Silvia, P. J., & Nusbaum, E. C. (2020). Sex differences in humor production ability: A meta-analysis. *Journal of Research in Personality, 84*, Article 103886. <https://doi.org/10.1016/j.jrp.2019.103886>
- Hall, J. A. (2015). Sexual selection and humor in courtship: A case for warmth and extroversion. *Evolutionary Psychology, 13*(3), Article 1474704915598918. <https://doi.org/10.1177/1474704915598918>
- Hall, J. A. (2017). Humor in romantic relationships: A meta-analysis. *Personal Relationships, 24*(2), 306–322. <https://doi.org/10.1111/per.12183>
- Hall, J. A. (2019). Humor production in long-term romantic relationships: What the lack of moderation by sex reveals about humor's role in mating. *Humor, 32*(3), 343–359. <https://doi.org/10.1515/humor-2018-0005>
- Haselton, M. G., & Buss, D. M. (2000). Error management theory: A new perspective on biases in cross-sex mind reading. *Journal of Personality and Social Psychology, 78*(1), 81–91. <https://doi.org/10.1037/0022-3514.78.1.81>
- Hofer, M. K., Buckels, E. E., White, C. J., Beall, A. T., & Schaller, M. (2018). Individual differences in activation of the parental care motivational system: An empirical distinction between protection and nurturance. *Social Psychological and Personality Science, 9*(8), 907–916. <https://doi.org/10.1177/1948550617728994>
- Hofmann, J., Platt, T., Lau, C., & Torres-Marín, J. (2023). Gender differences in humor-related traits, humor appreciation, production, comprehension, (neural) responses, use, and correlates: A systematic review. *Current Psychology, 42*(19), 16451–16464. <https://doi.org/10.1007/s12144-020-00724-1>
- Hone, L. S., Hurwitz, W., & Lieberman, D. (2015). Sex differences in preferences for humor: A replication, modification, and extension. *Evolutionary Psychology, 13*(1), 167–181. <https://doi.org/10.1177/147470491501300110>
- Jonason, P. K., Raulston, T., & Rotolo, A. (2012). More than just a pretty face and a hot body: Multiple cues in mate-choice. *The Journal of Social Psychology, 152*(2), 174–184. <https://doi.org/10.1080/00224545.2011.586654>
- Jones, B. C., Hahn, A. C., Fisher, C. I., Wang, H., Kandrik, M., Han, C., Fasolt, V., Morrison, D., Lee, A. J., Holzleitner, I. J., O'Shea, K. J., Roberts, S. C., Little, A. C., & DeBruine, L. M. (2018). No compelling evidence that preferences for facial masculinity track changes in women's hormonal status. *Psychological Science, 29*(6), 996–1005. <https://doi.org/10.1177/0956797618760197>
- Kenrick, D. T., Groth, G. E., Trost, M. R., & Sadalla, E. K. (1993). Integrating evolutionary and social exchange perspectives on relationships: Effects of gender, self-appraisal, and involvement level on mate selection criteria. *Journal of Personality and Social Psychology, 64*(6), 951–969. <https://doi.org/10.1037/0022-3514.64.6.951>
- Krems, J. A., & Conroy-Beam, D. (2020). First tests of Euclidean preference integration in friendship: Euclidean friend value and power of choice on the friend market. *Evolution and Human Behavior, 41*(3), 188–198. <https://doi.org/10.1016/j.evolhumbehav.2020.02.003>
- Li, N. P., Bailey, J. M., Kenrick, D. T., & Linsenmeier, J. A. W. (2002). The necessities and luxuries of mate preferences: Testing the tradeoffs. *Journal of Personality and Social Psychology, 82*(6), 947–955. <https://doi.org/10.1037/0022-3514.82.6.947>
- Li, N. P., Griskevicius, V., Durante, K. M., Jonason, P. K., Pasisz, D. J., & Aumer, K. (2009). An evolutionary perspective on humor: Sexual selection or interest indication? *Personality and Social Psychology Bulletin, 35*(7), 923–936. <https://doi.org/10.1177/0146167209334786>
