Selfishly Benevolent or Benevolently Selfish:

When Self-Interest Undermines Versus Promotes Prosocial Behavior

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Abstract

Existing research shows that appeals to self-interest sometimes increase and sometimes decrease prosocial behavior. We propose that this inconsistency is in part due to the framings of these appeals. Different framings generate different salient reference points, leading to different assessments of the appeal. Study 1 demonstrates that buying an item with the proceeds going to charity evokes a different set of alternative behaviors than donating and receiving an item in return. Studies 2 and 3a-g establish that people are more willing to act, and give more when they do, when reading the former framing than the latter. Study 4 establishes ecological validity by replicating the effect in a field experiment assessing participants' actual charitable contributions. Finally, Study 5 provides additional process evidence via moderation for the proposed mechanism. We discuss theoretical and practical implications of these findings and suggest avenues for future research.

Keywords: *altruism; charitable giving; framing; prosocial behavior; reference points; self-interest*

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Imagine you are sitting in your car, listening to your favorite program on National Public Radio (NPR), when the host announces that the station is in the middle of a pledge drive. She mentions that you have the opportunity to *donate* to the station and receive one of a wide variety of items. Now imagine, in an alternative universe, you are listening to that same program. Once again, the host announces a pledge drive, only in this instance, she explains that you have the opportunity to *buy* a wide variety of products with all of the proceeds going to help the station. In which universe would you be more likely to pick up the phone and call?

We face hybrid decisions like these – opportunities that result in tangible benefits for both the giver and the receiver – on a regular basis. Nearly every charitable organization uses some sort of incentive program to increase donations. The aforementioned NPR showcases a number of products that donors can choose to receive during its annual pledge drive. Fundraisers, such as car washes and bake sales, provide goods and services in order to raise money for programs like little league baseball teams or Girl Scout troops. Recently, e-commerce company Amazon established its Amazon Smile program, which gives a portion of each sale from its website to a charity of the consumer's choice. Given how commonly organizations use these types of incentives to encourage charitable giving, it would seem that the case for their effectiveness must be a strong one. However, the existing literature is far from clear on whether offering material incentives to promote prosocial behavior is effective.

On the one hand, considerable research has shown that self-interest facilitates prosocial behavior. Indeed, many psychologists and economists have argued that pure altruism[2] does not exist and that some degree of self-interest underlies every human action, including seemingly prosocial ones. By these accounts, self-interest motivation is not restricted to the pursuit of material gain but can take other forms including the pursuit of increased positive emotions, such as a "warm glow" (Andreoni, 1989, 1990), or of decreased negative emotions, such as self-concept distress (Batson, 1987, 2011; Cialdini, Brown, Lewis, Luce, & Neuberg, 1997). Even when self-interest is not motivating prosocial behavior, its presence may be necessary as there exists in Western cultures a norm of self-interest that suggests that people *should* and *do* act in accordance with their own interests (Miller, 1999). The existence of this norm means that people often prefer to hide their prosocial motivation behind a cloak of self-interest (Miller & Ratner, 1998; Miller, 1999) and often seek an excuse, or at least a rational (self-interested) account, for behaving prosocially (Holmes, Miller, & Lerner, 2002; Ratner & Miller, 2001). For all these reasons, one might reasonably conclude that offering material incentives for donations would be effective.

On the other hand, there is evidence that the presence of self-interest considerations can discredit or undermine prosocial actions (Chao, 2016; Lin-Healy & Small, 2012; Newman & Cain, 2014). Proponents of this view argue that people feel that self-interest taints what should otherwise be a purely altruistic act. A similar conclusion has been reached by scholars who believe that individuals categorize the social world into different spheres that are in turn associated with different norms and expectations (Durkheim, 1912; A. P. Fiske, 1992; Goffman,

[2] While "altruistic" and "prosocial" often are used interchangeably, here we use the term "altruistic" to refer to the motive and the term "prosocial" to refer to the outcome. Thus a prosocial behavior, such as giving to charity, may or may not spring from an altruistic motivation.

1959). According to this perspective, social and economic interactions are associated with different spheres and interactions that are appropriate in one of these spheres can be inappropriate or downright offensive in the other. The most glaring instances of this occur with taboo tradeoffs that involve the mixing of the sacred and the secular (A. P. Fiske & Tetlock, 1997) such as providing a monetary value for human organs (Tetlock, Kristel, Elson, Green, & Lerner, 2000), selling one's birthday present (McGraw, Tetlock, & Kristel, 2003), or accepting money for completing household chores (McGraw & Tetlock, 2005). Moreover, within the domain of prosocial behavior, a *tainted altruism* effect has been found, wherein people are found to be uncomfortable with prosocial actions that simultaneously benefit the actor (Newman & Cain, 2014). For example, people are uncomfortable paying a large amount to a for-profit organization for the purpose of raising funds for charity.

As the foregoing review shows, the empirical and theoretical literature is inconsistent with respect to whether introducing the prospect of material gain promotes or undermines prosocial action. The present paper proposes and tests a resolution to this seemingly inconsistent picture of the relationship between self-interest and prosocial motivation.

Differing Reference Points: Integrating Self-interested and Prosocial Motives

We contend that the impact the prospect of material gain has on people's willingness to give to charity depends on which of two categories the request evokes (Kahneman & Miller, 1986). The request to make a donation in return for a product evokes a different set of behaviors than the request to buy a product with the proceeds going to charity. Specifically, the category evoked in the first case will feature other instances of donations, or prosocial behavior, and the category evoked in the second case will feature other instances of product purchases, or economic behavior.

These categories, in turn, provide different reference points against which to compare the current request (Kahneman & Tversky, 1982). When the focal situation evokes instances of other more "normal" donations, it seems tainted by comparison. This is because the category evoked here involves donations unaccompanied by material gain. However, when the focal situation evokes other instances of more "normal" economic transactions, it seems righteous by comparison. This is because the category evoked here involves economic transactions unaccompanied by charitable behavior. In short, the reference point made salient by the donate frame leads the current charitable opportunity to seem like a bad version of an altruistic act whereas the reference point made salient by the buy frame leads it to seem like a good version of an economic transaction.

As another example of the process we describe, consider the old joke in which a religious authority reacts negatively to a neophyte's query about the acceptability of his smoking while praying but positively to the acceptability of his praying while smoking. That the two requests evoke different reference points is what makes the joke work. The prospect of smoking while praying evokes other instances of praying to which the smoking version compares negatively. In contrast, the prospect of praying while smoking evokes other instances of smoking to which the praying version compares positively.

