

Cultural Variation in the Smiles We Trust: The Effects of Reputation and Ideal Affect on Resource Sharing

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When playing single-shot behavioral economic games like the Trust and Dictator Games, European Americans and East Asians invested in and gave more to targets whose smiles matched their culture's ideal affect (the affective states they value; Blevins et al., 2024; Park et al., 2017), suggesting that smiles signal something about targets' traits. But what happens when participants are given direct information about targets' traits; do targets' smiles still matter for resource sharing? To answer this question, we conducted four studies from 2019 to 2022 in which 429 European Americans and 413 Taiwanese played single-shot Trust Games with open, toothy "excited" smiling targets, closed "calm" smiling targets, and nonsmiling "neutral" targets that varied in their reputations for being trustworthy, competent, and emotionally stable. When targets' reputations were ambiguous (e.g., "50% of previous players said they were trustworthy"), European American and Taiwanese participants invested more in targets whose smiles matched their culture's ideal affect. However, when targets' reputations were clearly good (e.g., "80% of previous players said they were trustworthy") or bad (e.g., "20% of previous players said they were trustworthy"), European Americans invested equally in all targets, suggesting that reputational information about targets' traits mattered more than targets' smiles. The pattern for Taiwanese, however, differed: Taiwanese invested equally in calm and neutral targets when targets' reputations were clear, but regardless of their reputations, Taiwanese invested in excited targets the *least*. We discuss the implications of these findings for understanding cultural differences in the meaning of an excited smile in the context of resource sharing.


Keywords: culture, Trust game, ideal affect, smiles, investment

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When we trust another person, we believe that they intend and are able to behave in ways that align with our interests (Yamagishi & Yamagishi, 1994), which increases our likelihood of sharing resources with them. But how do we know whether a person is trustworthy, especially when we meet them for the first time? Decades of research demonstrate that people rapidly form impressions about others'

trustworthiness based on their facial appearance (Todorov et al., 2009; van't Wout & Sanfey, 2008; Willis & Todorov, 2006). These impressions reflect characteristics of the judge *and* the target; for instance, people tend to place greater trust in targets who have similar facial features as themselves (DeBruine, 2002; DeBruine et al., 2008) and in targets who look similar to others whom they

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Julie Y. A. Cachia played a lead role in data curation, formal analysis, project administration, resources, and visualization, a supporting role in

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have trusted before (Verosky & Todorov, 2010, 2013). These findings apply to emotional expressions as well. Although people are more likely to trust smiling than nonsmiling targets (Centorrino et al., 2015; Krumhuber et al., 2007; Kryś et al., 2016; Scharlemann et al., 2001), people judged targets whose smiles matched how they ideally wanted to feel as more affiliative (e.g., warm, friendly, trustworthy), and consequently, they shared more financial resources with them in the lab and field (Blevins et al., 2024; Park et al., 2017, 2020). These patterns, however, primarily emerged in situations where people knew nothing about the targets, except for what they saw on targets' faces (i.e., their facial features, race, sex, emotional expression). In many situations in daily life, however, people have more information about targets than just this facial information, even when meeting them for the first time. For example, people may introduce targets as their "trusted" friends or coworkers, and in some cases, targets' "reputations precede them." Once people know more about a target's relevant traits, do they still rely on that target's emotional expressions when deciding whether to trust and share resources with them?

While previous research has examined how "reputational information" influences trust, this literature largely exists independently from the literature on emotional facial expression, and as a result, few studies have examined how reputational information *interacts* with targets' emotional expressions to shape how people respond to them. Even fewer studies have examined how this occurs across cultures, despite work suggesting that there should be differences across cultures, based on documented cultural differences in the importance of reputation for trust (Yamagishi & Yamagishi, 1994), the social judgment of smiles (Kryś et al., 2016; Matsumoto & Kudoh, 1993; Ozono et al., 2010; Rychlowska et al., 2015; Tsai et al., 2019), and the links between emotional norms and ideals and trust (Park et al., 2017; Schug et al., 2017). We aimed to address these gaps in the literature in four studies. Before describing these studies, we present the theoretical framework that guided this research, affect valuation theory (AVT).

Ideal Affect and Resource Sharing

AVT argues that (a) how people actually feel ("actual affect") differs from how they would ideally like to feel ("ideal affect"), (b) cultural factors shape ideal affect more than actual affect, and (c) differences in ideal affect have consequences for behavior (Tsai, 2007, 2017; Tsai et al., 2006). While decades of research have supported each of these claims, most research has focused on the causes and consequences of cultural differences in ideal affect.

Even though most people want to feel good, there are cultural differences in the particular positive states that people ideally want to feel. In previous work, European Americans, East Asian Americans, and East Asians completed the Affect Valuation Index (AVI), which asks people to use a 5-point rating scale ranging from *not at all* to *an extreme amount/all the time* to indicate how much they would ideally like to feel and how much they actually feel a variety of different affective states (Tsai et al., 2006, 2024). European Americans and East Asian Americans reported valuing high arousal positive (HAP) states like excitement more than East Asians, and East Asians and East Asian Americans reported valuing low arousal positive (LAP) states like calm more than European Americans (Tsai et al., 2006, 2007). In a recent meta-analysis, Tsai et al. (2024) observed that while European American–East Asian

differences in self-reports of ideal HAP have endured over time, differences in self-reports of ideal LAP have changed, driven largely by European Americans valuing LAP more than before. As a result, in recent studies, European Americans report valuing LAP as much or sometimes even more than East Asians (Tsai et al., 2024).

These cultural differences in ideal affect are reflected in how people perceive and respond to others. When shown pictures of faces with open, toothy "excited" smiles, faces with closed "calm" smiles, and "neutral" faces with no expression, European Americans rated excited (vs. calm) smiles as more affiliative (i.e., extraverted, friendly, agreeable) than did Hong Kong Chinese (Tsai et al., 2019), and these differences were mediated by European Americans valuing HAP states more than Hong Kong Chinese. These findings are consistent with previous research demonstrating that people rate excited (vs. neutral) targets as more honest in the United States than in Hong Kong (Kryś et al., 2016), that people rate smiling (vs. nonsmiling) targets as more sociable in the United States than in Japan (Matsumoto & Kudoh, 1993), and that higher intensity, "excited" smiles are associated with greater trustworthiness in the United States but lesser trustworthiness in Japan (Ozono et al., 2010).

Importantly, these differences in social judgments have important behavioral consequences, including whom people hire for a job (Bencharit et al., 2019) and choose as their physician (Sims et al., 2014). These differences have also been linked to financial investment and resource sharing in the lab (Park et al., 2017) and lending in the real world (Park et al., 2020). For instance, when European Americans and Koreans played the Dictator Game, in which participants were tasked with unilaterally distributing money between themselves and various targets, people trusted and ultimately gave more to targets who matched their ideal affect. Specifically, European Americans trusted and gave more to excited than calm targets and more to calm than neutral targets whereas Koreans trusted and gave more to calm targets than excited or neutral targets (Park et al., 2017). These findings held regardless of targets' race or sex.

Moderators of Ideal Affect and Resource Sharing

Interestingly, these affective preferences varied slightly when participants were given a chance to deliberate. In a recent set of studies, Blevins et al. (2024) observed that after greater deliberation (manipulated in terms of greater allotted time on task and lower cognitive load) in the Dictator Game, European Americans no longer preferred excited over calm targets but instead gave equal amounts of money to both excited and calm smiling targets over neutral nonsmiling ones. This suggests that with deliberation, European Americans have less of a preference for excited (vs. calm) smiles and instead treat excited and calm smiles equally. This preference for smiling over nonsmiling targets is consistent with the value that U.S. culture places on positivity (e.g., Sims et al., 2015). In contrast, Chinese participants continued to give more to calm *over* excited and neutral targets, even after having time to deliberate, consistent with their greater valuation of LAP versus HAP states. Importantly, with deliberation, European Americans still gave more to excited targets than did Chinese, consistent with cultural differences in ideal HAP.

A similar pattern was observed during the Trust Game (Berg et al., 1995; Glaeser et al., 2000), in which participants must decide how much money to transfer to or invest in targets based in part on how much they think the target is likely to return to them. This differs from the Dictator Game where participants must simply decide how much

money to give to targets because there is no reciprocation (Alós-Ferrer & Farolfi, 2019). As a result, the Trust Game requires greater deliberation than does the Dictator Game. Consistent with the above results, during this more deliberative task, European Americans invested in *both* excited and calm (i.e., smiling) targets more than neutral targets whereas East Asians (Chinese, Taiwanese, Koreans) invested more in calm targets compared to excited and neutral targets. Consistent with cultural differences in ideal HAP, European Americans invested more in excited targets than did East Asians.

Does Reputational Information Matter?

As mentioned above, another important factor is whether people have access to additional information about targets' traits. No studies have examined whether people still trust targets whose emotional expressions match their cultural ideals when they are given additional information about the target, such as how trustworthy or competent they are. Although decades of research demonstrate that people trust others who have good reputations (in support of "indirect reciprocity," Nowak & Sigmund, 2005), whether manipulated experimentally (Abraham et al., 2017; Delgado et al., 2005; Fareri et al., 2012) or measured observationally (Bolton et al., 2005; Charness et al., 2011; Engelmann & Fischbacher, 2009; Seinen & Schram, 2006; Wedekind & Braithwaite, 2002), these effects largely have been investigated independently of emotional expression or other target characteristics.

Examining the interaction between targets' reputations and their emotional expressions has important implications for understanding the meaning of emotional expressions in the context of trust. For example, one hypothesis is that targets' reputational status and targets' emotional expressions are distinct and independent sources of information about a target; therefore, they exert independent effects on trust and investment ("emotional expression and reputational status are distinct" hypothesis). Thus, the higher targets' reputations, the more participants should trust and invest in them. Additionally, participants should transfer more to targets whose emotional expressions match their cultural ideals, regardless of their reputations. Thus, in the context of the Trust Game, at each level of reputation, European Americans should transfer more to excited and calm targets compared to neutral ones, and East Asians should transfer more to calm than excited or neutral targets.

A second hypothesis is that targets' emotional expressions *signal* their reputational status (i.e., targets whose emotional expressions match the ideal are more trustworthy) so that when a target's reputation is made clear through some other source of information, people no longer need to rely on a targets' emotional expressions to determine their trustworthiness ("emotional expression signals reputational status" hypothesis). Indeed, this is consistent with arguments made since Darwin that emotional expressions signal people's intentions (Darwin, 1872/1989; Ekman, 1992; Fridlund, 1991; most recently, Keltner et al., 2019), particularly in geographic regions with greater historical ethnic diversity and fewer shared social norms (Rychlowska et al., 2015). However, if those intentions are revealed with more direct reputational information (e.g., being told that someone is very trustworthy), a target's emotional expression should matter less. In other words, people should pay *more* attention to targets' emotional expressions when targets' reputations are ambiguous (either because no direct reputational information is available or because the reputational information is mixed) but *less* attention to targets' emotional expressions when their reputations are clear.

