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RESEARCH ARTICLE

Goodbye Aunt Jemima: Consumer Preferences for Pancake Mix Following Rebranding

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Abstract
Corporate political engagement is increasingly noticeable at grocery stores; however, there is limited research evaluating the impact on consumer demand. Here, we investigate the case of Aunt Jemima (AJ), which responded to criticism that the branding was racist by removing the eponymous image and renaming the brand Pearl Milling Company. We evaluate the changes on demand for both the brand and their competitors and find that renaming the brand reduced both willingness to pay for and choice of AJ and increased choice of competitors. Finally, we show these effects are mitigated significantly by informing consumers of the reason for rebranding.

Keywords: Aunt Jemima; corporate political engagement; discrete choice experiment; political consumption; Pearl Milling Company; rebranding

JEL classifications: D12; D22; D9; M31

On June 15, 2020, a TikTok criticizing Aunt Jemima (AJ) pancake mix went viral. The video showed the creator dumping out a box of pancake mix, provided historical details about the brand, and closed with the line "Black Lives Matter, people, even over breakfast." Two days later, the video had been viewed over 1.8 million times, and PepsiCo announced their plans to rebrand (Hsu, 2021). Other food brands followed soon after (e.g., Uncle Ben's, now Ben's Original; Eskimo Pie, now Edy's Pie; Mrs. Butterworth; Cream of Wheat). PepsiCo decided to remove the image of AJ from their packaging and change the brand name to Pearl Milling Company (PMC). A company statement said that they "made a commitment to change the name and image of Aunt Jemima, recognizing that they do not reflect our core values" (Hsu, 2021). The company's decision to change the name and imagery of a brand that is over 100 years old is a major one, as research has long shown that brands are valuable – increasing brand liking and consumers' willingness to pay for the products (e.g., Aaker, 1991; Chaudhuri and Holbrook, 2001; Matzler, Grabner-Kräuter, and Bidmon, 2008).

Research has evaluated consumer perceptions around brands engaging in polarizing issues (e.g., gun control, abortion) and has found that this can be quite risky (e.g., Hydock, Paharia, and Blair, 2020; Klostermann, Hydock, and Decker, 2022). Brands' engagements can range from lower-effort actions (e.g., brand statements) to higher-effort actions (e.g., changing company policies, reallotment of company resources). There is currently limited literature evaluating instances of high-effort corporate political engagement. Previous research has noted that brand preferences are more negative for high-effort advocacy (Klostermann et al., 2022). AJ pancake mix is an empirically useful case, as the company rolled out the rebranded product using a two-step

Figure 1. Original and rebranded packaging.

rollout process (see Figure 1). This rollout allows for the evaluation of a lower-effort action (image removal) from a higher-effort action (name change).

Most closely related to the present work is a previous study evaluating how consumers' perceptions of the AJ brand changed when the company rebranded (Kalaitzandonakes, Ellison, and White, 2023). In this paper, the researchers evaluated changes in consumers' preferences, including measures of likelihood of purchase, expected taste, brand liking, and brand trust, following the rebranding. The study provided initial evidence that renaming the brand had a negative effect on consumers' preferences and that removing the image of AJ had a more muted effect. Additionally, the researchers found that informing consumers the rebranding effort was made to address racism mitigated some of the losses associated with the renaming compared to an alternative reason.

Here, we extend this work in three important ways. First, we simulate the consumer experience more closely using a discrete choice experiment, which allows us to estimate changes in consumers' marginal utility and willingness to pay. Second, we expand the investigation beyond the rebranded product by evaluating the impact of the change on consumer preferences for the company's competitors. Finally, we expand the evaluation of mechanisms driving changes in consumer perceptions by evaluating a response under no information, which most accurately reflects the experience of consumers in the grocery store.

Although we evaluate consumer responses to the case of AJ in this paper, the decision to rebrand to address offensive imagery and branding spans many industries (e.g., sports, music, consumer products). More broadly, corporate political engagement is on the rise, and brands are engaging in low-effort and high-effort actions. A cursory read of recent food industry headlines (e.g., rejections of Bud Light beer for their choice of spokesperson, frustration at M&Ms for changing the shoes of the green candy, anger about the HERshey's bars) further underscores that understanding consumer responses to corporate political engagement in the food industry is only becoming more important.

1. Conceptual framework

In an economic framework, consumers choose products that maximize their utility. Lancaster (1966) argues that utility is not derived from the product itself but rather from the characteristics of the product. In the case of food products, this could include characteristics such as price,

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appearance, nutritional count, taste, safety, method of production (e.g., organic), and so on. Some product characteristics are more observable than others; in cases where consumers cannot directly observe a product characteristic (e.g., credence attributes), they may seek out labels or other information on the product packaging to inform their decision-making process.

The product brand is also an important product characteristic that provides information (and utility) to consumers. Consumers rely on branding to reduce information asymmetry and search costs (e.g., Aaker, 1991; Chaudhuri and Holbrook, 2001; Erdem and Swait, 1998; Kamakura and Russell, 1993). For example, brands can help consumers quickly identify products that provide consistently good taste. Consumers are often willing to pay a premium for brands and exhibit loyalty to their favorite brands, which makes brands extremely valuable.

Consumers may also derive utility from brands because purchasing that brand signals something greater about themselves. The marketing literature has long highlighted that consumers have both utilitarian and expressive needs, which can be met by products. For example, in an integrated information processing framework, researchers highlight that expressive needs are "requirements for products that provide social or aesthetic utility" (Maclnnis and Jaworski, 1989). When this occurs, for example, consumers may receive some utility from purchasing organic products when they feel the label is aligned with their identity or may buy a less preferred product to engage in a "buycott" to express their identity.

Economic researchers have attempted to integrate preferences for non-material aspects of products into the utility framework (e.g., Hillman, 2010; Tsai, 2005). Building on the expressive voting literature, Hillman (2010) posits that

$$Total\ Utility = Material\ Utility + Expressive\ Utility \tag{1}$$

where *Material Utility* is akin to the direct portion of the traditional utility function (derived from product attributes) and *Expressive Utility* accounts for the utility a consumer receives through actions that confirm their identity.

In equation (1), the literature would suggest that the brand has the potential to contribute to both the material and expressive utility components. As such, when a company decides to rebrand, it could affect both utility components, though the magnitude of the effects may depend on the extent of changes being made through the rebranding effort as well as how the company communicates about its rebranding effort to consumers. In Table 1, we consider how rebranding actions could affect material, expressive, and total utility for the AJ case.

First, we consider the extent of rebranding. We refer to the removal of the AJ image on packaging as low-effort rebranding and changing the brand name to PMC as high-effort rebranding. For the low-effort case, we expect small negative or null effects on both material utility and expressive utility. Conversely, in the high-effort case, we expect significant declines in both material and expressive utility. The rebranding literature highlights that a major concern with rebranding is loss in brand equity associated with the original brand (Kaikati and Kaikati, 2003; Miller, Merrilees, and Yakimova, 2014; Muzellec and Lambkin, 2006). Further, the literature has underscored that while both name changes and imagery changes can affect consumers preferences, higher-effort actions like renaming a brand are likely to have more radical effects (Muzellec and Lambkin, 2006). In a previous investigation of the AJ case, authors found that while brand liking and brand trust were unaffected by the image removal, both were reduced by the name change (Kalaitzandonakes et al., 2023). Thus, we expect that removing the image of AJ will have small negative or null effects on consumer utility and renaming the brand will have large, negative effects.

Next, we consider how the company communicates the rebranding changes. Communication is particularly important in the high-effort rebranding case as a name change may make a product unrecognizable in stores. In the case of removing an image, the original brand name remains intact and familiar to consumers; therefore, in our examples in Table 1, we narrow our focus on the high-effort rebranding case.