The claim that people evaluate economic exchanges that yield prosocial benefits more positively than prosocial exchanges that yield economic benefits is supported by a closer examination of the relevant literature. Consider Holmes *et al*.'s (2002) finding that people give more to charity when offered an item in exchange for their donation than when no *quid pro quo* is involved. Although consistent with the claim that the prospect of material gain increases prosocial behavior, note that the charitable request in this study highlighted the *selling* of the

item as well as the *profit* that would be going to the charity, a clear instance of an economic situation with added prosociality. The framing of the situation is very different in Newman and Cain's (2014) demonstration of tainted altruism. In this case, the individual engaging in the hybrid behavior was described as *donating* money to charity and receiving a personal benefit from that donation, making this an example of an altruistic situation with added self-interest (see Table 1 for a side-by-side comparison of sample stimuli used in these studies). In conclusion, what looks like contradictory findings may actually represent consistent responses to different framings of charity appeals.

Overview of Current Research

This paper reports the results of eleven studies. Study 1 demonstrates that people spontaneously think of different possible alternative actions when presented with a charitable interaction framed as an economic transaction that also benefits the charity compared to one framed as an altruistic act that also benefits the giver. Study 2 provides initial evidence that people prefer to engage in the former compared to the latter framing. Studies 3a-g consist of a meta-analysis of seven studies that all use the same paradigm. Together, they demonstrate that the framing effect is robust across a wide variety of items offered and amounts requested. Study 4 utilizes an experimental field design to show that the effect replicates in a real-world charitable giving setting. Finally, Study 5 further examines the proposed mechanism – that these different framings generate different reference points – by demonstrating that making either an economic or an altruistic reference point explicit moderates the effect of framing on prosocial behavior.

Study 1

Study 1 provided an initial test of whether different framings of the same charitable opportunity would elicit different reference points. Specifically, we gave participants the

opportunity to directly describe the category that was salient to them in their decision-making process. We predicted that participants who experienced the different framings should spontaneously think of different alternative ways that they could use their money. Specifically, economic opportunities (i.e., purchasing items) should be more salient for people who read about buying an item with the money going to charity (i.e., the *Buy Frame*), whereas altruistic opportunities (i.e., giving to charity) should be more salient for people who read about donating and receiving an item in return (i.e., the *Donate Frame*).

Method

Three hundred and one participants were recruited from an online subject pool (213 females, M_{age} = 29.76 years old). We excluded fourteen participants because they failed the attention check, leaving two hundred and eighty-seven participants in the analyses. Participants were randomly assigned to see the *Buy Frame* ("You can pay $15 for a tin of mixed nuts and all of the money will go to the United Way") or the *Donate Frame* ("You can donate $15 and in return you will receive a free tin of mixed nuts"). Participants were then asked to write what other opportunity they would consider using their money for instead of the one that they had just read about.

In line with the usage of previous thought listing measures (Johnson, Häubl, & Keinan, 2007), participants were then asked to code their previous response as being more closely related to purchasing something, being charitable, or neither. Responses were also coded by two independent coders who were blind to condition and hypotheses. Because many participants wrote that they were thinking about saving the money (which is its own category that is distinct from purchasing something or being charitable), we included this as a new category for the

independent coders. Cohen's Kappa between the two independent coders was 0.86. Discrepancies were resolved by a third coder also blind to condition.[3]

Results

Self-coding. A binomial logistic regression using participants' self-coded responses revealed that participants in the *Buy Frame* indicated that they had written about an alternative situation that involved purchasing something (51.0%) significantly more often than did participants in the *Donate Frame* (38.2%; $z = 2.16$, $p = 0.03$). Although a numerically greater proportion of participants in the *Donate Frame* (26.5%) indicated that they had written about an alternative situation that involved being charitable than in the *Buy Frame* (21.5%), this difference was not significant ($z = 0.27$, $p = 0.32$). A binomial logistic regression subsetting only on participants who indicated they either wrote about purchasing something or being charitable (i.e., those who did not indicate they wrote about neither) was not significant ($z = 1.65$, $p = 0.10$).

Independent coders. A binomial logistic regression using the independent coders responses also revealed that the proportion of participants in the *Buy Frame* who wrote about purchasing something (45.8%) was significantly greater than the proportion of participants doing so in the *Donate Frame* (31.1%; $z = 2.57$, $p = 0.01$). A marginally greater proportion of participants wrote about being charitable in the *Donate Frame* (20.5%) than in the *Buy Frame* (12.5%; $z = 1.80$, $p = 0.07$). A binomial logistic regression subsetting only on participants who either wrote about purchasing something or being charitable (i.e., those who were not coded as writing about saving the money or "none of the above") indicated a significant difference between participants' mention of these categories across conditions ($z = 2.43$, $p = 0.02$) in the

[3] Eight participants wrote about multiple other opportunities that fell into more than one coding category (e.g., "donating to another charity or buying something else for 15 dollars"). As these responses could not be placed into any single category, they were removed from analyses.

direction predicted. The proportion of participants who wrote about saving the money did not differ by condition (*Buy Frame*: 31.9%; *Donate Frame*: 37.1%; z = 0.90, p = 0.37).

Discussion

Thought-listing provides a powerful method for assessing psychological processes (Cacioppo, Hippel, & Ernst, 1997). We used a variation of this technique to evaluate what categories of behavior were made salient to participants by the different framings of the opportunity. Consistent with our predictions, the *Buy Frame* was more likely to evoke for participants other instances of purchasing something than the *Donate Frame*, while the *Donate Frame* was more likely to evoke for participants other instances of behaving charitably than the *Buy Frame*. This pattern was more pronounced when the responses were assessed by two independent coders than when they were self-coded. We believe that the independent coding represents a more accurate assessment of the responses than the self-coding for two reasons: (1) reliability was much higher when comparing the two independent coders (kappa = .86) than when comparing either coder and the self-codings (kappas = .62 and .59)[4] and (2) examining the self-codings revealed a large number of codings that lacked face validity (e.g., "buying a new record for my record collection" being coded as "neither" and "complacency" being coded as "being charitable").

Overall, this study provides initial evidence that the different framings make salient different categories of behaviors and hence different referent points against which people compare the focal opportunity. Next, we wanted to establish that these different framings would lead to differential engagement in the charitable opportunity.

[4] Another way of comparing the independent coders to the self-coders is the raw percentage of ratings that "matched" (i.e., were placed in the same category). Using this method, the independent coders' ratings matched 91.3% of the time, whereas each individual independent coder matched only 75.5% and 73.6% of the time with the self-coders.