Thus, in the context of the Trust Game, the "emotional expression signals reputational status" hypothesis predicts that when targets' reputations are ambiguous ("moderate"), European Americans should transfer more to excited and calm than neutral targets whereas Taiwanese should transfer more to calm than excited and neutral targets, in line with previous work (Blevins et al., 2024; Park et al., 2017). However, when targets' reputations are clearly good ("high") or bad ("low"), European Americans and Taiwanese would transfer equally to calm, excited, and neutral targets.

We also wondered whether there would be cultural differences in the interaction of target reputation and emotional expression on trust. Although reputation should matter for both groups, previous work by Yamagishi and Yamagishi (1994) argued that reputation is *more* important in the United States than in Japan because the social structure in the United States is based less on committed relationships than that of Japan and, as a result, is less certain and stable (Yamagishi, Cook, & Watabe, 1998; Yamagishi & Yamagishi, 1994). Although our work did not focus on Japan, Taiwan is also a society that is based more on committed relationships, at least compared to the United States (Chiou, 2001).¹ Moreover, because the United States is more historically heterogeneous than East Asia, people may infer reputational information from emotional expressions even more in the United States than in East Asia. Thus, it is possible that the "emotional expression signals reputation" hypothesis would be particularly true for European Americans compared to Taiwanese.

The Present Studies

To test the hypotheses described above, we conducted four studies from 2019 to 2022 based on the Trust Game paradigm (Berg et al., 1995; Glaeser et al., 2000), in which participants were assigned to the "proposer" role and asked to decide how much of a given endowment to transfer to another player, the "target," whose face varied in emotional expression (excited, calm, neutral), race (White, Asian), and sex (male, female). We chose this particular behavioral economic game because it is considered to be more similar to real-world trust behavior than the Dictator Game. In each study, we provided different types of reputation information for each target. In Study 1, we provided reputational information about how *trustworthy* other participants rated the target to be (representing low, moderate, and high trustworthiness). In Study 2, to examine whether our findings generalized to a nonaffiliative trait relevant to trust, we provided reputational information about how *competent* other participants rated the target to be (representing low, moderate, and high competence). Studies 3 and 4 were also conducted on European Americans and Taiwanese participants but were geared toward understanding if there were specific types of information (i.e., about targets' past

¹ Cultural differences have also emerged in generalized trust. Yamagishi and Yamagishi (1994) argued that U.S. Americans reported higher generalized trust than Japanese because they lived in more socially uncertain conditions and, therefore, needed to trust strangers more. Recent research has also identified higher relational mobility (Thomson et al., 2018) and lower within-individual variability in emotional expressivity (Schug et al., 2017) as predicting higher generalized trust. Consistent with these findings, we have observed that European Americans overall gave and transferred more in Dictator and Trust Games than their East Asian peers (Blevins et al., 2023; Park et al., 2017); however, this was not the focus of the current research (see Supplemental Materials Section 7).

behaviors, or their emotional stability) that would increase Taiwanese participants' trust of excited targets relative to calm and neutral ones.

Study 1: Targets' Trustworthiness

Hypotheses

The "emotional expression and reputational status are distinct" hypothesis predicts that (a) participants would transfer more to targets with higher versus lower trustworthiness reputation, and (b) across reputation levels, European Americans would transfer more to excited and calm than neutral targets whereas Taiwanese would transfer more to calm than excited and neutral targets. In other words, this hypothesis predicts a significant main effect of target reputation (within subjects: low trustworthiness, moderate trustworthiness, high trustworthiness) and a significant Participant Culture (between subjects: European American, Taiwanese) \times Target Emotional Expression (within subjects: excited, calm, neutral) interaction.

The "emotional expression signals reputational status" hypothesis, however, predicts that: (a) when target reputational status is ambiguous (i.e., moderate trustworthiness), European Americans would transfer more to excited and calm than neutral targets, and Taiwanese would transfer more to calm than excited and neutral targets, but (b) when reputational status is clear (i.e., high and low in trustworthiness), participants would invest similarly in excited, calm, and neutral targets across cultures. This hypothesis predicts a significant Participant Culture \times Target Emotional Expression \times Target Reputation interaction.

Method

Participants

Power analyses using G*Power 3.1.3 (Erdfelder et al., 1996) indicated that a total sample size of 128 participants was necessary for the study to have 95% power to detect a small effect size ($\eta^2 = .01$) at an α level of .05. Therefore, we recruited 113 European American students from Stanford University (68.1% female, 29.2% male, 2.7% not available [NA]) and 105 Taiwanese students from National Chengchi University (70.5% female, 28.6% male, 1.0% NA) for a study titled "Psychology of Decision-Making" via university paid pools.

European Americans were required to identify as "White," have been born in the United States, have parents who were born in North America, and have grandparents who were born in North America or Western Europe. Taiwanese were required to have been born and raised in Taiwan, have parents who were born in Taiwan, and have grandparents who were born in Taiwan or China.

The cultural groups did not differ by gender, $\chi^2(1) = 0.001, p = .972$, or age ($B = -0.08$, standard error [SE] = .15, $z = 0.59, p = .558$; European Americans: $M = 21.64, SD = 1.91$; Taiwanese: $M = 21.47, SD = 2.37$), but they did differ in annual family income (1 \leq \$10,000, 2 = \$10,001–\$20,000, 3 = \$20,001–\$30,000, 4 = \$30,001–\$40,000, 5 = \$40,001–\$50,000, 6 = \$50,001–\$75,000, 7 = \$75,001–\$100,000, 8 > \$100,000; $B = 1.58, SE = .11, z = 14.38, p < .001$): European American participants' annual family income ($M = 6.94, SD = 1.58$) was higher than that of Taiwanese participants ($M = 3.77, SD = 1.53$). Since controlling for annual family income yielded a similar pattern of results, we dropped this variable from the final model for parsimony (see Supplemental Materials Section 2).

Instruments

All study materials were translated and back-translated into traditional Chinese by two bilingual research assistants.

Actual and Ideal Affect. To assess participants' actual and ideal affect, we administered the AVI (Tsai et al., 2006). Participants rated how often they actually felt and how often they would ideally like to feel 39 different affective states over the course of a typical week, using a 5-point scale 1 (*never*) to 5 (*all the time*). These states sampled each octant of the affective circumplex and other emotional states: elated, enthusiastic, euphoric, excited, content, happy, satisfied, peaceful, calm, relaxed, serene, fearful, hostile, nervous, sad, unhappy, ashamed, disgusted, stressed, guilty, contemptuous, fatigued, angry, lonely, dull, sleepy, sluggish, astonished, surprised, strong, aroused, rested, energetic, quiet, still, idle, passive, inactive, and no emotion.

To account for cultural differences in response styles, such as the tendency for East Asians to favor scale midpoints over extremes compared to North Americans (Chen et al., 1995), we standardized the ideal and actual affect scores by ipsatizing. As in previous research (Tsai et al., 2006), to ipsatize the ideal affect scores, we first calculated the overall mean and standard deviation across all ideal affect items for a given participant. We then subtracted this overall mean from each ideal affect item and divided it by the standard deviation. The same process was repeated for the actual affect items. We created actual HAP (α : European Americans = .81; Taiwanese = .82) and ideal HAP (α : European Americans = .83; Taiwanese = .85) aggregates by averaging ratings of actual and ideal "enthusiastic," "excited," "elated" and "euphoric," respectively, and actual LAP (α : European Americans = .85; Taiwanese = .76) and ideal LAP (α : European Americans = .80; Taiwanese = .80) aggregates by averaging ratings of actual and ideal "relaxed," "calm," "peaceful" and "serene," respectively.

Trust Game

The Trust Game (Berg et al., 1995; Camerer & Weigelt, 1988) is a two-player economic game where the proposer (sometimes referred to as the trustor in the literature) is given a certain endowment (e.g., \$10) and must decide how much to transfer to the target (sometimes referred to as the trustee in the literature). The amount transferred to the target (e.g., \$5) is then multiplied by four² ($\$5 \times 4 = \20), and the target decides how much of that amount (\$20) to return to the proposer (e.g., \$10). Both players can choose not to give any money to the other player, but cooperation yields maximal monetary gains for both players. While economic games like the Trust Game are highly controlled, emerging evidence suggests that decisions in these games correlate with real-world resource sharing, including donations to alumni associations or other university organizations (Baran et al., 2010; Benz & Meier, 2008) and volunteer work (Carpenter & Myers, 2010).

In this study, participants were told that they would be randomly assigned to one of the two roles, and they viewed a loading screen with three dots sequentially appearing and disappearing, simulating the system's allocation of roles. In reality, participants were all assigned

² While previous Trust Game paradigms (e.g., Berg et al., 1995) use a multiplication factor of three, we used a multiplication factor of four, an even number, to make it easier for participants to calculate how much targets might return. This was particularly important in Study 3, in which targets varied in their likelihood of returning *half* of what they received.

the proposer role. Participants first played the No-Reputation Trust Game (i.e., the Trust Game without knowing targets' reputational status) to ensure that we could replicate previous results described above (Blevins et al., 2024). Then participants played the Reputation Trust Game to test the “emotional expression signals reputational status” and “emotional expression and reputational status are distinct” hypotheses.

No-Reputation Trust Game. As in Blevins et al. (2024), participants played multiple trials of a modified Trust Game with targets who varied in terms of emotional expression (excited, calm, neutral), race (White, Asian), and sex (male, female), resulting in 12 trials: 3 (Target Emotional Expression) \times 2 (Target Race) \times 2 (Target Sex). Facial stimuli were generated using Facegen Modeller program (<http://facegen.com>) with identical parameters as those used and pretested in previous work (Park et al., 2017) to create faces that varied by expression, race, and sex in Facegen (see Figure 1 examples of targets with various expressions). As in previous work, participants were told that the faces were the avatars that targets chose for the game. To increase credibility, participants also chose avatars themselves before playing the games (see below). For each trial, after seeing the target's face, participants had to decide how much of their endowment (US\$10 for U.S. participants, NT\$300 for Taiwanese) to transfer to each target (in US\$1 or NT\$30 increments).