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Table 1. Expected impacts of rebranding on material, expressive, and total utility for the case of Aunt Jemima

Rebranding Effort	*Expected Effects on Material Utility (MU)*	*Expected Effects on Expressive Utility (EU)*	*Expected Effects on Total Utility (TU)*
Baseline (BASE): No Rebranding	MU derived from satisfaction from current product attributes (e.g., taste, price, liking of brand)	EU derived from any feelings that the product or brand aligns with an individual's identity	
Low Effort Rebranding (LER): Removal of Aunt Jemima Image	Expectation: $MU_{LER} \leq MU_{BASE}$ MU could decrease if the image helped consumers more easily identify the product, though brand name may still serve this purpose	Expectation: $EU_{LER} \leq EU_{BASE}$ EU could decrease from BASE if an individual tied the image itself to their identity, but identity likely tied to more than image alone	Expectation: $TU_{LER} \leq TU_{BASE}$
High Effort Rebranding (HER): Changing Brand Name to Pearl Milling Company	Expectation: $MU_{HER} < MU_{LER} < MU_{BASE}$ MU likely to decline due to loss of brand recognition; could also negatively impact perceptions of other product attributes (e.g., taste)	Expectation: $EU_{HER} \leq EU_{BASE}$ EU likely to decline for individuals who strongly identified with the Aunt Jemima brand	Expectation: $TU_{HER} < TU_{LER} < TU_{BASE}$
Using Info to Connect Aunt Jemima and Pearl Milling Company Brands (INFO)	Expectation: $MU_{HER+INFO} > MU_{HER}$ Connecting the brands will mitigate some of the losses from the reduced brand recognition	Expectation: $EU_{HER+INFO} = EU_{HER}$ Connecting the brands is unlikely to mitigate feelings of losing identity with the original brand	Expectation: $TU_{HER+INFO} > TU_{HER}$
Reason for Rebranding is to Address Racism (RACE)	Expectation: $MU_{HER+INFO+RACE} = MU_{HER+INFO}$ Reason for rebranding is unlikely to impact utility from material product attributes beyond the impacts of INFO	Expectation: $EU_{HER+INFO+RACE} > EU_{HER+INFO}$ or $EU_{HER+INFO+RACE} < EU_{HER+INFO}$ Individuals who support the company addressing racism in their branding are likely to have increased EU; however, individuals who strongly identify with the original Aunt Jemima brand may disagree with the reason for rebranding, which may cause stronger opposition to the new brand (thus, further reducing EU)	Expectation: $TU_{HER+INFO+RACE} > TU_{HER+INFO}$ or $TU_{HER+INFO+RACE} < TU_{HER+INFO}$ Ultimately will depend on how individuals identify (or do not identify) with the reason for rebranding
Reason for Rebranding is to Generate Interest (INT)	Expectation: $MU_{HER+INFO+INT} = MU_{HER+INFO}$ Reason for rebranding is unlikely to impact utility from material product attributes beyond the impacts of INFO	Expectation: $EU_{HER+INFO+INT} = EU_{HER+INFO}$ Rebranding to generate interest in the brand/product is unlikely to resonate strongly with consumers' identities	Expectation: $TU_{HER+INFO+INT} = TU_{HER+INFO}$

When brands change names, the literature has highlighted the importance of connecting the old and new brand to reduce losses in brand equity (Collange and Bonache, 2015; Kaikati and Kaikati, 2003; Miller et al., 2014). At the product level, this connection is often done through intensive marketing actions including product packaging labels, in-store displays, and advertising (Kaikati and Kaikati, 2003). Connecting the original and rebranded brand names clearly can reduce confusion that comes from lack of brand recognition.

Given this, we expect that providing information to explain that AJ changed their name to PMC will increase material utility (relative to providing no information) as this mitigates some of the losses from reduced brand recognition. We do not expect connecting the brands will result in increased expressive utility, though, as it is unlikely that one's identity ties to the original brand would immediately transfer to the new brand.

The rebranding communication strategy may also explain the reason for the rebranding effort in addition to connecting the old and new brands. In a qualitative exploration of consumer perceptions toward rebranding efforts, researchers found that about a third of respondents wondered *why* firms made the change and wanted to know more about the motivation (Collange and Bonache, 2015). In this study, we consider two potential reasons: the rebranding was done to (a) address racism or (b) increase interest in the brand and packaging. We do not expect either reason to have significant impacts on material utility, but we do expect them to have different impacts on expressive utility. In the case of rebranding to address racism, if a product meets a consumers' expressive needs (e.g., identifying as anti-racist), the product meeting those needs would generate utility for the consumer. In these cases, we would expect an increase in expressive utility. However, previous research on corporate political engagement highlights that engaging in polarizing issues (e.g., racism) can reduce brand liking from some consumers (Hydock et al., 2020; Klostermann et al., 2022). For consumers who strongly identified with the original AJ brand and disagree with the reason for rebranding, expressive utility may actually decrease. In the case of rebranding to generate interest, we do not expect this reason to resonate with consumers' identities; therefore, we expect a null effect on expressive utility.

2. Data and methods

2.1. Data

We conducted an online survey with 1,607 participants in July 2022. Participants were recruited through Qualtrics Panels, using quotas for gender, age, and income to match the US adult population. While our sample does a good job generally reflecting the demographics of the US adult population, online surveys are not random samples and thus suffer from sample bias. For example, our sample underrepresents white consumers (72% in our sample vs. 77% in the population). Sample and population demographics can be found in Appendix 1.

2.2. Survey design

This study was approved by the University of Illinois Urbana Champaign Institutional Review Board (IRB #22553). The survey draft can be found in Appendix 2. Respondents provided written consent by answering affirmatively that they would like to participate in the study in the first question of the online survey. To be eligible for participation, individuals were required to be at least 18 years of age and have purchased pancake mix in the last 12 months.

Prior to seeing the choice tasks (choice experiment design explained in the next section), participants saw a cheap talk script, which has been shown to reduce hypothetical bias in experiments (Cummings and Taylor, 1999). Additionally, individuals using mobile devices were required to use landscape mode, to view all alternatives simultaneously in each choice set. Those who were unable to use landscape mode were screened out of the survey.

After completing the choice tasks, participants were debriefed about the survey design and PepsiCo's actual rebranding decisions were summarized. Participants then answered questions

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about their demographics, shopping habits, knowledge about the AJ/PMC case prior to the survey, and their beliefs about the changes.

2.3. Experimental design

Discrete choice experiments are widely used in economics. They can be utilized to examine preferences and demand for product/service attributes that are new or unavailable in the marketplace (e.g., Brooks and Lusk, 2010; Pouta et al., 2010). These experiments are also used to test the impact of information on choice and willingness to pay/accept (e.g., Caputo, Lusk, and Nayga, 2018, 2020; Van Loo, Caputo, and Lusk, 2020; Ahn and Lusk, 2021; Luckstead, Nayga, and Snell, 2022; de Hooge et al, 2017).

For the discrete choice experiment, we used a labeled design, where participants were asked to choose between four brands of unflavored pancake mix and an opt-out option during each choice task. The brand alternatives were the most common unflavored pancake mix brand choices – AJ/PMC, Bisquick (BQ), Krusteaz (KR), and Hungry Jack (HJ). In the experiment, we did not include private labels or smaller brands as options. We varied price using three equidistant levels ($1.75, $2.75, and $3.75) and held other attributes (e.g., size, flavor) constant. The full factorial design would have required 81 choice tasks. To reduce respondent burden, we generated an orthogonal fractional factorial design with 9 choice tasks (D-Efficiency = 100%; see Appendix 3). The design was also balanced in that the price levels for each brand were presented an equal number of times. The order of choice tasks and order of alternatives within each choice task were randomized across respondents to prevent ordering effects.