Study 2

Study 2 tested whether different framings of the same charitable opportunity would affect people's willingness to engage in the opportunity. We predicted that people would be more willing to participate in a charitable interaction when it was framed as buying an item with the money going to charity (i.e., the *Buy Frame*) than when it was framed as donating and receiving an item in return (i.e., the *Donate Frame*). Furthermore, we predicted that the value people derived from the fact that they were giving to charity would be greater in the *Buy Frame* condition than the *Donate Frame* condition but that the value people derived from receiving an item would not differ across the two conditions.

Method

Three hundred and one participants were recruited from an online subject pool (107 females, M_{age} = 30 years old). We excluded fourteen participants for incorrectly answering the attention check[5], leaving two hundred and eighty-seven participants included in the analyses.

Participants imagined that they had been asked to participate in an opportunity that would be described below. In the *Buy Frame* the opportunity was described as: "You can pay $15 for a tin of mixed nuts and all of the money will go to the United Way." In the *Donate Frame* the opportunity was described as: "You can donate $15 to the United Way and in return you will receive a free tin of mixed nuts." Participants in both conditions saw the same image of mixed nuts and the same United Way logo.

Decision to participate. Participants answered two questions designed to assess their interest in the offer described to them. The primary dependent measure asked "Would you participate in the opportunity above?" with participants given the option of selecting yes or no.

[5] Participants were asked at the end of the study to write down the value of the item that they had seen earlier in the study. All subsequent studies (except Study 3) used the same attention check.

Additionally, on the following page, participants indicated how likely they would be to participate in the opportunity on a scale from *1* (not at all likely) to *10* (extremely likely).

Importance of giving money and receiving item. Participants responded to two questions designed to assess the degree to which they perceived their contribution to depend on the fact that (1) their money was going to charity and (2) they were receiving an item. The first question asked participants, "In your decision on the previous page, how important to you was receiving the tin of mixed nuts?" The second question asked participants, "In your decision on the previous page, how important to you was giving money to charity?"

Results

Decision to participate. Table 2 presents the count data for each condition. A binomial logistic regression indicated that, consistent with predictions, participants who read the *Buy Frame* were significantly more likely to participate than participants who read the *Donate Frame* ($z = 2.60$, $p = 0.009$)[6]. Forty-five percent of participants who read the *Buy Frame* indicated that they would participate in the opportunity, whereas only 30% of participants who read the *Donate Frame* indicated that they would participate in the opportunity.

The results for the continuous measure were consistent with those for the dichotomous decision summarized above. Participants who read the *Buy Frame* indicated a significantly higher likelihood of participation in the charitable opportunity than participants who read the *Donate Frame* ($t(285) = 2.96$, $p = 0.003$, $d = 0.35$).

Importance of giving money and receiving item. As predicted, participants who read the *Buy Frame* indicated that they placed more importance on the money going to charity than

[6] All results reported in this paper hold when the analysis included the responses of participants who failed the attention check. However, because we decided *a priori* to exclude these participants' responses, the reported results keep this exclusion in place.

participants who read the *Donate Frame* ($t(285) = 2.78$, $p = 0.006$, $d = 0.33$). Interestingly, and contrary to predictions, participants who read the *Buy Frame* also indicated that they placed more importance on receiving the item than did participants who read the *Donate Frame* ($t(285) = 4.04$, $p < 0.001$, $d = 0.48$).

Mediation by importance of giving money. To assess whether the importance to people of their money going to charity played a role in their decision to participate in the opportunity, we performed a test of mediation with importance of money going to charity as the mediator. To test whether the indirect effect of condition (*Buy Frame* vs. *Donate Frame*) on decision to participate through importance of giving money was significantly different from zero, we used the bootstrapping technique (Preacher & Hayes, 2008) with 5000 iterations. The 95% confidence interval [-0.929, -0.146] did not include zero, indicating a significant indirect effect where the importance people placed on the fact that their money was going to charity mediated the effect of the framing manipulation on the willingness to give.

Discussion

Study 2 offers initial support for the hypothesis that people both see a charitable request framed as buying an item with the proceeds going to charity as more appealing and are more likely accede to it than a request framed as donating and receiving an item in return. Additionally, people valued their contribution to charity more in the *Buy Frame* than in the *Donate Frame*. At first glance, it might seem like it should have been the request to donate and receive an item in return that most focused people on the donation aspect of the interaction. However, looking at this request through the lens of the tainted altruism account leads to a different prediction. If the *Donate Frame* seems like a worse version of an altruistic act, then people should rightfully be less likely to place importance on the altruistic aspect of the

transaction. On the other hand, if the *Buy Frame* makes people think of a normal economic transaction, then this should highlight the fact that the money is going to charity, making this aspect of the interaction more important. The finding that people in the *Buy Frame* also placed greater importance on receiving the item was not predicted *a priori*. This finding diverges from the results in the next set of studies; and we discuss the discrepancy further in a subsequent section.

Studies 3a-g address two limitations of Study 2. First, participants in Study 2 were told neither the value nor the quality of the item. Thus, a potential alternative explanation of the results is that people were more willing to participate in the *Buy Frame* than in the *Donate Frame* because they inferred a higher value for the item in the former condition. Indeed, this may explain the unpredicted difference in the higher importance placed on the item in the *Buy Frame*. To address this possibility, Studies 3a-g all include a retail value for the item that was held constant across conditions. Second, Study 2 assessed how willing people were to participate in a charitable opportunity but not how much they were prepared to donate. It is conceivable that those who read the *Buy Frame*, while more likely to participate, would have given a smaller amount than those who read the *Donate Frame*. If this were the case, then using a *Buy Frame* could result in fewer dollars raised, even if more people contributed. To explore this possibility, Studies 3a-g use a willingness-to-pay measure that allowed participants to choose how much they wanted to contribute.

Studies 3a-g

Studies 3a-g all employ nearly identical methods, with each making a slight modification to the stimuli presented to determine whether the results are robust across item types and values (See Tables 3-4 for more details about each individual study). Our analytic approach followed

recent suggestions about the appropriate analysis of multiple studies. One of these suggestions is to analyze and report all of the studies conducted within a stream of research (Murayama, Pekrun, & Fiedler, 2014; Simmons, Nelson, & Simonsohn, 2011). This includes those that find null results as these can occur even when a true effect is present (Schimmack, 2012; Stanley & Spence, 2014; see also Tversky & Kahneman, 1971). In addition to including all the studies conducted using this paradigm, the results reported here represent meta-analyses of all measures that were common across at least six of the seven studies[7] following the recommendations of many researchers (Braver, Thoemmes, & Rosenthal, 2014; Cumming, 2013; Giner-Sorolla, 2012). For detailed information about each individual study, refer to the Supplementary Material.