Reputation Trust Game. Participants then played 72 trials of a modified Trust Game. In addition to varying by emotional expression, race, and sex, targets also varied in terms of their “trustworthiness reputation,” ranging from low to moderate to high, based on “the percentage of previous participants who rated the target as trustworthy.” Low trustworthiness targets were rated as trustworthy by 15%–25% of participants; moderate trustworthiness targets were rated as trustworthy by 45%–55% of participants, and high trustworthiness targets were rated as trustworthy by 75%–85% of participants. To enhance credibility, the computer randomly chose a specific percentage value within each range (e.g., 15%–25% for low reputation) from a uniform distribution to ensure that each value had the same probability of being randomly chosen for a given target. The same values were used for all four studies. To reduce the

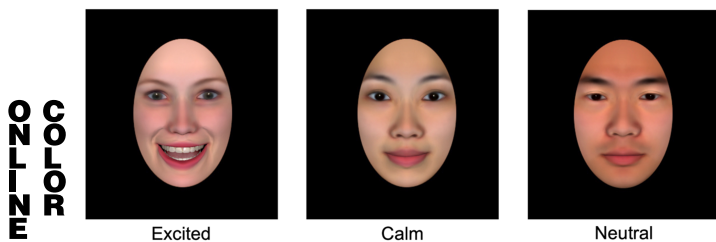
chances of a given effect being driven by a specific target identity, we doubled the number of target identities so that there were two target identities per cell, resulting in 72 trials: 3 (Target Reputation) \times 3 (Target Expression) \times 2 (Target Race) \times 2 (Target Sex) \times 2 (Target Identity). At the beginning of each trial, participants viewed the target's face (4 s) followed by the reputation information (4 s). Participants then decided how much of their endowment to transfer to the target and clicked to advance to the next trial (Figure 2).

In both the No-Reputation and Reputation Trust Games, participants did not receive feedback regarding how much the targets returned to them, but they were informed that one of the trials of the game would be randomly chosen, and the amount of money that they made on that trial (the sum of what they kept and what was returned to them by the target) would be added to their participation compensation. Thus, participants understood that their decisions to invest on any given trial could have real monetary consequences. Final compensation for Taiwanese participants was rounded to the closest NT\$200 (approximately US\$6.67) due to the minimum denomination available for gift cards in Taiwan. Taiwanese participants received NT\$150 (approximately US\$5) as a base compensation plus an average bonus of NT\$345 (US\$11.50), and European American participants received US\$12 as a base compensation plus an average bonus of US\$12 (see Supplemental Materials Section 3 for details on how we computed the bonus for each study).

To account for cultural differences in response styles (Chen et al., 1995), the amounts that participants transferred in both the No-Reputation and Reputation Trust Games were standardized by ipsatizing. In the same way that we ipsatized affect variables, we ipsatized the No-Reputation Trust Game transfers by first calculating the overall mean and standard deviation across all No-Reputation Trust Game trials for a given participant. We then subtracted this overall mean from each transfer in the No-Reputation Trust Game trial and divided it by the standard deviation. The process was repeated for the Reputation Trust Game. The results were very similar when we analyzed raw scores for this study (and the other three studies; see Supplemental Materials Section 7 for raw transfer data); when there were discrepancies, the ipsatized values appeared to be more sensitive to the main effects and interactions.

Figure 1

Examples of Targets by Emotional Expression



Note. Excited targets (left) had open-mouthed and toothy smiles, and calm targets (middle) had closed mouth smiles. Neutral targets (right) had no smile. Facial stimuli were generated by the Facegen Modeller program (<https://facegen.com>) with identical parameters as those used and pretested in previous work (Adapted from “Neurocultural evidence that ideal affect match promotes giving,” by B. Park, E. Blevins, B. Knutson, and J. L. Tsai, 2017, *Social Cognitive and Affective Neuroscience*, 12(7), p. 4 [<https://doi.org/10.1093/scan/nsx047>]. CC BY 4.0.). See the online article for the color version of this figure.

Procedure

Participants completed the study online. To explain why participants would see computer-generated faces, before playing the game, participants were told that they would see their partners' selected avatars during the game; therefore, participants were asked to select their own avatars that their partners (targets) would see. Participants were then asked to choose an avatar that they identified with most among 12 faces that varied by expression, race, and sex but that differed from the faces used in the actual game (see Supplemental Materials Section 4). Participants played the No-Reputation Trust Game and then the Reputation Trust Game.³ Participants then completed the AVI and demographic questions.

³ In all the studies, at the end of the session, participants were also shown half of the targets and asked to rate the extent to which each target face was friendly, trustworthy, competent, dominant, and financially needy using a scale from 1 = *not at all* to 7 = *extremely*. These results are provided in Supplemental Materials Section 12.

Figure 2
Sample Trial From Reputation Trust Game (Study 1)



Note. See the online article for the color version of this figure.

Data Analyses and Results

Before testing our main hypotheses, we first examined whether we could replicate cultural differences in ideal affect and cultural differences in transfers to excited, calm, and neutral targets in the Trust Game when no reputational information was provided (No-Reputation Trust Game).

Are There Cultural Differences in Ideal Affect?

We hypothesized that European Americans would report wanting to feel HAP states more than Taiwanese, but we were unsure about differences in ideal LAP given recent findings. To test this hypothesis, we ran two linear regressions: Cultural group was treated as the independent variable (European Americans were coded as “1,” Taiwanese were coded as “-1”), and ipsatized ideal HAP and LAP were treated as the dependent variables in each model. Ipsatized actual HAP and actual LAP were entered respectively as covariates to control for overlap between actual and ideal affect.⁴

As predicted, European Americans valued HAP states significantly more than Taiwanese, $B = 0.06$, $SE = .03$, $z = 2.01$, $p = .045$ (European Americans: $M = 0.63$, $SE = 0.04$; Taiwanese: $M = 0.49$, $SE = 0.04$). However, the cultural groups did not significantly differ in their valuation of LAP states, $B = -0.0004$, $SE = .03$, $z = -0.02$, $p = .988$ (European Americans: $M = 1.10$, $SE = 0.04$; Taiwanese: $M = 1.15$, $SE = 0.04$), which aligns with recent trends (Tsai et al., 2024).

Are There Cultural Differences in Transfers to Excited, Calm, and Neutral Targets in the No-Reputation Trust Game?

To examine whether we could replicate previous findings (Blevins et al., 2024) of European Americans transferring more to calm and excited targets than neutral ones, East Asians transferring more to calm than excited and neutral targets, and European Americans transferring more to excited and less to calm targets than East Asians, participants first completed the No-Reputation Trust Game. As in our previous studies (Park et al., 2017), we excluded participants (39 European Americans, 14 Taiwanese) who did not vary their responses across trials (e.g., responding “1” across all 12 trials). However, the main findings remained the same when we included all participants

(see Supplemental Materials Section 1). This resulted in a final sample size of 74 European Americans (71.6% female, 25.7% male, 2.7% NA) and 91 Taiwanese (74.7% female, 24.2% male, 1.1% NA) for the trials in which participants received no reputation information about the targets.

We conducted a two-way repeated measures analysis of variance (ANOVA) testing the Participant Culture (between subjects: European American, Taiwanese) \times Target Emotional Expression (within-subjects: excited, calm, neutral) interaction on ipsatized transfers. All post hoc pairwise comparisons were conducted using Tukey’s Honestly Significant Difference (HSD) test. There was not a significant main effect of Participant Culture, $F(1, 163) = 0.002$, $p = .968$. However, there was a significant main effect of Target Emotional Expression on transfers, $F(2, 326) = 29.03$, $p < .001$, $\eta^2 = 0.15$, which was qualified by a significant Participant Culture \times Target Emotional Expression interaction, $F(2, 326) = 19.93$, $p < .001$, $\eta^2 = 0.11$.

As illustrated in Figure 3 (left), Taiwanese transferred the most to calm, followed by neutral, and least to excited targets (calm vs. excited: $p < .001$; 95% confidence interval, CI, [0.48, 0.84]; $d = 0.69$; calm vs. neutral: $p = .033$, 95% CI [0.01, 0.37], $d = 0.20$; neutral vs. excited: $p < .001$, 95% CI [0.29, 0.65], $d = 0.49$). In contrast, European Americans transferred more to both calm and excited targets than neutral targets, and there was no difference in transfers to excited versus calm targets (calm vs. neutral: $p < .001$, 95% CI [0.16, 0.56], $d = 0.38$; excited vs. neutral: $p = .026$, 95% CI [0.02, 0.42], $d = 0.23$; see Supplemental Materials Section 5 for tables of all means and standard errors).

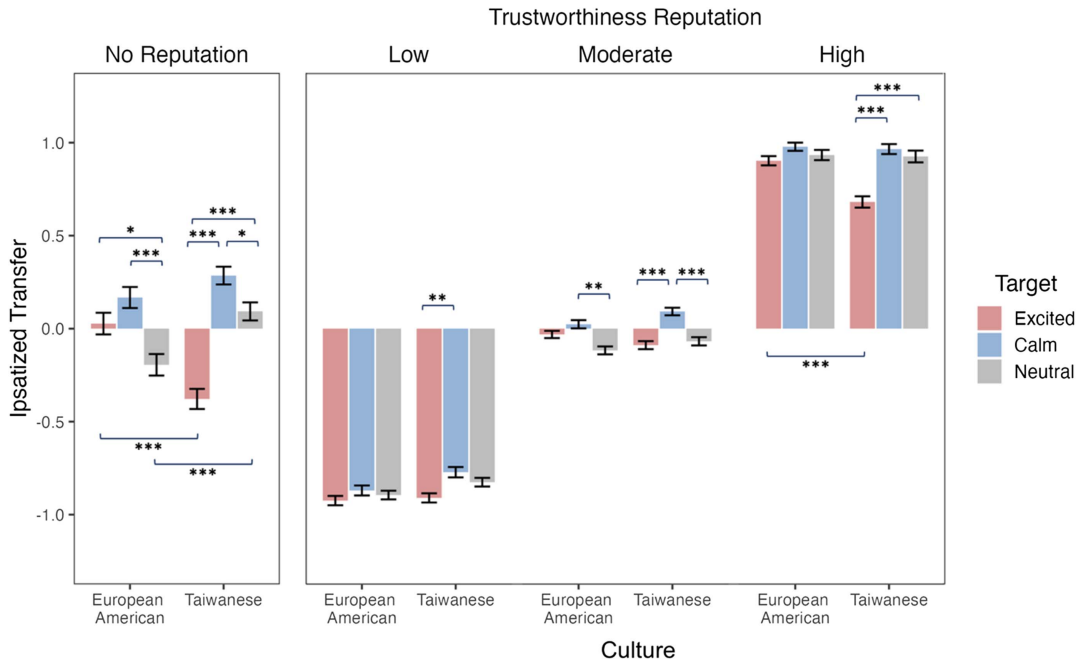
Additionally, consistent with previous findings, between-culture comparisons revealed that European American participants transferred more to excited targets than did Taiwanese participants ($p < .001$, 95% CI [0.28, 0.54], $d = 0.42$); however, there were no significant cultural differences in transfers to calm targets, perhaps because there were no cultural differences in ideal LAP. In addition, Taiwanese participants transferred more to neutral targets than did European American participants ($p < .001$, 95% CI [0.16, 0.42], $d = 0.30$).