For our main analysis, we used a 2 x 3 design (see Table 2), where participants were randomly assigned to a treatment arm that varied the extent of rebranding (*Image Removal Only* or *Image Removal & Name Change*) and the reason for rebranding (*No Information*, *Racism Information*, or *Alternative Information*). We also included a seventh treatment as a robustness check to check for ordering effects. In this treatment arm, participants saw Treatment 4 in the reverse order – first completing the choice tasks with the rebranded packaging and then completing the choice tasks with the original packaging. Approximately 230 participants were assigned to each treatment arm. Sample characteristics for each arm are presented in Appendix 4. Each participant answered 9 choice tasks that included the original package as an alternative and 9 choice tasks that included a rebranded package as an alternative, for a total of 18 choice tasks per participant. That is, we used a partial within-subject, partial-between subject design.

Varying the extent of rebranding allowed us to measure the impact of the removal of the image and the brand name change separately and provide insights to other brands that engaged or plan to engage in one or both steps of rebranding. Figure 2a–c provide examples of choice tasks. Figure 2a depicts an example from the first set of choice tasks, when AJ/PMC's original packaging remained an alternative. Figures 2b,c depict examples of the second set of choice tasks for those assigned to see AJ/PMC's first step of rebranding (*Image Removal Only*) and second step of rebranding (*Image Removal & Name Change*), respectively.

Varying the reason for rebranding allowed us to measure the impact of informing consumers why rebranding was done prior to their decision-making. This approach has been effectively used previously; for example, Ahn and Lusk (2021) evaluated whether the reasons given for taxes on sugar-sweetened beverages – both actual and alternative reasons – affected consumer choice of beverage. In our setup, participants either saw no information (*No Information)*, were told the change was made to address racism in the packaging (*Racism Information*), or were told the change was made to increase interest in the brand, which we refer to as *Alternative Information* throughout the paper. The text of all information remains as consistent across treatments as possible. For example, the *Racism Information* text when the brand was renamed reads, "Pepsi Co. announced that they rebranded Aunt Jemima pancake mix to address racism in their brand and packaging. In the new packaging they removed the image of Aunt Jemima and renamed the brand

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Table 2. Experimental design

Within-Subject	Between-Subjects					
Original packaging (t_0)	All participants (N = 1,604)					
Rebranded packaging (t_1)	Image Removal Only			Image Removal & Name Change		
	No Information	Racism Information	Alternative Information	No Information	Racism Information	Alternative Information
	Treatment 1 (n = 227)	Treatment 2 (n = 229)	Treatment 3 (n = 228)	Treatment 4 (n = 231)	Treatment 5 (n = 229)	Treatment 6 (n = 231)

Note: Our design also included a seventh treatment arm to check for ordering effects, using the reverse order of Treatment 4 (n = 229).

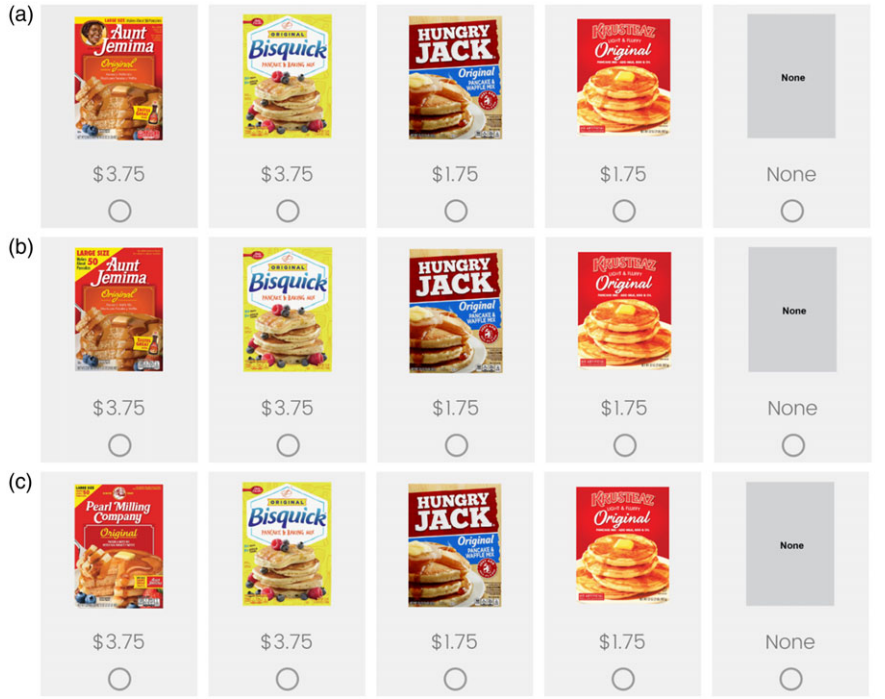

Figure 2. Choice task examples[1].

Pearl Milling Company." In the *Alternative Information* treatment, the words "address racism" were replaced with "increase interest." Participants were told the source of information was *AdWeek*, to avoid partisan affiliations with a news source. Full information treatment text is available in Appendix 5. Participants were asked knowledge check questions following the information to ensure they had understood the information treatment.

The *No Information* treatment most closely reflects the grocery store experience, which is most relevant for stakeholders making similar decisions. In addition, this design also allows us to investigate the potential mechanisms for the changes associated with rebranding. Previous research has highlighted two important types of brand knowledge: brand awareness and brand image and has found that existence of brand awareness is required to build brand image (Esch

[1]Note: Order of choice tasks and alternatives was randomized. Prices were varied according to the experimental design.

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et al., 2006; Keller, 1993). AJ/PMC's rebranding may have impacted both. Rebranding, and in particular, renaming, may have reduced brand awareness of consumers. Similarly, the reason for rebranding may have impacted brand liking and image.

To try to get at this difference, our design ensures that in both the *Racism Information* and *Alternative Information* treatments connect the original brand to the new brand – avoiding effects from changes in brand recognition. Each are compared to the omitted *No Information* category, where consumers were not explicitly told the brand AJ was now PMC. For this reason, we expect both information treatments will mitigate losses in consumer utility from rebranding.

2.4. Data analysis

We use random utility theory framework to understand the impact of the rebranding on consumer preferences (McFadden, 1973). In the random utility framework, U_{ijt} represents the utility for the ith consumer choosing brand j in choice task t, V_{ijt} is the non-stochastic component of the utility function, and ε_{ijt} is the stochastic component, known to the consumers but unknown to the researchers that is independently and identically distributed (McFadden, 1973):

$$U_{ijt} = V_{ijt} + \varepsilon_{ijt} \tag{2}$$

Consumer i maximizes their utility by choosing brand j in time t when their utility from choosing j is greater than their utility from choosing any of the other brands available:

$$U_{ijt} > U_{ilt} \forall l \tag{3}$$

We can evaluate the likelihood brand j is chosen by integrating over all values of ε_{ijt} in the choice set. If we assume ε_{ijt} is independently and identically distributed according to a Type I extreme value distribution, then we can estimate the probability of choosing $j$over the other products using a conditional logit model:

$$\Pr\left(U_{ijt} > U_{ilt} \forall l\right) = \frac{e^{V_{ijt}}}{\sum_{k=1}^{J} e^{V_{ikt}}} \tag{4}$$