Method

One thousand three hundred and sixty-four people participated in the seven studies (573 females[8], M_{age} = 31.54 years old). We excluded one hundred participants for incorrectly answering the attention check, leaving one thousand two hundred and sixty-four participants included in the analyses. Studies a, d, e, f, and g were run online using Mechanical Turk. Studies b and c were run in a lab at a West Coast university with a participant pool consisting primarily of undergraduate and graduate students.

Participants in all seven studies read about a United Way charity drive that asked them to either buy an item with the money going to charity or donate to charity and receive an item in return. The materials in each study explicitly told participants either the retail value or the suggested price/donation amount. Table 3 outlines the modifications made within each study. The measures discussed below were employed in at least six of the seven studies.

[7] All of the measures reported here were included in all seven studies except for the item asking about impressions of the specific drive, which was not included in Study 2b.
[8] Two additional individuals indicated a gender other than male or female.

Amount given. After reading the scenario, participants were asked how much money they would give if they actually encountered this opportunity. The question was framed differently depending on the condition. Participants in the *Buy Frame* were asked how much they would buy the item for if the proceeds were going to the United Way, while participants in the *Donate Frame* were asked how much they would donate to the United Way if they received the item in return. Participants were able to enter any amount they wanted.

Importance of giving money and receiving item. Participants responded to the same two questions used in Study 1 about the degree to which their contribution depended on the fact that (1) they were giving money to charity and (2) they were receiving an item.

Impressions of this specific charity drive. In order to get a more direct measure of how the different frames affected perceptions of the charitable opportunity, participants next responded to the question, "How positive or negative is your impression of the specific charity drive you read about at the beginning of the study?"

Impressions of the charity as a whole. Finally, to see if any different impressions of the charitable opportunity carried over to impressions of the organization as a whole, participants were asked, "How positive or negative is your impression of United Way as a whole?"

Results

The results of the willingness-to-pay measure were right-skewed so, in line with previous research (e.g., Kogut & Ritov, 2005), the dependent variable was log transformed.[9] We then calculated the means and standard deviations for the *Buy Frame* and *Donate Frame* conditions in each of the seven studies. Finally, using the *meta* package for R (Schwarzer, 2015), we meta-analytically combined the results to obtain an overall estimation of the effect.

[9] We performed this same log transformation on all subsequent willingness-to-pay measures reported.

Amount given. As predicted, participants in the *Buy Frame* condition gave more to charity overall than participants in the *Donate Frame* condition (fixed effects model: $z = 4.29$, $p < 0.001$, $d = 0.24$; random effects model: $z = 2.86$, $p < 0.01$, $d = 0.23$). Table 4 and Figure 1 present descriptive statistics and individual results from each study.

Importance of giving money and receiving item. As predicted, participants in the *Buy Frame* condition indicated that giving money to charity was more important in their decision than did participants in the *Donate Frame* condition (fixed effects model: $z = 4.37$, $p < 0.001$, $d = 0.25$; random effects model: $z = 2.90$, $p < 0.01$, $d = 0.26$). In addition, as predicted, there was no difference between conditions in how important receiving the item was (fixed and random effects models: $z = 0.46$, $p = 0.65$, $d = 0.03$). These results suggest that people in the *Buy Frame* condition felt more strongly about the fact that their money was going to charity than people in the *Donate Frame* condition but equally strongly about the fact that they would be receiving an item as part of the interaction.[10]

Mediation by importance of giving money. To assess whether the importance of money going to charity played a role in the amount people gave, we conducted a mediation analysis examining if the importance people placed on their money going to charity mediated the effect of framing on amount given. Specifically, we employed a multiple-regression procedure (Baron & Kenny, 1986) to calculate both the indirect effect of framing on amount given through importance of giving money (i.e., the effect of X on Y due to M; Kenny & Judd, 2014) and the standard error of the indirect effect for all seven studies. We then meta-analyzed these indirect effects to assess whether the indirect effect was significant across the seven studies. Consistent

[10] Additionally, the difference between the importance participants placed on giving money to charity compared to receiving the item was significantly stronger for the Buy Frame than for the Donate Frame ($p < 0.01$).

with Study 1, the results indicated that there was a significant indirect effect of framing on amount given through charity drive impressions (fixed effects model: $z = 3.71$, $p < 0.001$; random effects model: $z = 2.71$, $p < 0.01$).

Impressions of specific drive and the United Way. Participants in the *Buy Frame* condition saw the charity drive significantly more positively than did participants in the *Donate Frame* condition (fixed and random effects models: $z = 3.68$, $p < 0.001$, $d = 0.22$). Participants in the *Buy Frame* condition also saw the United Way as a whole significantly more positively than did participants in the *Donate Frame* condition (fixed effects model: $z = 4.37$, $p < 0.001$, $d = 0.25$, random effects model: $z = 3.12$, $p = 0.001$, $d = 0.25$).[11]

Discussion

Studies 3a-g provide strong evidence that people prefer to buy an item with the proceeds going to charity than to donate to charity and receive an item in return. Not only did people give more in the *Buy Frame* than in the *Donate Frame*, they also liked both the specific drive and the charity as a whole more. That the framing of the appeal influenced feelings about the charitable organization is surprising given that the charity used– United Way – is a widely known organization about which many people would presumably already have an opinion.

Similar to Study 2, the results of these studies suggest that, compared to people who read the *Donate Frame*, people who read the *Buy Frame* placed greater importance on the fact that their money was going to charity. However, unlike Study 2, people did not differ across conditions in the importance they placed on receiving the item (this was true for each individual study and for their meta-analysis). As this set of studies, unlike Study 2, included a retail value

[11] An additional meta-analytic test of mediation indicated that there was a significant indirect effect of condition on amount given through charity drive impressions (fixed effects model: $z = 2.72$, $p < 0.01$; random effects model: $z = 2.60$, $p < 0.01$).

for the item we can rule out the possibility that the framing effect was due to participants inferring that the item was of higher quality in the *Buy Frame* than in the *Donate Frame*. The framing of the opportunity alone did not appear to affect the importance people placed on the item it offered. In contrast, the framing manipulation did affect the importance people accorded the role that helping others played in their decision to give. This suggests that people who read the *Buy Frame* valued their good deed more strongly than people who read the *Donate Frame*. It seems likely given these results that, while both framings allowed people to enjoy receiving the item, the *Buy Frame* gave people the additional benefit of allowing them to receive a warm glow for helping the charity. The *Donate Frame*, on the other hand, prevented this from happening because the receipt of the item tainted any potential warm glow that the individual may have otherwise received from their behavior.

One shortcoming of all of the studies so far is that they each involved a hypothetical situation where no real money was at stake. It is conceivable that people might behave differently when faced with a real charitable opportunity. To address this concern, Study 4 requested actual money from people and offered them an actual item.