- Li, N. P., & Kenrick, D. T. (2006). Sex similarities and differences in preferences for short-term mates:

- What, whether, and why. *Journal of Personality and Social Psychology*, 90(3), 468–489. <https://doi.org/10.1037/0022-3514.90.3.468>
- Li, N. P., Yong, J. C., Tov, W., Sng, O., Fletcher, G. J. O., Valentine, K. A., Jiang, Y. F., & Balliet, D. (2013). Mate preferences do predict attraction and choices in the early stages of mate selection. *Journal of Personality and Social Psychology*, 105(5), 757–776. <https://doi.org/10.1037/a0033777>
- Lippa, R. A. (2007). The preferred traits of mates in a cross-national study of heterosexual and homosexual men and women: An examination of biological and cultural influences. *Archives of Sexual Behavior*, 36(2), 193–208. <https://doi.org/10.1007/s10508-006-9151-2>
- Ma, D. S., Correll, J., & Wittenbrink, B. (2015). The Chicago face database: A free stimulus set of faces and norming data. *Behavior Research Methods*, 47(4), 1122–1135. <https://doi.org/10.3758/s13428-014-0532-5>
- Martin, R. A. (2014). Humor and gender: An overview of psychological research. In D. Chiaro & R. Baccolini (Eds.), *Gender and humor* (pp. 137–160). Routledge.
- Medlin, M. M., Brown, M., & Sacco, D. F. (2018). That's what she said! Perceived mate value of clean and dirty humor displays. *Personality and Individual Differences*, 135, 192–200. <https://doi.org/10.1016/j.paid.2018.07.017>
- Miller, G. (2000). *The mating mind: How sexual selection shaped the evolution of human nature*. Anchor Books.
- Miller, G. F. (2007). Sexual selection for moral virtues. *The Quarterly Review of Biology*, 82(2), 97–125. <https://doi.org/10.1086/517857>
- Montoya, R. M., & Horton, R. S. (2014). A two-dimensional model for the study of interpersonal attraction. *Personality and Social Psychology Review*, 18(1), 59–86. <https://doi.org/10.1177/1088868313501887>
- Montoya, R. M., Kershaw, C., & Prosser, J. L. (2018). A meta-analytic investigation of the relation between interpersonal attraction and enacted behavior. *Psychological Bulletin*, 144(7), 673–709. <https://doi.org/10.1037/bul0000148>
- Neel, R., & Lassetter, B. (2019). The stigma of perceived irrelevance: An affordance-management theory of interpersonal invisibility. *Psychological Review*, 126(5), 634–659. <https://doi.org/10.1037/rev0000143>
- Neuberg, S. L., Williams, K. E., Sng, O., Pick, C. M., Neel, R., Krems, J. A., & Pirlott, A. G. (2020). Toward capturing the functional and nuanced nature of social stereotypes: An affordance management approach. *Advances in Experimental Social Psychology*, 62, 245–304. <https://doi.org/10.1016/b.s.aesp.2020.04.004>
- Nusbaum, E. C., Silvia, P. J., & Beaty, R. E. (2017). Ha ha? Assessing individual differences in humor production ability. *Psychology of Aesthetics, Creativity, and the Arts*, 11(2), 231–241. <https://doi.org/10.1037/aca0000086>
- Ruch, W., Heintz, S., Platt, T., Wagner, L., & Proyer, R. T. (2018). Broadening humor: Comic styles differentially tap into temperament, character, and ability. *Frontiers in Psychology*, 9, Article 6. <https://doi.org/10.3389/fpsyg.2018.00006>
- Sacco, D. F., Brown, M., May, H. D., & Medlin, M. (2018). Making of an in-joke: Humor appreciation as an ingratiation strategy following ostracism. *Evolutionary Psychological Science*, 4(2), 202–211. <https://doi.org/10.1007/s40806-017-0129-1>
- Senko, C., & Fyffe, V. (2010). An evolutionary perspective on effective versus ineffective pick-up lines. *The Journal of Social Psychology*, 150(6), 648–667. <https://doi.org/10.1080/00224540903365539>