We define the systematic portion of utility (V_{ijt}) in Equation 5. In this setup, X_j is an indicator variable for the brand j and $Price_{ijt}$ is the price of brand j faced by consumer i in choice task t. α_j is an alternative specific constant for each brand, which captures the additional utility from each brand over the opt-out option. Following previous research, we include a difference in differences model in the setup to estimate the impact of treatments on utility from each brand (Ahn and Lusk, 2021). To do so, we analyze the impact when only the image is removed in Model 1 and the impact when the name is also changed in Model 2. In both models, we interact the brand indicator variable (X_j) with group-level identifiers ($Racism\ Info_i$ and $AlternativeInfo_i$, which are compared to the omitted *No Info*); a time-variable ($Post_t$), which takes on the value of 0 during the first set of choice tasks (t_0) and 1 in the second set of choice tasks (t_1); and the interactions between time and group ($Racism\ Info_i \times Post_t$ and $Alternative\ Info_i \times Post_t$). Thus, β_{1j} and β_{2j} account for group-level differences, γ_j captures the impact of rebranding on utility for each brand (first difference), and δ_{1j} and δ_{2j} capture the impact of informing consumers the reason for AJ/PMC's rebranding was to address racism or for an alternative reason (second difference):

$$V_{ijt} = \sum_{j=1}^{4} X_j\left(\alpha_j + \beta_{1j} Racism\ Info_i + \beta_{2j} Alternative\ Info_i + \gamma_j Post_t + \delta_{1j}\left(Racism\ Info_i \times Post_t\right)\right.$$
$$\left. + \delta_{2j}\left(Alternative\ Info_i \times Post_t\right)\right) + \zeta Price_{ijt} \tag{5}$$

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The standard conditional logit model assumes the coefficients are equivalent across consumers. An initial exploration of the AJ/PMC case evaluated consumers' stated brand preference and likelihood of purchase and found evidence that consumer responses differ across consumer segments (Kalaitzandonakes et al., 2023); thus, we expect considerable heterogeneity across consumers. To allow for this, we utilize a random parameter logit model, which relaxes this assumption. This model allows for preference heterogeneity by allowing coefficients to vary across individuals. Specifically, $\beta_i = \overline{\beta} + \sigma\nu_i$, where $\overline{\beta}$ is the population mean, σ is the standard deviation, and ν_i is an individual-specific draw from a random variable. We assume all coefficients except price are normally distributed, and price is distributed according to a negative lognormal distribution, which assures all price coefficients are negative. Following the literature, we begin with estimations in marginal utility space, which generally produces a better fitting model, and then utilize these estimates as starting values to estimate effects in willingness to pay space, which have been shown to produce willingness to pay estimates with the most reasonable distributions (Hess and Palma, 2019; Train and Weeks, 2005). Analysis was conducted using the *Apollo* package in R.

To contextualize changes in willingness to pay for each brand (j), we calculate percent change in willingness to pay for each brand under each treatment group (g): $((\widehat{WTP_{j,g,t1}} - \widehat{WTP_{j,g,t0}})/\widehat{WTP_{j,g,t0}}) * 100$ *for* $g = 1$ *to* 6. To do this, we utilize estimates of willingness to pay for each brand prior to and following treatment. Willingness to pay for a brand prior to treatment is the brand-specific constant ($WTP_{j,\,t0} = \hat{\alpha_j}$). Willingness to pay for a brand following AJ/PMC's rebranding (under *No Information*) is $WTP_{j,t1} = \hat{\alpha}_j + \widehat{\gamma_j}$. Similarly, willingness to pay for a brand following AJ/PMC's rebranding with information are represented by $WTP_{j,t1} = \hat{\alpha}_j + \widehat{\gamma_j} + \widehat{\delta_{1j}}$ for *Racism Information* and $WTP_{j,t1} = \hat{\alpha}_j + \widehat{\gamma_j} + \widehat{\delta_{2j}}$ for *Alternative Information*.

As our main results rely on parametric assumptions, we also include a non-parametric evaluation of the proportion of brand choices. To do so, we calculate each consumers' proportion of brand choices prior to treatment (t_0)and post treatment (t_1). We then calculate the average proportion of brand choices across consumers and evaluate differences across treatment groups.

3. Results

3.1. Changes in brand choice

We begin by exploring the impact of treatments on brand choice and then proceed to our utility estimates. Table 3 shows the average percent of brand choices prior to treatment (t_0), the average post-treatment (t_1), the difference between these two ($t_1 - t_0$), the standard error of the difference, and *t*-test significance, indicating whether the percent of brand choices differed significantly pre- and post-treatment. We see that when only the image is removed, there is no change to AJ/PMC and almost no change to competitors. When the name is also changed, we see significant changes to the proportion of AJ/PMC choices. Under *No Information*, the proportion of AJ/PMC choices dropped by 24.4 percentage points. Both information treatments seem to mitigate some of this loss, with the proportion of AJ/PMC choices dropping by only 7.1 and 5.4 percentage points under the *Racism Information* and *Alternative Information* treatments, respectively. When the name is changed, we also see some changes in the proportion of competitor brand choices – with increases in BQ, HJ, and KR. Additionally, when AJ/PMC was renamed under *No Information*, we see an increase in the proportion of consumers who did not choose any brand of pancake mix, but preferred to opt-out instead.

3.2. Changes in willingness to pay

Results from our random parameter logit models are presented in Table 4. The models account for brand-level effects that capture consumers' marginal utility for the brand over opting-out (α_j),

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Table 3. Differences in average percent of brand choice pre (t_0) and post (t_1) treatments

	Image Removal Only			Image Removal & Name Change		
No Info	t_0	t_1	**Difference**	t_0	t_1	**Difference**
AJ/PMC	42.0%	39.9%	−2.1 (0.013)	48.7%	24.3%	−24.4** (0.025)
BQ	19.8%	18.2%	−1.5 (0.009)	17.8%	22.3%	4.5** (0.012)
HJ	18.1%	18.8%	0.6 (0.011)	16.4%	28.8%	12.4** (0.021)
KR	16.5%	18.8%	2.3* (0.009)	14.7%	18.3%	3.7** (0.013)
NONE	3.6%	4.3%	0.7 (0.006)	2.4%	6.2%	3.8** (0.013)
Racism Info	t_0	t_1	**Difference**	t_0	t_1	**Difference**
AJ/PMC	48.0%	45.8%	−2.2 (0.015)	46.7%	39.6%	−7.1** (0.019)
BQ	18.5%	19.4%	0.8 (0.008)	17.8%	17.8%	0.0 (0.011)
HJ	17.5%	16.5%	−1.1 (0.012)	17.1%	20.6%	3.5** (0.013)
KR	13.6%	15.1%	1.6 (0.009)	13.8%	17.0%	3.2** (0.013)
NONE	2.4%	3.3%	0.9 (0.007)	4.6%	5.1%	0.4 (0.006)
Alternative Info	t_0	t_1	**Difference**	t_0	t_1	**Difference**
AJ/PMC	42.0%	43.3%	1.3 (0.018)	41.9%	36.4%	−5.4* (0.021)
BQ	18.9%	18.0%	−0.9 (0.009)	23.9%	23.7%	−0.1 (0.009)
HJ	20.0%	20.1%	0.1 (0.013)	15.8%	20.2%	4.4** (0.017)
KR	16.7%	16.4%	−0.3 (0.011)	17.3%	18.3%	1.1 (0.012)
NONE	2.5%	2.2%	−0.2 (0.004)	1.3%	1.3%	0.0 (0.004)

Notes: Difference refers to $t_1 - t_0$. Standard errors listed in parentheses. Stars indicate the significance of the *t*-test, where the null hypothesis is that the percent of brand choices pre- and post-treatment do not differ from each other ($t_1 - t_0 = 0$). ** $p < 0.01$, * $p < 0.05$.

group-level differences in marginal utility associated with brands (β_{1j} and β_{2j}), and a price parameter (ζ). The models also include difference in differences parameters that estimate the impact of treatments on marginal utility of each brand. These are: γ_j, which captures the impact of rebranding; δ_{1j}, which captures the impact of informing consumers the rebranding was done to address racism over no information; and δ_{2j}, which captures the impact of informing consumers the rebranding was done to increase interest in the brand over no information. The standard deviations associated with each variable indicate whether the coefficients had significant consumer-level heterogeneity. The results presented are from the model in willingness to pay space. Results from the model in marginal utility space can be found in Appendix 6.