Study 4

Study 4 was a field experiment that included a behavioral measure of charitable giving. Specifically, we gave people the opportunity to give money to a charitable organization after exposure to one of the two framings used in the previous studies.

Method

One hundred and thirty-nine[12] people were approached in a mall in a large city on the west coast of the United States. In exchange for $5, they were asked to look over marketing materials for a local charity and answer some questions about them. If they agreed to participate, individuals were first paid the $5 (in one-dollar bills), then asked to read a pamphlet about the charity, and finally given the survey.

The initial page of the survey first presented a brief description of the charity and then presented an opportunity to give money to that charity before beginning the survey (the dependent measure of interest). The materials framed the opportunity as either paying any amount for a bag of chocolates with all of the proceeds going to the charity, or donating any amount to the charity and receiving a free bag of chocolates. The questions following the framing asked people both whether they would like to participate and, if they did, how much they would like to give. The next two pages of the survey asked a number of questions about the charity and the participants' demographic characteristics. Participants completed these items and then brought the survey to the experimenter, who took the money that participants had indicated they wished to go to charity and gave them a bag of chocolate (this last step did not occur if the participant opted out of giving money to the charity).

Results

A binomial logistic regression revealed that participants in the *Buy Frame* condition were marginally more likely than participants in the *Donate Frame* condition to accept the charitable opportunity ($z = 1.95$, $p = 0.051$, see Table 5), which is consistent with the results from Study 2. Additionally, participants in the *Buy Frame* condition ($M = \$2.47$; $M_{logged} = 1.71$, $SD = 3.01$)

[12] Even though efforts were made to only recruit participants 18 years of age and over, nine participants under the age of 18 completed the survey for a total of 148 participants. Per IRB requirements, these 9 surveys were not included in the analyses.

gave significantly more money to charity than participants in the *Donate Frame* condition (M = \$1.46; M_{logged} = 0.63, SD = 2.85; t(137) = 2.17, p = 0.03, d = 0.37, see Figure 2)[13], which is consistent with the results from Studies 3a-g. On average, participants gave 69% more when presented with the *Buy Frame* than when presented with the *Donate Frame*. Participants' answers to the questions in the rest of the survey did not differ by condition (all p-values > 0.14).

Discussion

This study provides further evidence that people give more when the charitable interaction is framed as buying an item with the proceeds going to charity than when it is framed as donating to charity and receiving an item in return. Additionally, it found that people were more likely to participate in the charitable opportunity in the first place when presented with the *Buy Frame* than with the *Donate Frame*.

To this point, we have provided consistent evidence across a number of studies of the existence of the hypothesized framing effect. However, only Study 1 so far has provided evidence for the mechanism that we propose accounts for this effect. Specifically, we hypothesized that participants in the *Buy Frame* compare the opportunity to other instances in which they would simply be buying an item with no money going to charity, while participants in the *Donate Frame* compare the opportunity to other instances in which they would simply be donating to charity without receiving an item in return. In Study 5, we test the proposal that the *Buy Frame* evokes a better version of an economic transaction while the *Donate Frame* evokes a worse version of an altruistic act by explicitly instantiating these different reference points for participants.

[13] Consistent with the practice in other studies, Figure 2 and the test statistic reported here are based on the log-transformation of amount given. However, because this study involved real money, we present the untransformed raw means as well in order to give a clearer depiction of how much people actually gave in each condition.

Study 5

As discussed earlier, we propose that the reason the different framings of self-interested and prosocial motives produce contrasting reactions to the charitable opportunity is that they evoke different categories that bring to mind different reference points (Kahneman & Miller, 1986). These different categories presumably take the following forms. In the *Buy Frame* condition, where people have the chance to purchase a product with the proceeds going to charity, the evoked category features instances of product purchases that do not yield a prosocial benefit. In the *Donate Frame* condition, where people have the chance to donate to charity and receive a product in return, the evoked category features instances of acts of donation that do not yield a material benefit to the self. The fact that the former reference point yields a more positive evaluation than the latter one presumably is why the former frame elicits a more favorable reaction.

Study 5 seeks to substantiate the proposed account of the framing effects found in Studies 2-4. Given the difficulty of explicitly measuring people's reference points (Kahneman & Miller, 1986), we sought to establish the causal role played by the evocation of particular categories by manipulating their salience. Our rationale was that if we directed participants towards similar reference points in the "buy" and "donate" conditions, the difference between the two conditions should diminish, as their comparative judgments would become more similar. In other words, if people respond differently to the two framings of the opportunity because these framings evoke different categories, then explicitly cuing an instance of one of these categories to people *before* showing them the charitable opportunity should supersede the cuing effect of the particular framing.

To test our reasoning, we first presented participants with either a pure economic opportunity or a pure prosocial opportunity. We predicted that making a pure economic opportunity salient to participants before they encountered a *Donate Frame* would direct their thoughts away from other donation situations and toward other purchase situations, which should *increase* the attractiveness of the presented opportunity. On the other hand, we predicted that making salient to participants a pure economic situation before they encountered a *Buy Frame* would have much less influence on the reference point as they presumably were already generating thoughts of other (less prosocial) purchases. We anticipated that parallel effects would result from making a pure prosocial opportunity salient to participants before they encountered the two frames. We predicted that in the *Buy Frame* this manipulation would direct their thoughts away from other purchase situations and toward other donation situations, which should *decrease* the attractiveness of the presented opportunity. We also predicted this manipulation would have less of an effect on those in the *Donate Frame* condition as they were presumably already generating thoughts of other (more prosocial) donations.

To test this hypothesis, we employed a 3 (Economic vs. Altruistic vs. No salient reference point) x 2 (Buy vs. Donate framing) factorial design. Participants were told that they would be asked to evaluate a series of hypothetical charitable requests. First, participants read about an opportunity to buy an item with no mention made of money going to charity, to donate to charity with no mention made of receiving anything in return, or were asked to simply click to the next page without seeing any opportunity (i.e., the control). Participants then saw one of the two framings used in the previous studies (i.e., either buying an item with the proceeds going to charity or donating to charity and receiving an item in return). The primary dependent measure was how much they gave in this second opportunity.

Method

Six hundred and eight participants were recruited from an online subject pool (213 females, M_{age} = 29.76 years old). We excluded thirty-two participants because they failed the attention check, leaving five hundred and seventy-six participants in the analyses. Participants were randomly assigned to one of six conditions. In the *Econ Reference Point/Buy Frame* and the *Econ Reference Point/Donate Frame* conditions, participants saw an opportunity to buy a tin of mixed nuts first ("You can pay any amount for a tin of mixed nuts"), followed by one of the two framings previously described (Buy Frame: "You can pay any amount for a tin of mixed nuts and 100% of the proceeds will go to the United Way"; Donate Frame: "For any amount you donate to the United Way, you will receive a free tin of mixed nuts"). In the *Altruism Reference Point/Donate Frame* and *Altruism Reference Point/Buy Frame* conditions, participants saw an opportunity to donate to the United Way ("You can donate any amount to the United Way"), followed by one of the two framings. The *No Reference Point/Buy Frame* and the *No Reference Point/Donate Frame* conditions were identical to previous studies (i.e., participants only saw either the Buy Frame or the Donate Frame) and were included as controls, for a total of six conditions.