Overall, we replicated the main findings from Blevins et al. (2024): Without reputation information, European Americans transferred more to smiling (calm and excited) targets than neutral targets, and

⁴ The results remained consistent even when we did not control for actual affect (see Supplemental Materials Section 10).

Figure 3

Ipsatized Transfers to Excited, Calm, and Neutral Targets by Participant Cultural Group in No-Reputation Trust Game (Left) and Trustworthiness–Reputation Trust Game (Right) in Study 1



Note. To account for the possibility of response style bias, we ipsatized the raw transfer amounts. Error bars represent ± 1 standard error of the mean. Significant within-culture comparisons are represented by asterisks above the *x*-axis, and significant between-culture comparisons are represented by asterisks below the *x*-axis (see Supplemental Materials Section 6). See the online article for the color version of this figure.

* $p < .05$. ** $p < .01$. *** $p < .001$.

Taiwanese transferred more to calm than excited and neutral targets. Moreover, consistent with cultural differences in ideal HAP and previous research, European Americans transferred more to excited targets than did Taiwanese participants. Next, we examined whether providing information about targets' trustworthiness altered these findings.

Does Targets' Trustworthiness Reputation Change Transfers to Excited, Calm, and Neutral Targets During the Trust Game? Testing Two Hypotheses

To test the "emotional expression and reputational status are distinct" and "emotional expression signals reputational status" hypotheses, participants played the Reputation Trust Game. As in Park et al. (2017), we excluded participants (11 European Americans, two Taiwanese) who did not vary their responses across trials (e.g., responding "1" across all 72 trials). The pattern of results remained the same when we included all participants (see Supplemental Materials Section 1 for analyses with full sample). This resulted in a final sample size of 102 European Americans (67.6% female, 29.4% male, 2.9% NA) and 103 Taiwanese (70.9% female, 28.2% male, 1% NA). Given the minimum total sample size of 128 suggested by the power analysis, we had sufficient statistical power to proceed with our analyses.

We conducted a 2 (between subjects, Participant Culture: European American, Taiwanese) \times 3 (within subjects, Target Emotional Expression: excited, calm, neutral), \times 3 (within subjects, Target Reputation: low trustworthiness, moderate trustworthiness, high

trustworthiness) repeated measures ANOVA on ipsatized transfers (see Supplemental Materials Section 7 for analyses with raw transfers). All post hoc pairwise comparisons were conducted using Tukey's HSD test.

Consistent with the "emotional expression and reputational status are distinct" hypothesis, there was a significant main effect of Target Reputation, $F(2, 406) = 1005.22, p < .001, \eta^2 = 0.83$, and a significant Participant Culture \times Target Emotional Expression interaction, $F(2, 406) = 6.35, p = .002, \eta^2 = 0.03$. However, consistent with the "emotional expression signals reputational status" hypothesis, the above effects and interactions were qualified by a significant Participant Culture \times Target Emotional Expression \times Target Reputation interaction, $F(4, 812) = 2.46, p = .044, \eta^2 = 0.01$ (see Figure 3, right, for the results, and the Supplemental Materials Section 6 for the tables of all means and standard errors).⁵

As predicted, for European Americans, when targets' reputations were moderate, European Americans transferred more to calm than neutral targets (calm vs. neutral: $p = .003, 95\% \text{ CI } [0.03, 0.25], d = 0.24$), with transfers to excited targets falling in between calm and

⁵ In addition, there was a significant main effect of Target Emotional Expression, $F(2, 406) = 18.92, p < .001, \eta^2 = 0.09$, and a significant Target Reputation \times Target Emotional Expression interaction, $F(4, 812) = 11.83, p < .001, \eta^2 = 0.06$, but because they were qualified by the Participant Culture \times Target Emotional Expression \times Target Reputation interaction and were not relevant to the two competing hypotheses tested, we do not discuss them further.

neutral targets. This pattern is consistent with European Americans giving more to the calm and excited smiling versus neutral targets in the No-Reputation Trust Game and previous work (Blevins et al., 2024). However, when targets' reputations were clearly low or high, European Americans no longer showed a preference for smiling targets (low: all pairwise comparisons $p \geq .699$; high: all pairwise comparisons $p \geq .347$): European Americans transferred as much to neutral targets as they did to calm and excited targets with low and high trustworthiness reputations. In other words, targets' emotional expressions mattered more for European Americans when targets' reputational status was unclear than when their reputational status was either clearly good or bad.

What about Taiwanese? When targets' reputations were moderate, Taiwanese transferred more to calm than excited and neutral targets, as in the No-Reputation Trust Game and previous work. When targets' reputations were clearly low or high, Taiwanese transferred as much to neutral targets as they did to calm targets. These findings are also consistent with the "emotional expression signals reputational status" hypothesis. However, regardless of their reputational status, Taiwanese consistently transferred *less* to excited compared to calm (and sometimes neutral) targets (low reputation: calm vs. excited— $p = .003$, 95% CI [0.03, 0.25], $d = 0.23$; moderate reputation: calm vs. excited— $p < .001$, 95% CI [0.07, 0.29], $d = 0.30$; calm vs. neutral— $p < .001$, 95% CI [0.05, 0.27], $d = 0.27$; high reputation: calm vs. excited— $p < .001$, 95% CI [0.18, 0.39], $d = 0.48$; neutral vs. excited— $p < .001$, 95% CI [0.14, 0.35], $d = 0.41$). In other words, even with clear target reputational information, Taiwanese transferred *the least* to excited targets, suggesting that excited smiles signaled more than trustworthiness (or lack thereof) for Taiwanese. These findings are consistent with the "emotional expression and reputational status are distinct" hypothesis.⁶

In sum, while the pattern of European American transfers supported the "emotional expression signals reputational status" hypothesis, the pattern of Taiwanese transfers supported the "emotional expression signals reputational status" and the "emotional expression and reputational status are distinct" hypotheses.

Discussion

For European Americans, our findings supported the "emotional expression signals reputational status" hypothesis. When targets' reputations were unclear or unknown, European Americans transferred more to calm (and excited) targets than neutral ones, consistent with the findings from the No-Reputation Trust Game. However, when targets' reputations were clear, European Americans treated neutral targets like calm and excited ones. This suggests that for European Americans, emotional expression served as a proxy for trustworthiness, and once trustworthiness information was provided, emotional expression no longer mattered for their decisions.⁷

For Taiwanese, our findings supported *both* the "emotional expression signals reputational status" and the "emotional expression and reputational status are distinct" hypotheses. When targets' reputations were unclear or unknown, Taiwanese transferred more to calm than neutral or excited ones, consistent with the findings from the No-Reputation Trust Game. When reputations were clear, Taiwanese treated neutral targets like calm ones. However, this was not the case for excited targets: Even when excited targets' reputations were clear, Taiwanese transferred less to excited targets

than calm and neutral ones. This suggests that for Taiwanese, emotional expression mattered even when reputational information was provided.

In the next study, we wondered whether similar findings would emerge if we provided reputational information about targets' competence, a trait that is central to trust (Yamagishi & Yamagishi, 1994) but may be less connected to smiling than trustworthiness.

Study 2: Targets' Competence

Hypotheses

As described above, the "emotional expression and reputational status are distinct" hypothesis predicts a significant main effect of Target Reputation and a significant Participant Culture \times Target Emotional Expression interaction whereas the "emotional expression signals reputational status" hypothesis predicts a significant Participant Culture \times Target Emotional Expression \times Target Reputation interaction. Based on the results from Study 1, we would predict that, while there would be a significant main effect of Target Reputation and a significant Participant Culture \times Target Emotional Expression interaction, they would be qualified by a significant Participant Culture \times Target Emotional Expression \times Target Reputation interaction.

Thus, consistent with the "emotional expression signals reputational status" hypothesis, we predicted that (a) for targets with moderate competence reputations, European Americans should transfer more to calm and excited targets than neutral ones whereas Taiwanese should transfer more to calm than excited or neutral targets, (b) but for targets with low or high competence reputations, European Americans should transfer similar amounts to excited, calm, and neutral targets, and Taiwanese should transfer similar amounts to calm and neutral targets. Consistent with the emotional expression and reputational status are distinct hypothesis, we predicted that (c) Taiwanese should transfer the least to excited targets across reputation levels.

Method

Participants

A power analysis using G*Power 3.1.9 (Erdfeiler et al., 1996) indicated that a total sample size of 184 was necessary for the study to have 90% power to detect the effect size ($\eta^2 = 0.01$) found in Study 1 for the three-way Participant Culture \times Target Emotional Expression \times Target Reputation interaction at an α level of .001. 122 European American students from Stanford University (62.3% female,

⁶ We tested whether target race and target sex moderated these findings. While target race did not moderate these findings, target sex emerged as a significant moderator for Study 1 only, with the patterns being stronger for female than male targets (see Supplemental Materials Section 8 for details). However, target race and target sex did not moderate findings for any of the subsequent studies. Additionally, for the Reputation Trust Game, we focused on within-culture differences in transfers in the article, but we report between-culture comparisons in Supplemental Materials Section 6 for all studies.

⁷ To rule out the possibility that target reputation overrode target expression for European Americans due to recency effects (i.e., because reputation was presented *after* the target expression) or because reputation information was text-based, we conducted two additional studies where we presented reputational information first and where we presented reputational information in graphic form. Neither moderated the effects of emotional expression and/or reputation, suggesting that these factors do not account for the observed pattern of results (Supplemental Materials Section 9).

34.4% male, 3.3% NA) and 104 Taiwanese students from National Chengchi University (69.2% female, 30.8% male) were recruited for a study titled “Psychology of Decision-Making” using the same recruitment methods and inclusion criteria as in Study 1.

The cultural groups did not differ by gender, $\chi^2(1) = 0.38, p = .537$, but did differ in age ($B = 0.44, SE = .14, z = 3.20, p = .002$), with European Americans ($M = 21.63, SD = 1.77$) being older than Taiwanese ($M = 20.75, SD = 2.36$). In addition, they differed in annual family income (1 \leq \$10,000, 2 = \$10,001–\$20,000, 3 = \$20,001–\$30,000, 4 = \$30,001–\$40,000, 5 = \$40,001–\$50,000, 6 = \$50,001–\$75,000, 7 = \$75,001–\$100,000, 8 > \$100,000; $B = 1.39, SE = .11, z = 12.35, p < .001$): European American participants’ annual family income ($M = 6.49, SD = 1.72$) was higher than that of Taiwanese participants ($M = 3.72, SD = 1.53$). Since controlling for age and annual family income yielded a similar pattern of results, we dropped these variables from the final model for parsimony (see [Supplemental Materials Section 2](#)).