In model 1, we analyze the impact of rebranding when only the image of AJ was removed (*Image Removal Only*). First, as expected, willingness to pay for all four brands is positive compared to the opt-out. Second, our results indicate that the first difference ($\widehat{\gamma_j}$), which accounts for the impact of removing the image of AJ, was not associated with any changes in consumers' average willingness to pay for AJ/PMC or for competitor products. Third, we find that the second differences ($\widehat{\delta_{1,j}}$ and $\widehat{\delta_{2,j}}$), which account for the impact of the reason given for the removal of the image, had no impact on the average willingness to pay for AJ/PMC or competitors. However, significant standard deviations for both information effects on AJ/PMC indicate consumers responded heterogeneously to the reason for rebranding.

In model 2, we analyze the impact of rebranding when the brand name was also changed to PMC (*Image Removal & Name Change*). Here, we find that this more significant rebranding

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Table 4. Random parameter logit model results in willingness to pay space

	Image Removal Only				Image Removal & Name Change			
	Mean		Std Dev		Mean		Std Dev	
Brand-specific constants ($\widehat{\alpha_j}$)								
AJ/PMC	4.79**	(0.23)	2.23**	(0.13)	5.38**	(0.34)	2.29**	(0.15)
BQ	3.24**	(0.18)	2.28**	(0.12)	2.95**	(0.26)	2.64**	(0.19)
HJ	3.30**	(0.26)	2.06**	(0.23)	3.70**	(0.35)	2.07**	(0.12)
KR	2.57**	(0.24)	1.93**	(0.11)	2.82**	(0.33)	2.50**	(0.19)
Price ($\hat{\zeta}$)								
PRICE [a]	−0.468**	(0.10)	1.34**	(0.09)	−0.319**	(0.07)	0.97**	(0.05)
Brand × Racism Info ($\widehat{\beta_{1j}}$)								
AJ/PMC × Racism Info	1.91**	(0.28)	3.92**	(0.22)	−0.76*	(0.35)	2.18**	(0.16)
BQ × Racism Info	0.18	(0.23)	1.95**	(0.12)	−0.56	(0.29)	1.43**	(0.19)
HJ × Racism Info	1.09**	(0.35)	0.49**	(0.10)	−0.33	(0.35)	0.69**	(0.11)
KR × Racism Info	1.52**	(0.27)	1.76**	(0.15)	−0.28	(0.35)	1.10**	(0.13)
Brand × Alternative Info ($\widehat{\beta_{2j}}$)								
AJ/PMC × Alternative Info	1.47**	(0.44)	1.96**	(0.16)	1.37*	(0.69)	0.23*	(0.11)
BQ × Alternative Info	1.75**	(0.47)	2.57**	(0.20)	1.30	(0.91)	0.11	(0.10)
HJ × Alternative Info	1.86**	(0.47)	0.98**	(0.10)	1.00	(0.78)	1.15**	(0.15)
KR × Alternative Info	1.75**	(0.47)	0.52**	(0.08)	1.83*	(0.80)	0.90**	(0.11)
Brand × Post ($\widehat{\gamma_j}$)								
AJ/PMC × Post	−0.04	(0.10)	0.16	(0.13)	−2.07**	(0.30)	1.47**	(0.14)
BQ × Post	−0.14	(0.12)	0.11*	(0.04)	−0.40	(0.24)	0.49**	(0.09)
HJ × Post	0.00	(0.10)	0.00	(0.12)	−0.06	(0.30)	0.90**	(0.12)
KR × Post	−0.03	(0.11)	0.09	(0.08)	−0.26	(0.25)	0.07	(0.08)
Brand × Racism Info × Post ($\widehat{\delta_{1j}}$)								
AJ/PMC × Post × Racism Info	−0.03	(0.21)	0.45**	(0.11)	1.77**	(0.33)	1.04**	(0.20)
BQ × Post × Racism Info	0.20	(0.21)	0.10	(0.15)	0.14	(0.25)	0.05	(0.08)
HJ × Post × Racism Info	0.05	(0.21)	0.03	(0.08)	0.08	(0.32)	0.32**	(0.08)
KR × Post × Racism Info	0.02	(0.20)	0.09	(0.08)	0.52	(0.32)	1.04**	(0.20)
Brand × Alternative Info × Post ($\widehat{\delta_{2j}}$)								
AJ/PMC × Post × Alternative Info	0.38	(0.32)	0.35**	(0.06)	1.96**	(0.55)	0.15	(0.09)
BQ × Post × Alternative Info	0.32	(0.36)	0.07	(0.05)	0.54	(0.51)	0.66**	(0.19)
HJ × Post × Alternative Info	0.17	(0.34)	0.46**	(0.15)	0.76	(0.54)	0.71	(0.48)
KR × Post × Alternative Info	0.23	(0.34)	0.02	(0.07)	0.84	(0.51)	0.70**	(0.13)

Notes: Standard errors in parentheses; ** $p < 0.01$, * $p < 0.05$; Both *Racism Information* and *Alternative Information* are compared to the omitted *No Information*. Names of brands are abbreviated to: Aunt Jemima/Pearl Milling Company (AJ/PMC), Bisquick (BQ), Hungry Jack (HJ), and Krusteaz (KR). [a] Price takes a negative lognormal distribution; thus the estimated parameter's $\text{Mean}_{price} = -\exp\left(\beta_{price} + \left(\frac{s_{price}^2}{2}\right)\right) = -3.90$ and $\text{sd}_{price} = \text{mean}_{price} * \exp\left(\beta_{price} + (s_{price}^2/2)\right) = 8.64$, when only the image is removed, and $\text{Mean}_{price} = -2.21$ and $\text{sd}_{price} = 2.81$, when the image is removed and the name is changed. Estimates presented in the table are from the model run in willingness to pay space. Estimates from marginal utility space can be found in Appendix 6.

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Table 5. Percent change in willingness to pay for Aunt Jemima/Pearl Milling Company associated with treatments

Image Removal Only			Image Removal & Name Change		
No Info	Racism Info	Alternative Info	No Info	Racism Info	Alternative Info
Treatment 1	Treatment 2	Treatment 3	Treatment 4	Treatment 5	Treatment 6
−0.8%	−1.5%	7.1%	−38.5%	−5.6%	−2.0%

reduced average willingness to pay for AJ/PMC (-$2.07). The change had no effect on average willingness to pay for competitor products. The standard deviations associated with the impact of rebranding were significant and large (when compared to the mean effect) for AJ/PMC ($1.47) and some competitors ($0.47 for BQ and $0.90 for HJ), indicating responses were heterogeneous across consumers. Additionally, we find that providing a reason for rebranding (captured by $\widehat{\delta_{1,j}}$ and $\widehat{\delta_{2,j}}$) increased average willingness to pay for AJ/PMC and had no effect on average willingness to pay for competitors. *Racism Information* was associated with an increased willingness to pay of $1.77 for AJ/PMC, compared to the omitted *No Information* treatment, and was associated with a significant, large standard deviation ($1.04), underscoring that consumers responded heterogeneously to this information. The *Alternative Information* was associated with an increased willingness to pay of $1.96 for AJ/PMC, compared to the omitted *No Information* treatment. However, here, we do not find significant evidence of consumer-level heterogeneity.