Results

Framing effect with no explicit reference point. When no reference point was made explicit to participants, their responses replicated the results found in Studies 2-4. That is, participants in the *No Reference Point/Buy Frame* condition (M_{logged} = 2.23) gave significantly more than participants in the *No Reference Point/Donate Frame* condition (M_{logged} = 1.82; $t(195) = 2.26$, $p = 0.02$).

Framing effect with economic reference point. When participants saw the opportunity to buy an item with no mention of the proceeds going to charity before they read about the framed charitable opportunity (i.e., people in the *Econ Reference Point/Buy Frame* and the *Econ Reference Point/Donate Frame* conditions), the effect of framing on the amount they gave disappeared. That is, the amount of money participants gave when they were explicitly made to think about an economic reference point did not significantly differ whether they read the Buy Frame ($M_{logged} = 2.07$) or the Donate Frame ($M_{logged} = 2.03$; $t(197) = 0.28$, $p = 0.78$).

Framing effect with altruistic reference point. When participants first saw the donation opportunity with no mention of also receiving an item (i.e., those in the *Altruism Reference Point/Donate Frame* and *Altruism Reference Point/Buy Frame* conditions), we observed the same pattern of moderation as occurred with the economic reference point. Specifically, participants who were explicitly made to think about an altruistic reference point did not give significantly different amounts in the Buy Frame ($M_{logged} = 1.80$) than in the Donate Frame ($M_{logged} = 1.70$; $t(178) = 0.37$, $p = 0.71$).

Economic reference point vs. altruistic reference point. Planned orthogonal contrasts compared the three conditions that either implicitly or explicitly evoked an economic reference point (i.e., the *No Reference Point/Buy Frame*, *Econ Reference Point/Buy Frame*, and *Econ Reference Point/Donate Frame* conditions) to the three conditions that, implicitly or explicitly, evoked an altruistic reference point (i.e., the *No Reference Point/Donate Frame*, *Altruism Reference Point/Buy Frame*, and *Altruism Reference Point/Donate Frame* conditions). The results were consistent with our hypotheses. The conditions that evoked an economic reference point resulted in a significantly higher mean amount given to charity than the conditions that evoked an altruistic reference point ($t(570) = 3.04$, $p = 0.002$). The three conditions that evoked

an economic reference point did not significantly differ from one another ($t(570) = 1.10$, $p = 0.27$), nor did the three conditions that evoked an altruistic reference point ($t(570) = 0.41$, $p = 0.68$, see Table 6).

Mismatched reference points vs. controls. The final test of our predictions examined how making the "wrong" or mismatched reference point explicit affects responses to the framed opportunity. To do this we analyzed the following four conditions: *No Reference Point/Buy Frame, No Reference Point Donate Frame, Altruism Reference Point/Buy Frame, and Economic Reference Point/Donate Frame* conditions as a simplified 2 (Yes vs. No mismatched reference point) x 2 (Buy vs. Donate framing) factorial design. As predicted, there was no significant main effect for either the existence of a mismatched reference point ($t(391) = 0.84$, $p = 0.40$) or frame type ($t(391) = 0.70$, $p = 0.49$). There was, however, a significant interaction ($t(391) = 2.45$, $p = 0.01$. When breaking down the simple effects, participants in the *No Reference Point/Buy Frame* ($M_{logged} = 2.23$), as predicted, gave significantly more than participants in the *Altruism Reference Point/Buy Frame* ($M_{logged} = 1.80$; $t(194) = 2.32$, $p = 0.02$). Participants in the *No Reference Point/Donate Frame* ($M_{logged} = 1.82$) gave directionally less than participants in the *Economic Reference Point/Donate Frame* ($M_{logged} = 2.03$), but this difference was not significant $t(195) = 1.15$, $p = 0.25$).

Discussion

The present study sought evidence of the mechanism that we proposed produced the framing effect found in Studies 2-4. Specifically, this study sought to show that making salient a common category (pure item purchases or pure prosocial actions) to participants before they encountered the Buy or Donate Frame would reduce the impact of the frame. We predicted that having participants, before they saw the framed hybrid opportunity, read about either an

opportunity to buy an item with none of the proceeds going to charity or an opportunity to donate to charity without receiving an item would draw their attention to the possibility of doing one of those two actions instead. In other words, we sought to show that explicitly making salient one of the two reference points would diminish the power of the hybrid framing to implicitly do the same.

The results supported the hypotheses. The effects of framing were eliminated when participants were exposed to a common category (whether economic purchases or altruistic acts) before they encountered the particular framing in their condition. Moreover, the form that this convergence took was consistent with our reasoning. Specifically, those in the *Donate Frame* gave more in the economic reference point condition than they did in the control condition, presumably because the instantiation of an economic situation made their focal opportunity look more attractive than it had when they were comparing it to a more prosocial situation (2.03 vs. 1.82). Similarly, those in the *Buy Frame* gave more in the altruistic reference point condition than they did in the control condition, presumably because the instantiation of an altruistic category made their focal opportunity look less attractive than when they were comparing it to a more economic situation (1.80 vs. 2.23).

General Discussion

Eleven studies provide consistent evidence that people respond more positively to the opportunity to buy a product with the money going to charity than to make a donation and receive a product in return. We argue that people's responses to what is essentially the same charitable opportunity differ because the different framings evoke different categories, which act as different reference points against which to compare the opportunity. Specifically, highlighting the prosocial aspect of the charitable request (the *Donate Frame*) makes salient an alternative

situation that involves behaving in a purely altruistic manner, while highlighting the self-interested aspect of the charitable request (the *Buy Frame*) makes salient an alternative situation that involves behaving in a purely self-interested manner. Thus, a charitable opportunity that appeals to both prosocial and self-interested motives will appear as a worse version of an altruistic act when the prosocial component is highlighted and a better version of an economic transaction when the self-interested component is highlighted. Whereas introducing a material self-interest component into what "might have been" a purely prosocial act appears to taint it, introducing a prosocial component into what "might have been" a purely economic act elevates it.