Instruments

Actual and Ideal Affect. As in Study 1, participants’ actual and ideal affect were measured using the AVI (Tsai et al., 2006). Again, α s were comparable with Study 1 for actual HAP (α : European Americans = .71; Taiwanese = .87), ideal HAP (α : European Americans = .76; Taiwanese = .86), actual LAP (α : European Americans = .84; Taiwanese = .78), and ideal LAP (α : European Americans = .80; Taiwanese = .83).

Trust Game. As in Study 1, participants first played the No-Reputation Trust Game, followed by the Reputation Trust Game. The Reputation Trust Game was similar to that used in Study 1, but instead of trustworthiness, participants received information about targets’ competence in the following form: “X% of people said that this player is competent.” The percentage (X%) was between 15% and 25% for low competence targets, between 45% and 55% for moderate competence targets, and between 75% and 85% for high competence targets.

Procedure

Procedures were the same as in Study 1.

Data Analyses and Results

Are There Cultural Differences in Ideal Affect and Transfers to Excited, Calm, and Neutral Targets in the No-Reputation Trust Game?

To ensure that European Americans valued HAP states more than Taiwanese and that we could replicate previous results with the Trust Game in the current sample, participants completed the AVI and the No-Reputation Trust Game. Consistent with Study 1, European Americans valued HAP states more than Taiwanese but did not differ in how much they valued LAP states (see [Supplemental Materials Section 10](#)), and the results of the No-Reputation Trust Game trials were similar to those of Study 1 (see [Figure 4](#), left, and [Supplemental Materials Section 5](#)): European Americans transferred more to calm and excited than neutral targets; Taiwanese transferred more to calm and neutral than to excited targets, and European Americans transferred more to excited targets and less to calm and neutral targets than did Taiwanese.

Does Targets’ Competence Reputation Change Transfers to Excited, Calm, and Neutral Targets?

To examine whether Study 1 findings held for competence reputational information, we conducted a 2 (between subjects, Participant Culture: European American, Taiwanese) \times 3 (within subjects, Target Emotional Expression: excited, calm, neutral), \times 3 (within subjects, Target Reputation: low competence, moderate competence, high competence) repeated measures ANOVA on ipsatized transfers. All post hoc pairwise comparisons were conducted using Tukey’s HSD test. As in [Park et al. \(2017\)](#), we excluded participants (14 European Americans, four Taiwanese) who did not vary their responses across trials (see [Supplemental Materials Section 1](#) for findings with full sample). This resulted in a final sample of 108 European Americans (63.0% female, 33.3% male, 3.7% NA) and 100 Taiwanese (70% female, 30% male). Based on the power analyses described above, we had sufficient statistical power to proceed with our analyses.

As in Study 1, there was a significant main effect of Target Reputation, $F(2, 412) = 318.91, p < .001, \eta^2 = 0.61$, and a significant Participant Culture \times Target Emotional Expression interaction, $F(2, 412) = 18.47, p < .001, \eta^2 = 0.08$. However, also consistent with Study 1, these effects and interaction were qualified by a significant Participant Culture \times Target Emotional Expression \times Target Reputation interaction, $F(4, 824) = 4.53, p = .001, \eta^2 = 0.02$ (see [Supplemental Materials Section 6](#) for all means and standard errors). As in Study 1, we decomposed this interaction by cultural group.⁸

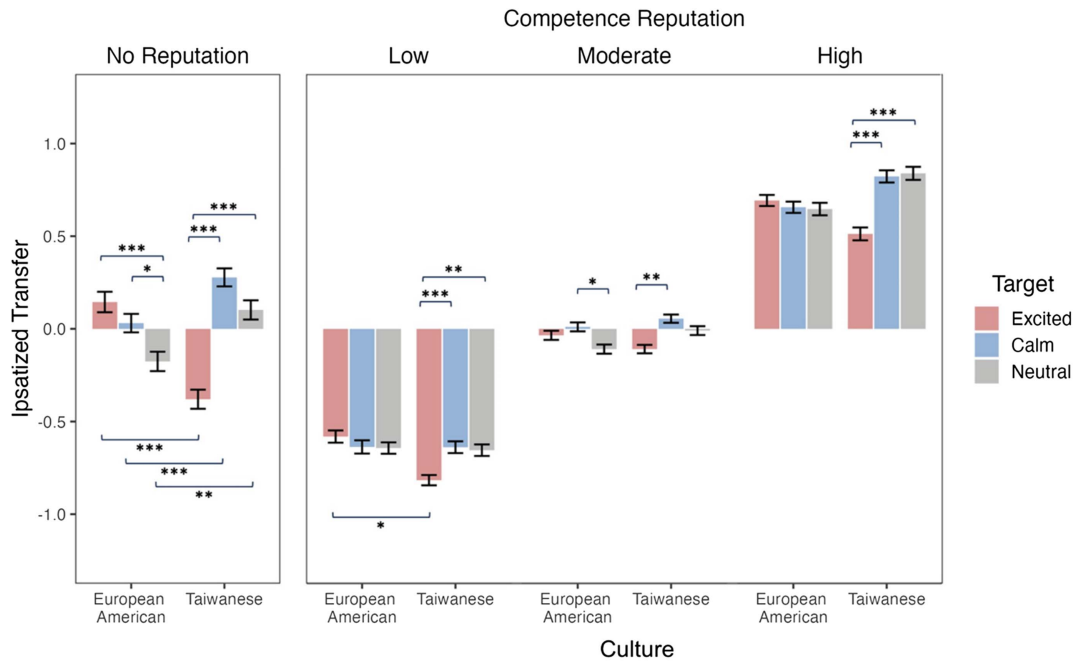
Consistent with the “emotional expression signals reputational status” hypothesis, when targets’ competence reputations were moderate, European Americans transferred more to calm than neutral targets (calm vs. neutral: $p = .036, 95\% \text{ CI } [0.005, 0.24], d = 0.17$), with excited targets falling in the middle. However, when targets’ competence reputations were clearly low or high, European Americans transferred *similar* amounts to excited, calm, and neutral targets (low: all pairwise comparisons $p \geq .644$; high: all pairwise comparisons $p \geq .863$).

Also consistent with Study 1 and the “emotional expression signals reputational status” hypothesis, when targets’ reputations were moderate, Taiwanese transferred more to calm than excited targets, and when targets’ reputations were clearly low or high, Taiwanese transferred as much to neutral targets as they did to calm targets. However, as in Study 1 and consistent with the “emotional expression and reputation are distinct” hypothesis, *across all levels of reputation, Taiwanese transferred the least to excited targets*, low reputation: calm versus excited— $p < .001, 95\% \text{ CI } [0.06, 0.30], d = 0.26$; neutral versus excited— $p = .002, 95\% \text{ CI } [0.04, 0.28], d = 0.23$; moderate reputation: calm versus excited— $p = .001, 95\% \text{ CI } [0.04, 0.28], d = 0.24$; high reputation: calm versus excited— $p < .001, 95\% \text{ CI } [0.19, 0.43], d = 0.45$; neutral versus excited— $p < .001, 95\% \text{ CI } [0.21, 0.45], d = 0.47$ (see [Figure 4](#)). Moreover, the magnitudes of the differences between Taiwanese transfers to calm versus excited targets with high competence ($d = .45$) and to neutral versus excited

⁸ As in Study 1, there was a significant main effect of Target Emotional Expression, $F(2, 412) = 8.80, p < .001, \eta^2 = 0.04$, and a significant Target Reputation \times Target Emotional Expression interaction, $F(4, 824) = .96, p < .001, \eta^2 = 0.03$, but because they were not directly related to the two hypotheses tested here and were qualified by the significant Participant Culture \times Target Reputation \times Target Emotional Expression interaction, we do not discuss them further.

Figure 4

Ipsatized Transfers to Excited, Calm, and Neutral Targets by Participant Cultural Group in No-Competence Reputation (Left) and Competence Reputation Trust Games (Right) in Study 2



Note. Error bars represent ± 1 standard error of the mean. To account for the possibility of response style bias, we ipsatized the raw transfer amounts as in Study 1. Significant within-culture comparisons are represented by asterisks above the x -axis, and significant between-culture comparisons are represented by asterisks below the x -axis (see Supplemental Materials Section 6). See the online article for the color version of this figure.

* $p < .05$. ** $p < .01$. *** $p < .001$.

targets with high competence ($d = .47$) in this study were similar to those of the differences between Taiwanese transfers to calm versus excited targets with high trustworthiness ($d = .48$) and to neutral versus excited targets with high trustworthiness ($d = .41$) in Study 1.

Discussion

Providing information about targets' competence in this study yielded a pattern of results that was strikingly similar to the pattern that emerged when we provided information about targets' trustworthiness in Study 1, even though competence is less associated with smiling than trustworthiness. When targets' competence reputations were moderate or unknown, participants trusted targets whose emotional expressions matched their ideal affect more (calm vs. others for Taiwanese, smiling vs. neutral for European Americans). When targets' competence reputations were clearly good or bad, European Americans no longer preferred smiling to neutral targets, and Taiwanese invested equally in calm and neutral targets. These findings are consistent with the "emotional expression signals reputational status" hypothesis. However, as in Study 1, unlike European Americans, Taiwanese continued to invest in excited targets *the least*, regardless of their reputation level of competence, which is consistent with the "emotional expression and reputational status are distinct" hypothesis.

Study 3: Targets' Past Behavior

Studies 1 and 2 suggest that even when told explicitly that excited targets are trustworthy and competent, Taiwanese trust and invest in

excited targets less than calm and neutral targets, suggesting that excited smiles signal more than trustworthiness or competence in the context of investment and resource sharing among Taiwanese. Therefore, in the third study, we examined whether we could increase trust for excited targets among Taiwanese if we provided direct information about targets' past return behavior, or how much targets actually reciprocated in previous Trust Games. Our assumption was that previous behavior would be the most direct indication of a target's traits relevant to investment and resource sharing.

Hypotheses

Consistent with the "emotional expression signals reputational status" hypothesis, we predicted that when targets returned part of the investment *half* the time (moderate past return), Taiwanese would transfer more to calm than excited and neutral targets. However, when a targets' past return behavior was clearly low (returned part of the investment a minority of times) or high (returned part of the investment a majority of times), Taiwanese would transfer similar amounts to calm, neutral, and excited targets. Although the main purpose of this study was to see if we could increase Taiwanese trust for the excited targets, we also included European Americans. We predicted that when the targets' past return behavior was moderate, European Americans would transfer more to calm and excited than neutral targets, but when a targets' past return behavior was low or high, European Americans would

transfer similar amounts to calm, excited, and neutral targets, as in Studies 1 and 2.