To contextualize these willingness to pay estimates, we calculate the percent change in willingness to pay associated with each treatment. As treatments had significant impacts on average willingness to pay for only on AJ/PMC's products, we present only these results in Table 5, however, all calculations and estimates can be found in Appendix 7.

When only the image was removed (Treatments 1–3), reductions in willingness to pay for AJ/PMC ranged from 0.8%–7.1%, and willingness to pay estimates indicate none were significantly different from zero. When the brand name was also changed (Treatments 4–6), willingness to pay for AJ/PMC decreased by 38.5%. Information reduced the losses in willingness to pay considerably – with total willingness to pay for AJ/PMC decreasing by 5.6% when consumers were told the rebranding was done to address racism and decreasing by 2.0% when they were told the change was done for an alternative reason.

3.3. Consumer heterogeneity

We find evidence of considerable consumer-level heterogeneity in responses to AJ/PMC's rebranding and to *Racism Information*, when both the image was removed and the name was changed (see results from Model 2 presented in Table 4 under *Image Removal & Name Change*). Below, we explore this variation further.

Figure 3 shows a histogram of individuals' estimated willingness to pay for rebranding. First, we see that almost all estimates were negative, indicating that renaming the brand reduced willingness to pay for nearly all participants. Second, while the mean hovers around -$2, the relatively wide tails indicate that the reduction in willingness to pay ranged significantly.

Further, Figure 4 shows the histograms of individual willingness to pay estimates associated with *Racism Information* and *Alternative Information* for AJ/PMC when the brand name was changed. As underscored by the mean effects highlighted in the estimation results (see Table 4), on average, both treatments increased willingness to pay. However, the estimates for *Alternative Information* were much tighter, indicating a more uniform response across consumers to the information. Conversely, *Racism Information* had much longer tails, indicating that consumers responded much more heterogeneously to this information.

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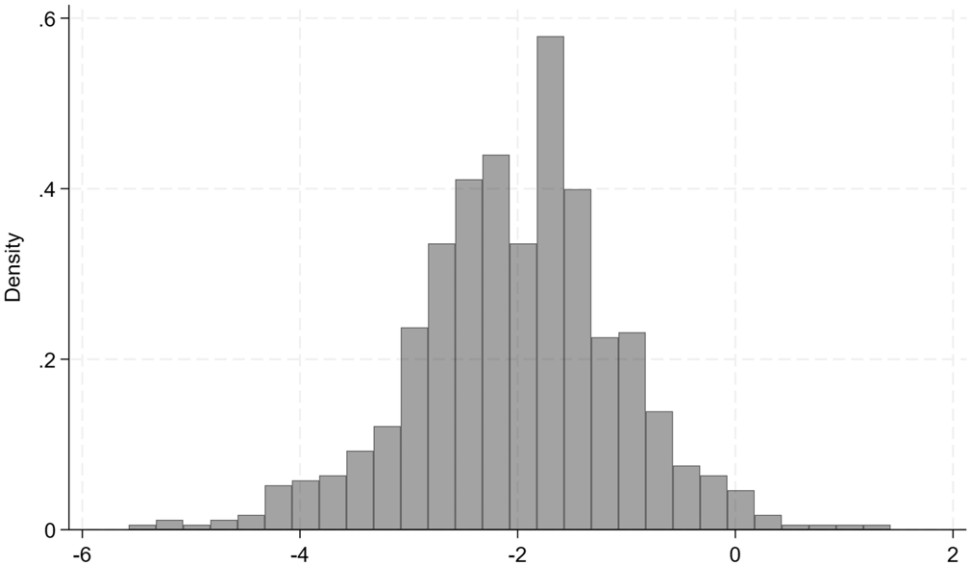

Figure 3. Histogram of individual willingness to pay estimates for rebranding (*post*) for Aunt Jemima/Pearl Milling Company in model 2 (*image removal & name change*).

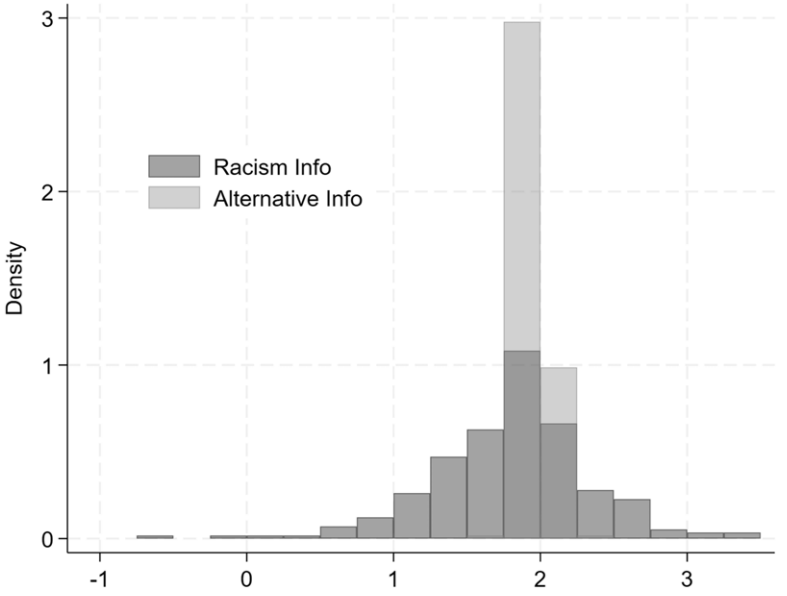

Figure 4. Histogram of individual willingness to pay estimates for information treatments (*racism information* × *post* and *alternative information* × *post*) for Aunt Jemima/Pearl Milling Company in model 2 (*image removal & name change*).

One way to explore this variation further would be to regress the individual willingness to pay estimates for rebranding or information on consumer characteristics (results in Appendix 8). However, we find that none of the consumer characteristics that the literature would indicate may be related to preferences (including race, political ideology, and education) were significantly associated with these changes in willingness to pay.

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4. Discussion

4.1. Impact of rebranding

We find that while removing the image of AJ had no effect on preferences for the brand, renaming the brand PMC reduced preferences for AJ/PMC products – with willingness to pay dropping by 38.5% and the proportion of choices dropping by 24.4 percentage points when no information was provided. This echoes findings from Kalaitzandonakes, Ellison, and White (2023) and is in line with the rebranding literature, which suggests low-effort rebranding is less radical and less likely to impact consumers compared to high-effort rebranding (Muzellec and Lambkin, 2006). This suggests that other companies that removed images to address racism around the same time (e.g., Cream of Wheat) may have seen little to no losses, and more broadly, this may suggest that companies involved in removing or changing images for a variety of reasons may not expect to see losses. We might also expect smaller impacts from more moderate name changes (e.g., Uncle Ben's, which was rebranded to Ben's Original).

In addition to exploring the impact on AJ/PMC, we also evaluate whether the rebranding had impacts on competitors. Here, we find that neither AJ/PMC's renaming, nor the image removal, impacted willingness to pay for competitors' products; however, we do find that the proportion of choices for competitors increased following renaming. Importantly, we held brand behavior (e.g., pricing) constant by design, which is unlikely to have been the case in the grocery store setting. Both AJ/PMC and competitor brands are more likely to have behaved strategically during the rebranding by altering pricing, advertising, and promotional strategies to attempt to retain customers or entice consumers to brand switch. Future research could evaluate competitor responses.