The differential importance people placed on the fact that their money was going to charity mirrored the difference they showed in their willingness to give. In general, people who read the *Buy Frame* felt that it was more important that they were behaving prosocially than people who read the *Donate Frame*. Critically, this occurred whether people in the *Buy Frame* also felt that it was more important that they were receiving an item than people in the *Donate Frame* (Study 2) or whether there was no difference on this measure (Studies 3a-g). This indicates that the frame change is primarily affecting the prosocial aspect of the hybrid situation as opposed to the self-interested aspect.

A Norm Theory Perspective

Norm theory posits that people evaluate activities in comparison to the norms that they evoke (Kahneman & Miller, 1986). It posits further that objectively similar situations can evoke different category norms that in turn elicit different reactions. An important feature of norm activation is that the norm a situation evokes will share some attributes with the situation (immutable attributes) but not others (mutable factors). For instance, early stimuli in a series tend

to be focal and hence less mutable in imagination than later stimuli. This means that alternatives to inconsistent sequences will evoke not just more consistent alternatives but ones that treat early stimuli as immutable and later stimuli as mutable. For example, an observed grade inconsistency (A, C or C, A) is likely to evoke not only a more consistent sequence but one that specifically holds the first grade constant (A, A and C, C, respectively; Miller & Gunasegaram, 1990). In the case of the present studies, the focal dimension was the primary activity featured in the offer (donation vs. purchasing) and hence the norm generated held that activity constant but varied the non-focal secondary activity (receiving the item in return vs. the proceeds going to charity).

The fact that people compare the situation facing them to the "ideal" or pure version of the situation can lead them to behave in surprising ways. For example, at face value it would seem as if evoking an economic norm should lead to less prosocial behavior than evoking an altruistic norm. However, when the situation that is evoking the economic norm also includes a prosocial component, evoking this norm will actually increase prosocial behavior compared to evoking an altruistic norm. This is because the different norms do not just illuminate the appropriate behavior; they also make salient different comparison points that can affect people's judgment of the qualities of the specific situation. Our analysis shares important similarities with the familiar figure-ground effect in perception, in that the primary norm is treated as the "ground" in the situation and the secondary norm as the "figure" that is imposed on top of it. Viewed in this way, the model of conflicting norms discussed here should apply to any situation in which the different dimensions of a social stimulus evoke norms that conflict with one another.

A case in point is the domain of impression formation where people are often asked to make judgments about an unknown individual based on limited information (Asch & Zukier,

1984; S. T. Fiske, 1980). When person information evokes multiple conflicting norms, we predict that the norm that dominates will serve as the comparison point in accordance with the figure-ground model. For example, the student who, the night before a big exam, is described as studying while watching television might be seen as a diligent and conscientious individual who is making time to study even during her leisure time. However, the student who is described as watching television while studying might be seen as lazy, unproductive, and sure to fail the exam.

Limitations and Future Directions

One potential concern with the present research is the small effect size observed across the studies. One might legitimately question whether an effect size of $d = 0.24$ is meaningful when it comes to actual charitable giving. To this charge, we have two responses. First, the procedural difference between conditions in these studies amounts to little more than changes to a few words in the charitable appeal. As a virtually costless modification, this means that any change in giving would be appreciable. Relatedly, we regard the present studies as relatively conservative tests of our hypotheses, and therefore suggest that more heavy-handed changes would result in stronger effects (Prentice & Miller, 1992). For example, a major campaign like the NPR fundraising drive described in the opening paragraph should be able to implement much more powerful framings than we used.

One aspect of the work presented here that remains unexplored is the potential backlash that might befall a charity perceived to be a purveyor of commercial goods. More specifically, participants in the studies presented here were not directly interacting with the charity, but rather given the chance to buy a product on behalf of the charity. For example, in the field study experimenters identified themselves as research assistants who were helping the charity with

marketing materials. It is not clear whether these effects would hold if the charity itself was thought to be putting too much effort into selling products. This may represent an important boundary condition that bears exploration before the results reported here are assumed to generalize to other situations.

Future research should also examine how these different framings affect people's perceptions of themselves. Specifically, research has found that describing a behavior as part of one's identity (e.g., "I am a helper") increases engagement in that behavior compared to simply describing the action itself (e.g., "I will help"; Bryan, Master, & Walton, 2014). It may be that while framing a charitable opportunity as an economic transaction increases people's willingness to give in that particular situation, it could diminish their inclination to identify as a "charitable giver" and thus might actually reduce charitable giving in the long run. Research looking at how these different framings affect people's self-concept would be useful in better understanding the long-term consequences of this phenomenon.

One potentially fruitful area in which to examine the combination of economic and altruistic norms is the domain of hybrid organizations. Research on organizations that incorporate for-profit and nonprofit features has primarily examined the fate of these combinations from a sociological perspective (Battilana & Lee, 2014; Haveman & Rao, 2006; Rodgers, 2016). The current work suggests a novel psychological mechanism for explaining the success or failure of different hybrid organizations. Specifically, it makes the prediction that hybrid organizations seen as for-profits with aspects of a nonprofit will be perceived more positively by the public than hybrid organizations seen as nonprofits with aspects of a for-profit.

Conclusion

Appeals that mix prosocial and self-interested motives in order to increase prosocial behavior are common, but do they work and, if so, why? Previous literature finds evidence that hybrid mixes of these two motives sometimes increases prosocial behavior and sometimes decreases it. The current work sought to clarify this picture by examining how the framing of a potentially prosocial behavior influences the standard of comparison deemed relevant and, as a result, the attractiveness of the behavior. The results shed new light on when self-interest motivates, and when it inhibits, prosocial behavior.

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Table 1. Sample stimuli from previous studies examining self-interested and prosocial motives in charitable giving.

Exchange Fiction Stimulus	Tainted Altruism Stimulus
The normal *price* for this type of candle in the area is approximately $2 but we're *charging* $3 so that the $1 profit can go to starting a training program for handicapped children. Would you be interested in *buying* one or more of these candles?	Frank Mulberry, the owner of a large chain of department stores, recently *donated* several million dollars to a local children's hospital. Mulberry *donated* the money because he knew that the good publicity would boost the reputation of his company and get more people to come to his stores.
From Holmes, Miller, & Lerner (2002)	From Newman & Cain (2014)

Note. Emphasis added.

Table 2. Number of people choosing to participate in the charitable opportunity in Study 2.

	Yes	No
Buy Frame	64	79
Donate Frame	43	101

Table 3. Descriptions of the products used in Studies 3a-g.

Study	Product Used	Value
3a	Travel cup	$7, $16
3b	Sunglasses	$1
3b	Tote bag	$3
3b	Earbuds	$5
3b	Travel cup	$7
3b	Flash drive	$9
3c	Sunglasses	$1
3c	Flash drive	$9
3d	Travel cup	$6, $17
3e	Tote bag	$5
3f	Tin of toffee	$16
3f	Tin of mixed nuts	$16
3g	Tin of mixed nuts	$15

Table 4. Descriptive statistics and individual results for Studies 3a-g for amount given.