- Sng, O., Williams, K. E., & Neuberg, S. L. (2020). Sex-age stereotyping: Social perceivers as lay adaptationists. *Evolution and Human Behavior*, 41(2), 136–149. <https://doi.org/10.1016/j.evolhumbehav.2019.12.001>
- Storey, R. (2003). Humor and sexual selection. *Human Nature*, 14(4), 319–336. <https://doi.org/10.1007/s12110-003-1009-x>
- te Velde, E. R., & Pearson, P. L. (2002). The variability of female reproductive ageing. *Human Reproduction Update*, 8(2), 141–154. <https://doi.org/10.1093/humupd/8.2.141>
- Thomas, A. G., Jonason, P. K., Blackburn, J. D., Kennair, L. E. O., Lowe, R., Malouff, J., Stewart-Williams, S., Sulikowski, D., & Li, N. P. (2020). Mate preference priorities in the East and West: A cross-cultural test of the mate preference priority model. *Journal of Personality*, 88(3), 606–620. <https://doi.org/10.1111/jopy.12514>
- Treger, S., Sprecher, S., & Erber, R. (2013). Laughing and liking: Exploring the interpersonal effects of humor use in initial social interactions. *European Journal of Social Psychology*, 43(6), 532–543. <https://doi.org/10.1002/ejsp.1962>
- Trivers, R. L. (1972). Parental investment and sexual selection. In B. Campbell (Ed.), *Sexual selection and the descent of man* (pp. 136–179). Aldine.
- Tskhay, K. O., & Rule, N. O. (2013). Accurate identification of a preference for insertive versus receptive intercourse from static facial cues of gay men. *Archives of Sexual Behavior*, 42(7), 1217–1222. <https://doi.org/10.1007/s10508-013-0092-2>
- Walter, K. V., Conroy-Beam, D., Buss, D. M., Asao, K., Sorokowska, A., Sorokowski, P., Aavik, T., Akello, G., Alhabahba, M. M., Alm, C., Amjad, N., Anjum, A., Atama, C. S., Atamtürk Duyar, D., Ayebare, R., Batres, C., Bendixen, M., Bensafia, A., Bizumic, B., ... Zupančič, M. (2020). Sex differences in mate preferences across 45 countries: A large-scale replication. *Psychological Science*, 31(4), 408–423. <https://doi.org/10.1177/0956797620904154>

- Warren, C., Barsky, A., & McGraw, A. P. (2021). What makes things funny? An integrative review of the antecedents of laughter and amusement. *Personality and Social Psychology Review, 25*(1), 41–65. <https://doi.org/10.1177/1088868320961909>
- Warren, C., & McGraw, A. P. (2016). Differentiating what is humorous from what is not. *Journal of Personality and Social Psychology, 110*(3), 407–430. <https://doi.org/10.1037/pspi0000041>
- Wilbur, C. J., & Campbell, L. (2011). Humor in romantic contexts: Do men participate and women evaluate? *Personality & Social Psychology Bulletin, 37*(7), 918–929. <https://doi.org/10.1177/0146167211405343>
- Zebrowitz, L. A., & Rhodes, G. (2004). Sensitivity to “bad genes” and the anomalous face overgeneralization effect: Cue validity, cue utilization, and accuracy in judging intelligence and health. *Journal of Nonverbal Behavior, 28*(3), 167–185. <https://doi.org/10.1023/B:JONB.0000039648.30935.1b>
- Zeigler-Hill, V., Besser, A., & Jett, S. E. (2013). Laughing at the looking glass: Does humor style serve as an interpersonal signal? *Evolutionary Psychology, 11*(1), 201–226. <https://doi.org/10.1177/147470491301100118>
- Zhang, L., Lee, A. J., DeBruine, L. M., & Jones, B. C. (2019). Are sex differences in preferences for physical attractiveness and good earning capacity in potential mates smaller in countries with greater gender equality? *Evolutionary Psychology, 17*(2), Article 147470491985292. <https://doi.org/10.1177/1474704919852921>

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