4.2. Impact of reason for rebranding

By using information treatments, we explore consumer responses to the reason for rebranding. Here, we find that both information treatments provided sizeable protection against the losses associated with renaming. The proportion of AJ/PMC choices following renaming dropped by 7.1 percentage points and 5.4 percentage points under *Racism Information* and *Alternative Information*, respectively, compared to the much larger reduction in choices under *No Information* (24.4 percentage points). Similarly, reductions in willingness to pay for AJ/PMC products dropped by 5.6% and 2.0% following renaming under *Racism Information* and *Alternative Information*, respectively.

Although both brand choice and willingness to pay were still reduced, the information offered substantial protection when compared to the losses when consumers were not given a reason for rebranding. This echoes the warnings from the rebranding literature that failing to connect the original and updated brand name can reduce brand recognition, and thus, brand choice.[2]

Additionally, while the average effect of the two information treatments was approximately equivalent, *Racism Information* produced much more heterogeneous responses than *Alternative Information*. It is particularly noteworthy that politics was uncorrelated with responses to changes in willingness to pay from *Racism Information*, as previous work highlighted that brand preferences differed across consumers with different political ideologies (Kalaitzandonakes et al., 2023).

[2]It should be noted that PMC includes a small tag on their product packaging that claims "Same great taste as Aunt Jemima" in an effort to connect their old and new brands. Participants in all treatment arms, including the *No information* treatment arms, would have had the opportunity to observe this if they were looking closely at the products. However, our results would suggest that consumers did not attend to this information on the package, as losses were much larger under *No Information*. This implies that more intentional marketing and education efforts are needed to connect the old and new brands.

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4.3. Robustness checks & limitations

In our design, participants were asked to make selections when both the original AJ product was available (t_0) and when the rebranded product was available (t_1). While this design offers many benefits (e.g., cluster errors at individual level, evaluate individual level changes in choice and willingness to pay), we are limited by the potential issues of ordering effects and prior knowledge of the case, both of which we discuss in more detail below. We also discuss implications of social desirability bias and external validity.

First, we may be concerned that the order of the sets of choice tasks, rather than the rebranding, is driving the effects. To assess the impact of this effect we included a seventh treatment arm (Treatment 7), where participants saw the reverse of Treatment 4. Here, participants first answered a set of choice tasks with the renamed product (PMC) as an alternative and then answered a set of choice tasks with the original product (AJ). Like Treatment 4, this group received no information treatment. We find that the proportion of PMC brand choices in first set of choice tasks (t_0) for Treatment 7 (23.6% chose PMC) was quite similar to the selections made in the second set of choice tasks (t_1) for Treatment 4 (24.3% chose PMC). The similarity of these two provides some reassuring evidence that while ordering effects may still be a concern, it is unlikely to be driving the results.

Second, in an ideal experimental setting, no participants would have been aware of the case prior to the choice tasks, which would likely have required the use of a fictitious case. As we utilize an actual case, some participants in every treatment group were aware of AJ/PMC's rebranding prior to the experiment. Participants' prior knowledge of the case could bias the estimates of rebranding. We would expect this would be a downward bias, leading to an underestimation of the losses associated with rebranding. For example, when the brand was renamed, participants without any prior knowledge of the case would be less likely to prefer a completely unknown brand (PMC) than those who had some previous knowledge of its connection to a known brand (AJ). In Appendix 9, we plot individual willingness to pay estimates associated with rebranding (i.e., *AJ/PMC* × *Post*, Model 2) that provides some evidence of this downward bias. Here, we see that although renaming the brand was associated with decreased willingness to pay for both those with and without previous knowledge of the case, the effect was *more* negative for those without previous knowledge. Similarly, while we find that participants overall decreased choice of AJ/PMC by 24.4 percentage points when the name was changed without information (see Table 3, Treatment 4), this reduction was larger for those with no prior knowledge of the case (−34.9 percentage points).

Similarly, participants' awareness of the case could also bias the estimates of the information treatments, underestimating the impact of informing consumers the reason for rebranding. In particular, there were some participants in the *No Information* group and in the *Alternative Information* group who were aware of the true reason given by the company (to address racism). As the effect of both *Racism Information* and *Alternative Information* are compared to the effect of the omitted category, *No Information*, we believe this bias is likely to be relatively small. Our regression results find no correlation between prior knowledge of the case and individual willingness to the information treatment (see Appendix 8).

Third, we might be concerned with social desirability bias. This type of bias occurs when respondents feel pressure to respond in socially acceptable ways (Crowne and Marlowe, 1960). For example, previous literature has highlighted that people may underreport behaviors they perceive as not socially acceptable (e.g., drug use) or may inflate their support for things they perceive as being socially acceptable (e.g., animal welfare attributes) (e.g., Crowne and Marlowe, 1960; Kuokkanen, 2017; Lai, Boaitey, and Minegishi, 2022).[3] In this case, participants may have felt pressure to respond in ways they perceived as socially acceptable (e.g., to support removing racist

[3]The concern surrounding social desirability bias is especially high when responses are not anonymous, which was not the case here. Respondents were reminded all answers were anonymous several times throughout the survey.

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imagery and brand name). However, the context of this case (Kalaitzandonakes et al., 2023) and of Black Lives Matter more generally (Horowitz, 2021) were not broadly supported; rather, there were deep divides, especially across political lines. If social desirability bias were driving our results, we would expect to find increased brand choices and willingness to pay for AJ/PMC. Here, we find that when only the image is removed, proportion of choices and willingness to pay were unaffected. When the brand is renamed, we find that brand choice drops more and willingness to pay is reduced. We would also expect the effect of *Racism Information* to be larger and more positive than *Alternative Information*, especially amongst liberal consumers. However, we find that when only the image is removed, the proportion of choices and willingness to pay were not affected by either information treatment. When the brand was also renamed, the effects of information were similar, and being liberal was uncorrelated with estimated willingness to pay *Racism* × *Post* (Appendix 8). Overall, it seems unlikely that social desirability bias is driving the results.

Fourth, given that the information was provided immediately before the choice tasks, these results likely represent the upper bound of the impact of information on consumer preferences. For example, the protective effects of connecting the original and rebranded product are likely to be smaller as the time between information provision and choice passes.

Finally, additional research evaluating rebranding under similar circumstances in a broader set of contexts is needed. For example, industries would differ in terms of switching costs (e.g., electronics, cars) or levels of brand involvement (e.g., sports teams), which would likely impact consumer responses. Similarly, while understanding consumer preferences surrounding corporate political engagement is important, there is currently very limited research that evaluates how these changes in preferences translate to changes in actual behavior – with one recent exception being Liaukonytė, Tuchman, and Zhu (2023) evaluation of the impact of Goya Foods. As stated preference analyses can suffer from hypothetical bias, additional research is needed to understand how these preferences translate to actual behavior.

5. Conclusions

Corporate political engagement is on the rise – in and outside the grocery aisles. In this paper, we use a discrete choice experiment to evaluate consumer responses to PepsiCo's rebranding of AJ pancake mix. We evaluate the impact of a high-effort action (renaming the brand PMC) and a low-effort action (removing the image of AJ) on consumers' willingness to pay for the product. We also vary the reason for rebranding, to evaluate the mechanisms behind changes in consumer preferences. Finally, we evaluate whether these changes had any impacts on consumer preferences for competitors' products.

We find that while the image removal resulted in no changes in willingness to pay, the renaming reduced willingness to pay by over 30% and the proportion of choice by over 20 percentage points. Information indicating that the rebranding was done to address racism elicited a much more varied response than information indicating that the change was done for an alternative reason; however, on average, both reasons mitigated much of the losses associated with renaming. For competitors, we find that the renaming was not associated with changes in willingness to pay, but the proportion of choices increased. Finally, we find evidence that some consumers chose to opt-out rather than brand switch following the renaming.