Study	Total Participants*	M_{buy} (logged)	M_{donate} (logged)	t-statistic	p-value	95% CI
a	152	1.63	0.95	2.09	0.038	[0.03,1.32]
b	113	1.33	0.94	1.75	0.083	[-0.05,0.82]
c	155	0.84	0.60	0.75	0.457	[-0.39,0.86]
d	290	1.57	1.02	2.16	0.031	[0.05,1.05]
e	124	1.16	1.58	1.57	0.143	[-0.98,0.14]
f	286	1.87	0.92	3.47	<0.001	[0.41,1.49]
g	144	2.30	1.72	2.20	0.026	[0.07,1.09]

*Includes the total number of participants in the relevant conditions. Some studies included other conditions testing different hypotheses (see Supplementary Material for full study descriptions).

Figure 1. Forest plot of effect sizes for Studies 3a-g and total effect of amount given to charity by framing.

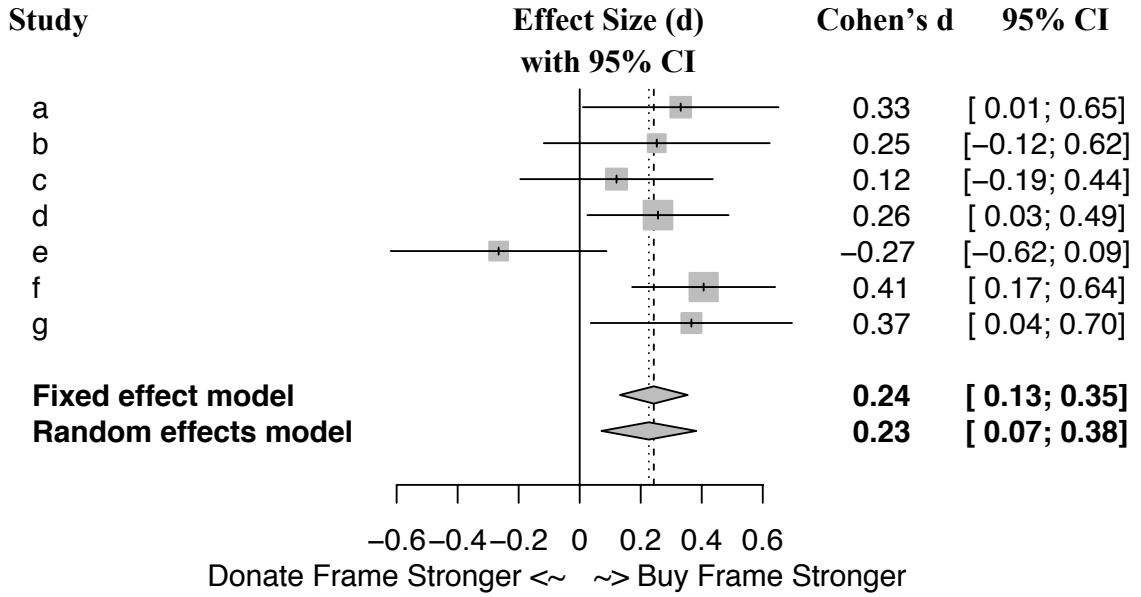

Table 5. Number of people choosing to participate in the charitable opportunity in Study 4.

	Yes	No
Buy Frame	39	31
Donate Frame	27	42

Figure 2. Amount given to charity (logged) by framing in Study 4.

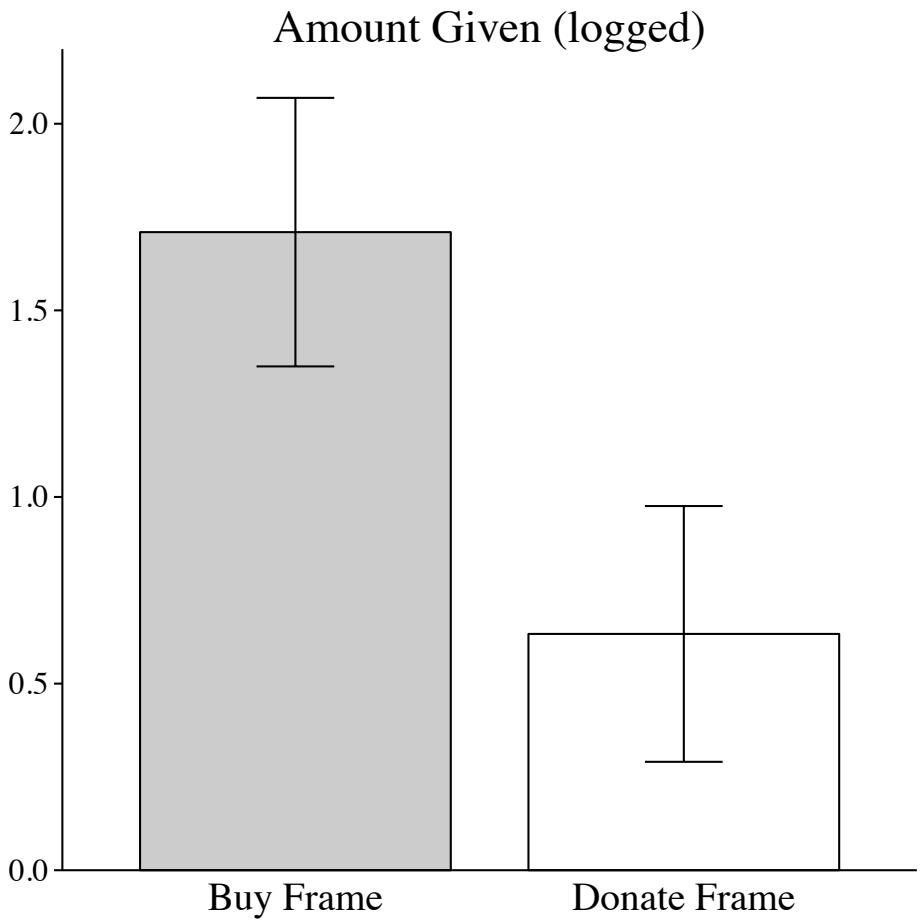

Table 6. Mean amount (logged) given by condition in Study 5.

	Buy Frame	Donate Frame
No Explicit Norm	2.23_a	1.82_b
Explicit Economic Norm	2.07_a	2.03_a
Explicit Altruistic Norm	1.80_b	1.70_b

Note. Means that do not share a subscript differ ($p < .05$).