Method

Participants

For our power analysis, we used the effect size found in Study 1 for the three-way Participant Culture \times Target Emotional Expression \times Target Reputation interaction ($\eta^2 = 0.01$). The effect size was relatively smaller in Study 1 than in Study 2 ($\eta^2 = 0.02$), and we wanted to be conservative in our estimate. This yielded a minimum total sample size of 184. One hundred twelve European American (57.1% female, 38.4% male, 4.5% NA) and 110 Taiwanese (60.0% female, 40.0% male) students were recruited from university paid pools for a study titled “Psychology of Decision-Making.” Participants were recruited using the same methods and criteria as reported in Study 1.

The cultural groups did not differ by gender, $\chi^2(1) = 0, p = 1.00$, but did differ in age ($B = 2.07, SE = .21, z = 10.04, p < .001$), with European Americans ($M = 25.30, SD = 3.61$) being older than Taiwanese ($M = 21.16, SD = 2.40$). The groups also differed in annual family income ($B = 1.22, SE = .12, z = 10.01, p < .001$), with European Americans having higher annual family income ($M = 6.12, SD = 1.87; 1 \leq \$10,000, 2 = \$10,001–\$20,000, 3 = \$20,001–\$30,000, 4 = \$30,001–\$40,000, 5 = \$40,001–\$50,000, 6 = \$50,001–\$75,000, 7 = \$75,001–\$100,000, 8 > \$100,000$) than Taiwanese ($M = 3.68, SD = 1.68$). Since controlling for age and annual family income yielded a similar pattern of results, we dropped these variables from the final model for parsimony (see [Supplemental Materials Section 2](#)).

Instruments

Actual and Ideal Affect. Aggregates for actual HAP (α : European Americans = .85; Taiwanese = .83), ideal HAP (α : European Americans = .77; Taiwanese = .81), actual LAP (α : European Americans = .84; Taiwanese = .82), and ideal LAP (α : European Americans = .79; Taiwanese = .75) were high and comparable to previous studies.

Trust Game. To reduce the length of the study, we did not administer the No-Reputation Trust Game in Study 3. The Past Behavior Trust Game was similar to the Reputation Trust Game used in Studies 1–2, but participants were told about the percentage of times that the target returned half of what they received in previous trials (e.g., low past return behavior: “18% of times they gave back half of what they received,” moderate past return behavior: “51% of times they gave back half of what they received,” high past return behavior: “80% of times they gave back half of what they received”).

Procedure

The procedures were the same as in Study 1, with one exception: As mentioned above, we did not include the No-Reputation Trust Game.

Data Analyses and Results

Are There Cultural Differences in Ideal Affect?

Consistent with Studies 1–2, we found that European Americans valued HAP states more than Taiwanese but did not differ in how

much they valued LAP states (see [Supplemental Materials Section 10](#) for details).

Does Targets’ Past Behavior Change Transfers to Excited, Calm, and Neutral Targets?

To examine whether our findings would change when we provided information about targets’ past return behavior, we conducted a three-way repeated measures ANOVA on ipsatized transfers to test the interaction between Participant Culture (between subjects: European American, Taiwanese), Target Emotional Expression (within subjects: excited, calm, neutral), and Target Past Behavior (within subjects: low past return behavior, moderate past return behavior, high past return behavior). All post hoc pairwise comparisons were conducted using Tukey’s HSD test. As in [Park et al. \(2017\)](#), we excluded participants (six European Americans, three Taiwanese) who did not vary their responses across trials, although the results were similar when we included all participants (see [Supplemental Materials Section 1](#)). This resulted in a final sample size of 106 European Americans (59.4% female, 37.7% male, 2.8% NA) and 107 Taiwanese (59.8% female, 40.2% male). Based on the power analyses described above, we had sufficient statistical power to proceed with our analyses.

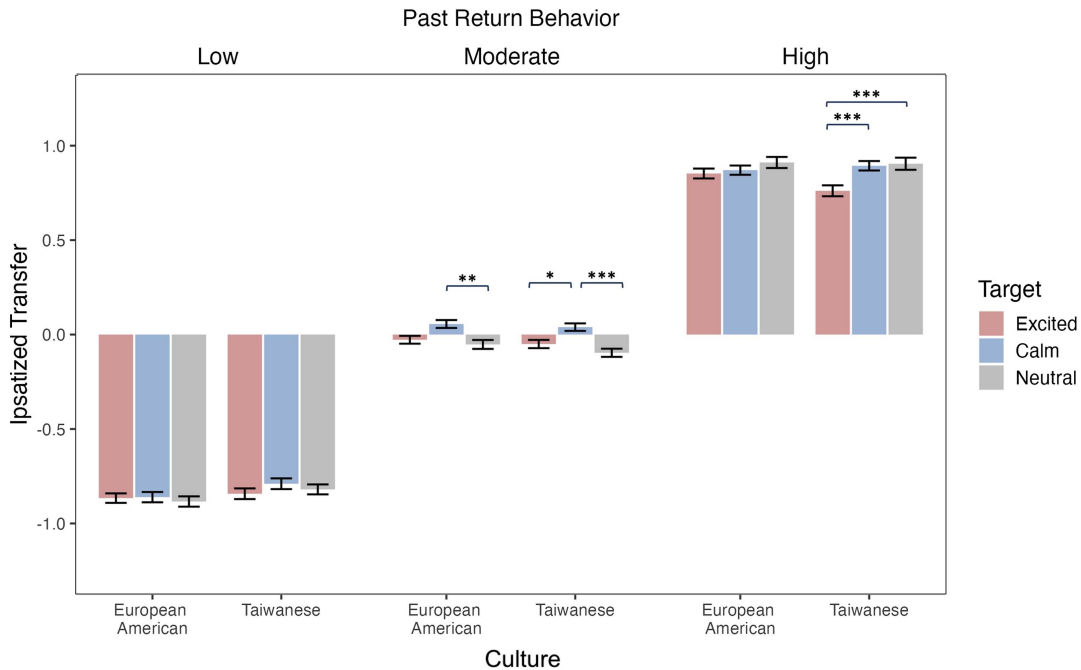
Although there was a significant main effect of Target Past Behavior, $F(2, 422) = 668.57, p < .001, \eta^2 = 0.76$, unlike Studies 1 or 2, the Participant Culture \times Target Emotional Expression interaction was not significant, $F(2, 422) = 1.53, p = .217$, and neither was the Participant Culture \times Target Emotional Expression \times Target Past Behavior interaction, $F(4, 844) = 1.51, p = .198$. Because we were specifically interested in whether Taiwanese’s trust for excited targets would increase when they were provided with information about targets’ past return behavior, we conducted planned pairwise comparisons despite this nonsignificant interaction (see [Figure 5](#) for results, and [Supplemental Materials Section 6](#) for means and standard errors).⁹

As predicted, Taiwanese transferred significantly more to calm than both excited and neutral targets when targets’ past return behavior was moderate (or uncertain; moderate past return behavior: calm vs. excited— $p = .046, 95\% \text{ CI } [0.001, 0.18], d = 0.15$; calm vs. neutral— $p < .001, 95\% \text{ CI } [0.05, 0.22], d = 0.23$). Moreover, for the first time, Taiwanese transferred *similar* amounts to excited as calm and neutral targets in the low past return behavior condition. However, among targets with high past return behavior, Taiwanese participants *still* transferred more to both calm and neutral targets than excited targets (high past return behavior: calm vs. excited— $p < .001, 95\% \text{ CI } [0.04, 0.22], d = 0.22$; neutral vs. excited— $p < .001, 95\% \text{ CI } [0.05, 0.23], d = 0.24$) although an examination of the effect sizes revealed that the difference in transfers to calm and excited targets was now about *half* the size of the differences in transfers to calm and excited targets in Studies 1 and 2 (among high reputation targets: calm vs. excited— $d = 0.48$ for Study 1 and $d = 0.45$ for Study 2; excited vs. neutral— $d = 0.41$ for Study 1 and $d = 0.47$ for Study 2). Thus, providing information about targets’ past return behavior increased Taiwanese investment in excited targets compared to providing information about targets’ trustworthiness or competence.

⁹ As in previous studies, there was a significant main effect of Target Emotional Expression, $F(2, 422) = 7.94, p < .001, \eta^2 = 0.04$, and a significant Target Past Behavior \times Target Emotional Expression interaction, $F(4, 844) = 11.50, p < .001, \eta^2 = 0.05$, but we do not discuss these further for the same reasons.

Figure 5

Ipsatized Transfers to Excited, Calm, and Neutral Targets by Participant Cultural Group in the Past Return Behavior Trust Game in Study 3



Note. Error bars represent ± 1 standard error of the mean. To account for the possibility of response style bias, we ipsatized the raw transfer amounts. Significant within-culture comparisons are represented by asterisks above the x-axis, and significant between-culture comparisons are represented by asterisks below the x-axis (see Supplemental Materials Section 6). See the online article for the color version of this figure.

* $p < .05$. ** $p < .01$. *** $p < .001$.

Even though the purpose of Study 3 was to examine whether we could increase transfers to excited targets among Taiwanese, we also examined what effect this type of information had on European Americans. Consistent with the “emotional expression signals reputational status” hypothesis, for European Americans, as in Studies 1 and 2, when targets’ past return behavior was moderate, European Americans transferred more to calm than neutral targets (calm vs. neutral: $p = .007$, 95% CI [0.02, 0.20], $d = 0.18$), with excited targets falling in the middle. However, when targets’ past return behavior was low or high, European Americans transferred similar amounts to excited, calm, and neutral targets (low: all pairwise comparisons $p \geq .977$; high: all pairwise comparisons $p \geq .421$). As in Studies 1 and 2, these results were consistent with the “emotional expression signals reputational status” hypothesis for European Americans.

Discussion

Consistent with the “emotional expression signals reputational status” hypothesis, Taiwanese showed expression preferences when past return behavior was moderate, but when past return behavior was low, for the first time, Taiwanese treated excited targets like calm and neutral ones. When targets’ past return behavior was clearly high, Taiwanese still transferred more to calm and neutral targets than excited ones, consistent with the emotional expression and reputational status are distinct hypotheses, but these differences were smaller than those in Studies 1 and 2. Thus, by providing direct

information about targets’ past behavior, we were able to increase Taiwanese’s trust for excited targets although still not to the same levels as their trust for calm and neutral targets.

European Americans’ transfers were consistent with Studies 1 and 2. Consistent with the “emotional expression signals reputational status” hypothesis, when targets’ past return behaviors were moderate, European Americans transferred more to calm than neutral targets with excited targets in the middle. When targets’ past return behaviors were clearly good or bad, European Americans did not differentiate among calm, excited, and neutral targets.