Ultimately, as brand behavior of food firms continues to be more highly scrutinized and polarized, understanding consumer responses to political brand engagement is only becoming more important. While this research investigates the case of one brand, it offers important insights on how brands and their competitors may be impacted by similar efforts.

Supplementary material. The supplementary material for this article can be found at https://doi.org/10.1017/aae.2024.25.

Data availability statement. The data are included in supplemental materials and the codebook is located in Appendix 10.

Author contributions. Conceptualization – MK, BE; Data curation – MK; Formal Analysis – MK; Funding acquisition – BE; Methodology – MK, BE, JL; Project administration – MK, BE; Resources – BE; Supervision – BE, JL; Visualization – MK; Writing – original draft – MK; Writing – review & editing – BE, JL.

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References

Aaker, D.A. *Managing Brand Equity: Capitalizing On the Value of a Brand Name*. New York: Free Press, 1991.

Ahn, S., and J.L. Lusk. "Non-pecuniary effects of sugar-sweetened beverage policies." *American Journal of Agricultural Economics* **103**,1(2021):53–69.

Brooks, K., and J.L. Lusk. "Stated and revealed preferences for organic and cloned milk: Combining choice experiment and scanner data." *American Journal of Agricultural Economics* **92**,4(2010):1229–41.

Caputo, V., J.L. Lusk, and R.M. Nayga. "Choice experiments are not conducted in a vacuum: The effects of external price information on choice behavior." *Journal of Economic Behavior and Organization* **145**(2018):335–51.

Caputo, V., J.L. Lusk, R.M. Nayga. "Am I getting a good deal? Reference-dependent decision making when the reference price is uncertain." *American Journal of Agricultural Economics* **102**,1(2020):132–53.

Chaudhuri, A., and M.B. Holbrook. "The chain of effects from brand trust and brand affect to brand performance: The role of brand loyalty." *Journal of Marketing* **65**,2(2001):81–93.

Collange, V., and A. Bonache. "Overcoming resistance to product rebranding." *Journal of Product and Brand Management* **24**,6(2015):621–32.

Crowne, D.P., and D. Marlowe. "A new scale of social desirability independent of psychopathology." *Journal of Consulting Psychology* **24**,4(1960):349–54.

Cummings, R.G., and L.O. Taylor. "Unbiased value estimates for environmental goods: A cheap talk design for the contingent valuation method." *American Economic Review* **89**,3(1999):649–65.

de Hooge, I.E., M. Oostindjer, J. Aschemann-Witzel, A. Normann, S.M. Loose, and V.L. Almli. "This apple is too ugly for me!: Consumer preferences for suboptimal food products in the supermarket and at home." *Food Quality and Preference* **56**(2017):80–92.

Erdem, T., and J. Swait. "Brand equity as a signaling phenomenon." *Journal of Consumer Psychology* **7**,2(1998):131–57.

Esch, F.R., T.L. Langner, B.H. Schmitt, and P. Geus. "Are brands forever? How brand knowledge and relationships affect current and future purchases." *Journal of Product and Brand Management* **15**,2(2006):98–105.

Hess, S., and D. Palma. "Apollo: A flexible, powerful and customisable freeware package for choice model estimation and application." *Journal of Choice Modelling* **32**(2019):100170.

Hillman, A.L. "Expressive behavior in economics and politics." *European Journal of Political Economy* **26**,4(2010):403–18.

Horowitz, J.M. *Support for Black Lives Matter Declined After George Floyd Protests, But has Remained Unchanged Since*. Washington DC: Pew Research, 2021. https://www.pewresearch.org/short-reads/2021/09/27/support-for-black-lives-matter-declined-after-george-floyd-protests-but-has-remained-unchanged-since/.

Hsu, T. *Aunt Jemima Brand to Change Name and Image Over 'Racial Stereotype*. New York: The New York Times, 2021. https://www.nytimes.com/2020/06/17/business/media/aunt-jemima-racial-stereotype.html.

Hydock, C., N. Paharia, and S. Blair. "Should your brand pick a side? How market share determines the impact of corporate political advocacy." *Journal of Marketing Research* **57**,6(2020):1135–51.

Kaikati, J.G., and A.M. Kaikati. "A rose by any other name: rebranding campaigns that work." *Journal of Business Strategy* **24**,6(2003):17–23.

Kalaitzandonakes, M., B. Ellison, and T. White. "Consumer responses to rebranding to address racism." *PLOS ONE* **18**,2(2023):e0280873.

Kamakura, W.A., and G.J. Russell. "Measuring brand value with scanner data." *International Journal of Research in Marketing* **10**,1(1993):9–22.

Keller, K.L. "Conceptualizing, measuring, and managing customer-based brand equity." *Journal of Marketing* **57**,1(1993):1–22.

Klostermann, J., C. Hydock, and R. Decker. "The effect of corporate political advocacy on brand perception: An event study analysis." *Journal of Product and Brand Management* **31**,5(2022):780–97.

Kuokkanen, H. "Fictitious consumer responsibility? Quantifying social desirability bias in corporate social responsibility surveys." *Palgrave Communications* **3**,1(2017):16106.

https://doi.org/10.1017/aae.2024.25 Published online by Cambridge University Press

Lai, Y., A. Boaitey, and K. Minegishi. "Behind the veil: Social desirability bias and animal welfare ballot initiatives." *Food Policy* **106**(2022):102184.

Lancaster, K.J. "A new approach to consumer theory." *Journal of Political Economy* **74**,2(1966):132–57.

Liaukonytė, J., A. Tuchman, and X. Zhu. "Frontiers: Spilling the beans on political consumerism: Do social media boycotts and buycotts translate to real sales impact?" *Marketing Science* **42**,1(2023):11–25.

Luckstead, J., R.M. Nayga, and H. Snell. "US workers' willingness to accept meatpacking jobs amid the COVID-19 pandemic." *Journal of the Agricultural and Applied Economics Association* **1**,1(2022):47–60.

Maclnnis, D.J., and B.J. Jaworski. "Information processing from advertisements: Toward an integrative framework." *Journal of Marketing* **53**,4(1989):1–23.

Matzler, K., S. Grabner-Kräuter, and S. Bidmon. "Risk aversion and brand loyalty: The mediating role of brand trust and brand affect." *Journal of Product and Brand Management* **17**,3(2008):154–62.

McFadden, D. "Conditional Logit Analysis of Qualitative Choice Behavior". *Frontiers in Econometrics*. P. Zarembka, ed. New York: Academic Press (1973), pp. 105–42.

Miller, D., B. Merrilees, and R. Yakimova. "Corporate rebranding: An integrative review of major enablers and barriers to the rebranding process." *International Journal of Management Reviews* **16**,3(2014):265–89.

Muzellec, L., and M. Lambkin. "Corporate rebranding: Destroying, transferring or creating brand equity?" *European Journal of Marketing* **7**,8(2006):803–24.

Pouta, E., J. Heikkilä, S. Forsman-Hugg, M. Isoniemi, and J. Mäkelä. "Consumer choice of broiler meat: The effects of country of origin and production methods." *Food Quality and Preference* **21**,5(2010):539–46.

Train, K., and M. Weeks. "Discrete Choice Models in Preference Space and Willingness-to-Pay Space." *Applications of Simulation Methods in Environmental and Resource Economics: The Economics of Non-Market Goods and Resources*. vol. **6**. Dordrecht: Springer (2005).

Tsai, S.P. "Utility, cultural symbolism and emotion: A comprehensive model of brand purchase value." *International Journal of Research in Marketing* **22**,3(2005):277–91.

Van Loo, E.J., V. Caputo, and J.L. Lusk. "Consumer preferences for farm-raised meat, lab-grown meat, and plant-based meat alternatives: Does information or brand matter?" *Food Policy* **95**(2020):101931.

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