Study 4: Targets’ Emotional Stability

In Study 3, we showed that when we provided explicit information about targets’ past return behavior, this reduced Taiwanese’s distrust of excited targets. In the next study, we wondered if we could provide trait-relevant reputational information that would directly address Taiwanese participants’ concerns about the excited targets. Previous research (Albright et al., 1997) and our own findings suggest that Taiwanese view excited targets as less emotionally stable compared to Americans, even though both Taiwanese and European Americans view calm targets as more emotionally stable than neutral and excited targets (see Supplemental Materials Section 11). Therefore, in the final study, we examined whether providing reputational information about

targets' emotional stability would reduce Taiwanese participants' distrust of excited targets even more.

Hypotheses

Consistent with the “emotional expression signals reputational status” hypothesis, we predicted that when emotional stability reputation was moderate, Taiwanese would transfer more to calm than neutral or excited targets. However, we predicted that when targets' emotional stability reputations were clearly low or high, Taiwanese would transfer similar amounts to excited as calm and neutral targets, or at least transfer more to excited targets than they did in Studies 1–2. For European Americans, we predicted the same patterns as in Studies 1–3.

Method

Participants

For our power analysis, we again used the effect size found in Study 1 for the three-way Participant Culture \times Target Emotional Expression \times Target Reputation interaction ($\eta^2 = 0.01$). The effect size was relatively smaller in Study 1 than in Study 2 ($\eta^2 = 0.02$), and we wanted to be conservative in our estimate. This yielded a minimum total sample size of 184. One hundred twenty-four European American students from Stanford University (66.1% female, 29.0% male, 4.8% NA) and 109 Taiwanese students from National Chengchi University (67.0% female, 31.2% male, 1.8% NA) were recruited for a study titled “Psychology of Decision-Making.” Recruitment methods and criteria were the same as Studies 1 and 2.

The cultural groups did not differ by gender, $\chi^2(1) = 0.004$, $p = .952$, or age ($B = -0.21$, $SE = .19$, $z = -0.08$, $p = .282$; European Americans: $M = 22.59$, $SD = 2.58$, Taiwanese: $M = 23.00$, $SD = 3.24$) but did differ in annual family income (1 \leq \$10,000, 2 = \$10,001–\$20,000, 3 = \$20,001–\$30,000, 4 = \$30,001–\$40,000, 5 = \$40,001–\$50,000, 6 = \$50,001–\$75,000, 7 = \$75,001–\$100,000, 8 $>$ \$100,000; $B = 1.31$, $SE = .12$, $z = 11.15$, $p < .001$). European American participants' annual family income ($M = 6.68$, $SD = 1.66$) was higher than that of Taiwanese participants ($M = 4.04$, $SD = 1.79$). Since controlling for annual family income yielded a similar pattern of results, we dropped this variable from the final model for parsimony (see [Supplemental Materials Section 2](#)).

Instruments

Actual and Ideal Affect. The α s for the actual HAP (α : European Americans = .83; Taiwanese = .75), ideal HAP (α : European Americans = .82; Taiwanese = .80), actual LAP (α : European Americans = .79; Taiwanese = .85), and ideal LAP (α : European Americans = .81; Taiwanese = .85) were high and comparable to previous studies.

Trust Game. As in Studies 1 and 2, participants first played the No-Reputation Trust Game (from Study 1), followed by the Reputation Trust Game. The Reputation Trust Game was similar to that of Studies 1 and 2, but instead of trustworthiness or competence, participants received information about targets' emotional stability in the following form: “X% of people said that this player is emotionally stable.” The percentage (X%) was between 15% and 25% for targets

with low emotional stability, between 45% and 55% for targets with moderate emotional stability, and between 75% and 85% for targets with high emotional stability.

Procedure

Procedures were the same as in Studies 1 and 2.

Data Analyses and Results

Are There Cultural Differences in Ideal Affect and Transfers to Excited, Calm, and Neutral Targets During the No-Reputation Trust Game?

Consistent with Studies 1–3, European Americans valued HAP states more than Taiwanese, and the cultural groups did not differ in how much they valued LAP states (see [Supplemental Materials Section 10](#)). Similarly, the results of the No-Reputation Trust Game trials were almost identical to those of Studies 1 and 2: European Americans transferred more to calm and excited than neutral targets; Taiwanese transferred more to calm than excited or neutral targets, and European Americans transferred more to excited and less to calm and neutral targets compared to Taiwanese (see [Figure 6](#), left, and [Supplemental Materials Section 5](#)).

Does Targets' Emotional Stability Reputation Change Transfers to Excited, Calm, and Neutral Targets?

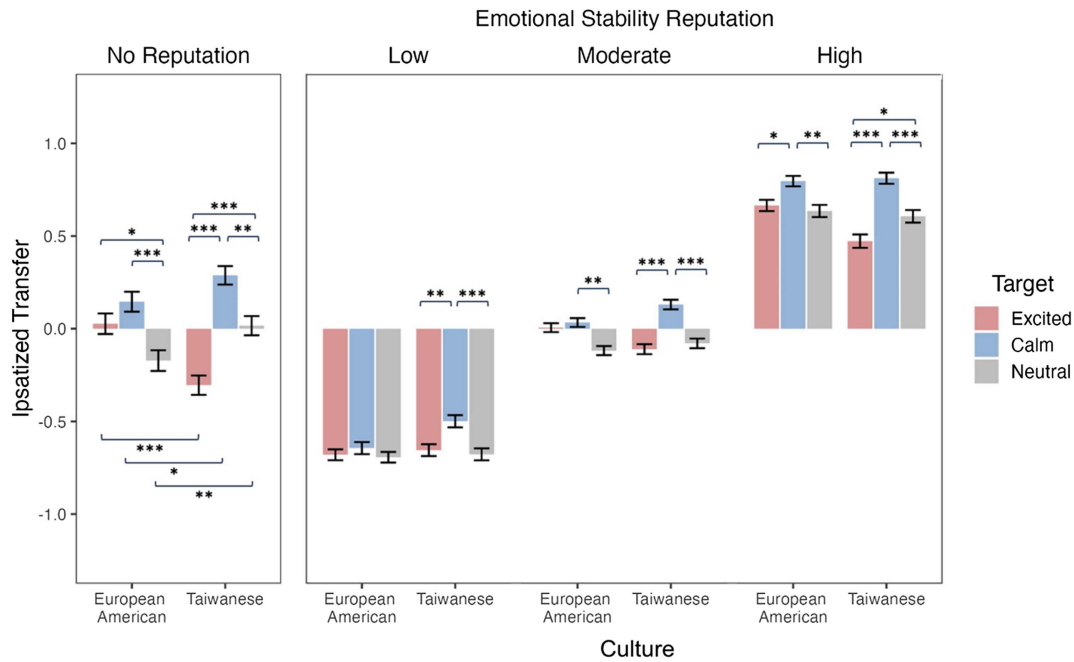
We conducted a three-way repeated measures ANOVA on ipsatized transfers to test the interaction between Participant Culture (between subjects: European American, Taiwanese), Target Emotional Expression (within subjects: excited, calm, neutral), and Target Reputation (within subjects: low emotional stability, moderate emotional stability, high emotional stability). All post hoc pairwise comparisons were conducted using Tukey's HSD test. As in [Park et al. \(2017\)](#), we excluded participants (11 European Americans, six Taiwanese) who did not vary their responses across trials although the results were similar when we included the full sample (see [Supplemental Materials Section 1](#)). Thus, the final sample size included 113 European Americans (66.4% female, 29.2% male, 4.4% NA) and 103 Taiwanese (68.0% female, 31.1% male, 1% NA). Based on the power analyses described above, we had sufficient statistical power for our analyses.

As in Studies 1 and 2, there was a significant main effect of Target Reputation on transfers, $F(2, 428) = 355.16$, $p < .001$, $\eta^2 = 0.62$, and a significant Participant Culture \times Target Emotional Expression interaction, $F(2, 428) = 6.53$, $p = .002$, $\eta^2 = 0.03$. These effects and interactions were qualified by a marginally significant Participant Culture \times Target Emotional Expression \times Target Reputation interaction, $F(4, 856) = 2.26$, $p = .061$, $\eta^2 = 0.01$ (see [Figure 6](#) for results, and [Supplemental Materials Section 6](#) for means and standard errors). Because we were specifically interested in transfers to the excited targets, we broke this interaction down by cultural group.¹⁰

¹⁰ In addition, there was a significant main effect of Target Emotional Expression, $F(2, 428) = 25.43$, $p < .001$, $\eta^2 = 0.11$, and a significant Target Reputation \times Target Emotional Expression interaction, $F(4, 856) = 5.82$, $p < .001$, $\eta^2 = 0.03$, as in Studies 1–3, but we do not discuss them further for the same reason.

Figure 6

Ipsatized Transfers to Excited, Calm, and Neutral Targets by Participant Cultural Group in No-Reputation (Left) and Emotional Stability Reputation Trust Games (Right) From Study 4



Note. Error bars represent ± 1 standard error of the mean. To account for the possibility of response style bias, we ipsatized the raw transfer amounts. Significant within-culture comparisons are represented by asterisks above the x-axis, and significant between-culture comparisons are represented by asterisks below the x-axis (see [Supplemental Materials Section 6](#)). See the online article for the color version of this figure.

* $p < .05$. ** $p < .01$. *** $p < .001$.

As predicted, Taiwanese transferred more to calm than excited and neutral targets when their emotional stability reputations were moderate. However, Taiwanese transferred equally to excited and neutral targets when their emotional stability reputations were low, replicating Study 3 results. Also similar to Study 3, while Taiwanese still transferred more to neutral over excited targets when targets' emotional stability reputations were high, the difference in transfers to excited versus neutral targets was smaller in this study ($d = 0.19$) than in Studies 1 ($d = 0.41$) and 2 ($d = 0.47$) and even in Study 3 ($d = .24$). In other words, even though they transferred more to neutral targets, Taiwanese did transfer more to excited targets when they were told that targets were highly emotionally stable compared to when they were told that targets were highly trustworthy or competent.

That said, unexpectedly, Taiwanese showed a clear preference for calm over excited and neutral targets regardless of their emotional stability reputations (low reputation: calm vs. excited— $p = .008$, 95% CI [0.03, 0.29], $d = 0.22$; calm vs. neutral— $p = .001$, 95% CI [0.05, 0.31], $d = 0.25$; moderate reputation: calm vs. excited— $p < .001$, 95% CI [0.11, 0.37], $d = 0.34$; calm vs. neutral— $p < .001$, 95% CI [0.08, 0.34], $d = 0.29$; high reputation: calm vs. excited— $p < .001$, 95% CI [0.21, 0.47], $d = 0.47$; calm vs. neutral— $p < .001$, 95% CI [0.08, 0.33], $d = 0.29$; neutral vs. excited— $p = .037$, 95% CI [0.005, 0.26], $d = 0.19$; see [Supplemental Materials Section 6](#) for means and standard deviations). Thus, among Taiwanese, just providing information about targets' emotional stability, even when it was low, gave calm targets a boost compared to excited and neutral ones.

For European Americans, consistent with the “emotional expression signals reputational status” hypothesis and Studies 1 and 2, when targets' emotional stability reputations were moderate, European Americans transferred more to calm than neutral targets (calm vs. neutral: $p = .006$, 95% CI [0.03, 0.27], $d = 0.21$) and marginally more to excited than neutral targets (excited vs. neutral: $p = .050$, 95% CI [2e-6, 0.25], $d = 0.17$). When targets' emotional stability reputation was low, European Americans transferred equally to calm, excited, and neutral targets (all pairwise comparisons $p \geq .862$). When reputation was high, European Americans transferred as much to neutral as they did to excited targets; however, unlike previous studies, European Americans also transferred more to calm than neutral and excited targets, who did not differ from each other (calm vs. neutral: $p = .003$, 95% CI [0.04, 0.28], $d = 0.23$; calm vs. excited: $p = .029$, 95% CI [0.008, 0.26], $d = 0.18$). This pattern suggests that even for European Americans, calm targets received a boost from the high emotional stability reputation information. This is the first time that European Americans prioritized smiles over reputational information in this series of studies.

Discussion

In sum, we examined whether providing information about targets' emotional stability—a characteristic that European American and Taiwanese participants saw as varying between excited and calm targets—increased Taiwanese's trust of excited

versus calm and neutral targets. In the low reputation condition, Taiwanese treated excited and neutral targets similarly (as in Study 3), and although Taiwanese *still* trusted excited targets less than neutral targets among high reputation targets, the difference in trust toward excited and neutral targets was half the size of that observed in Studies 1 and 2 and was even lower than that observed in Study 3. Thus, providing emotional stability reputation information *did* make Taiwanese invest in excited targets more.

Somewhat unexpectedly, calm targets also received a boost among Taiwanese *across emotional stability reputation levels* so that Taiwanese invested more in them compared to previous studies. In other words, we found even more evidence for the “emotional expression and reputational status are distinct” hypothesis for Taiwanese, but this time for calm targets, likely because calm faces signal emotional stability more than excited and neutral faces do (see [Supplemental Materials Section 11](#)).

Interestingly, unlike Studies 1–3, providing emotional stability reputation information increased trust of calm targets with high reputation among European Americans as well, suggesting at least one case where European Americans also prioritize emotional expression over reputational status.

Transparency and Openness Statement

All procedures were approved by the Stanford University Institutional Review Board under the protocol title “Psychology of Decision-Making” (IRB-34588). All study materials, including preregistrations, stimuli, data, and analysis code have been made publicly available on the Open Science Framework at <https://osf.io/9xt3k/>. While we preregistered our hypotheses related to cultural differences in ideal HAP, we did not preregister hypotheses regarding the relationship between targets’ reputation and emotional expression (“emotional expression and reputational status are distinct” and “emotional expression signals reputational status”), which were derived from competing hypotheses in the literature, as described above.

General Discussion

Being able to judge someone’s trustworthiness matters not only for small decisions like whom to sit next to on the train but also for bigger ones like whom to hire for a job. Previous work suggests that people base their decisions on whether targets’ emotional expressions match their ideal affect. Indeed, in the four studies reported here, we replicated previous findings that, consistent with cultural differences in ideal HAP, European Americans transferred more to excited targets than did Taiwanese in the No-Reputation Trust Games in Studies 1, 2, and 4. These findings are consistent with those of [Krys et al. \(2016\)](#), which observed in a sample of 44 nations that the less nations valued in-group collectivism and hierarchy, the more honest they rated targets with excited smiles (vs. targets with neutral expressions). In the present studies, European Americans also transferred less to calm targets than did Taiwanese.

The main purpose of the present work, however, was to examine whether providing information about targets’ reputations for being trustworthy, competent, and emotionally stable altered European American and Taiwanese participants’ investment in excited, calm, and neutral targets in multiple trials of the Trust Game. We tested

two hypotheses: (1) the “emotional expression signals reputational status” and (2) the “emotional expression and reputational status are distinct” hypotheses and found support for both.

Support for the “Emotional Expression Signals Reputational Status” Hypothesis

Both European Americans and Taiwanese relied on reputation information when deciding how much to trust targets: Overall, they invested more in targets with higher reputations and less in targets with lower reputations. Furthermore, when the reputational information was clear (i.e., low or high), that information mattered more than targets’ emotional expressions, although the degree to which it mattered varied by cultural group.

When European Americans had no reputational information about targets (i.e., during the No-Reputation Trust Game) or when targets’ reputational information was unclear (i.e., targets with moderate reputations in the Reputation Trust Game), European Americans trusted smiling (i.e., excited and calm) targets more than nonsmiling neutral ones. However, when they had clear information about targets’ trustworthiness, competence, and past return behavior, European Americans trusted nonsmiling neutral targets as much as smiling (i.e., calm and excited) ones. In other words, targets’ smiles no longer mattered once targets’ reputations were clear.

Similarly, when Taiwanese had no information about targets’ reputations (i.e., during the No-Reputation Trust Game) or when targets’ reputations were unclear (i.e., targets with moderate reputations in the Reputation Trust Game), Taiwanese trusted calm targets more than neutral or excited targets. However, when they were given clear information about targets’ trustworthiness, competence, and past return behavior, they—like European Americans—trusted nonsmiling neutral targets as much as calm smiling ones. Together, these findings support the hypothesis that *emotional expressions signal reputational status*.

Support for the “Emotional Expression and Reputational Status Are Distinct” Hypothesis

However, even with information about targets’ reputations, it was difficult for Taiwanese to invest in excited smiling targets as much as calm and neutral ones. In Studies 1 and 2, although Taiwanese invested in excited targets who were rated as highly trustworthy and competent more than excited targets without this reputational information, they still did not invest as much in them as they did in highly trustworthy and competent neutral and calm targets. These findings suggest that for Taiwanese, targets’ emotional expression partly signals their trustworthiness and competence but also provides additional information relevant to investment. These findings support the “emotional expression and reputational status are distinct” hypothesis for Taiwanese.

In Studies 3 and 4, we tried to increase the extent to which Taiwanese trusted excited smiling targets. When Taiwanese were given direct information about targets’ past return behavior in Study 3, Taiwanese continued to trust excited targets less than neutral and calm ones, but this difference was smaller than in Studies 1 and 2. Similarly, in Study 4, when we provided information about targets’ emotional stability, Taiwanese continued to trust excited targets less than neutral targets, but again, the difference was smaller, suggesting that knowing about targets’ past return behavior and emotional stability alleviated some but not all of Taiwanese participants’

concerns about excited targets relative to neutral ones. The persistence of these concerns is consistent with research showing that East Asian contexts have “tighter” social norms than Western contexts (e.g., Bond & Smith, 1996; Gelfand et al., 2011; Talhelm & English, 2020).

Interestingly, in Study 4, information about targets’ emotional stability increased Taiwanese’s trust of calm targets across reputation levels and European American’s trust of calm targets with high reputations. These findings provide even more evidence for the “emotional expression and reputational status are distinct” hypothesis for Taiwanese and first-time support for this hypothesis for European Americans. Future studies should examine whether there are other conditions when emotional expression matters more than reputational information for European Americans.

Implications for AVT

The findings have important implications for AVT. First, they are part of a growing number of studies examining the conditions under which ideal affect match matters more or less for consequential behaviors like investment. As mentioned above, in previous work, we observed that deliberation, or slowing down the decision process, minimally reduced the effects of ideal affect match on resource sharing (Blevins et al., 2024). In another series of studies, we observed that in the context of leadership choice, European Americans and Hong Kong Chinese were more likely to choose leaders whose expressions matched their cultural ideals when organizations were undergoing growth but not during crisis (Bencharit et al., 2024). The present work adds to these studies by examining the effects of having additional information about targets. Taken together, these findings suggest that ideal affect match effects may vary depending on situational moderators, highlighting the importance of considering multiple factors when examining the influence of ideal affect on behavior and decision making in the real world. Indeed, the current investigation is part of increasing interest in the situational moderators of cultural differences in emotion (Ma et al., 2018).

Second, these studies demonstrate that while cultural differences in self-reports of ideal affect and affective preferences are consistent, they are not completely the same. Across the four studies and in other studies (Tsai et al., 2024), European Americans consistently valued HAP states more than Taiwanese, and their transfers to excited targets during the No-Reputation Trust Game mimicked these differences. The groups, however, did not differ in ideal LAP; yet, when examining whom they trusted, Taiwanese transferred more to calm targets than did European Americans during the No-Reputation Trust Games in Studies 1, 2, and 4. These findings suggest that while European Americans value LAP states more than before (Tsai et al., 2024), these increases in ideal LAP may not have the same behavioral consequences as they do in East Asian contexts. Future studies should examine the links between self-reported ideal affect and actual behavior.

Implications for Research on Culture, Smiles, and Trust

The current work is novel in its combination of theory and methods from cultural psychology, affective science, sociology, and behavioral economics; therefore, it fills important gaps in each of these literatures. First, while most research has either focused on characteristics of the judge *or* characteristics of the target in predicting trust, the current work examines how characteristics of

the judge (i.e., their culture and ideal affect) *and* target (i.e., their emotional expressions and reputations) *interact* to influence investment decisions. Second, although previous research suggests that smiles signal trust, only a handful of studies have examined how this varies across cultures (Krys et al., 2016; Matsumoto & Kudoh, 1993; Ozono et al., 2010; Rychlowska et al., 2015; Tsai et al., 2019), and even fewer have examined the behavioral consequences of these differences (Park et al., 2017, 2020; Tsai et al., 2019). Guided by AVT, we illustrate how cultural differences in ideal affect predict which targets European Americans and Taiwanese are more likely to invest in, with European Americans investing more in excited targets than Taiwanese.

Third, our findings also suggest cultural differences in the meaning of the excited smile. This is consistent with Rychlowska et al. (2015): In historically heterogeneous countries like the United States, smiles are believed to signal social bonding motives more (e.g., “wants to be a close friend”) whereas for historically homogeneous countries like Taiwan, smiles may signal other, less affiliative motives as well (e.g., hierarchical motives such as “wants to manipulate or control you”) or emotional instability as in the current research. Future studies should examine the other ways in which European Americans and East Asians may differ in their views of excited smiles.

Fourth, while previous research has examined how targets’ general reputations influence how much people trust them, none have examined the effect of different kinds of reputation information on trust in different cultures. Our findings suggest that while information about targets’ trustworthiness and competence is sufficient for European Americans in deciding whom to trust and invest more in, Taiwanese may additionally benefit from receiving information about targets’ past behavior and emotional stability to make those decisions.

Finally, the current research sheds new light on classic questions about the role of reputation on trust in U.S. and East Asian cultures and broadens the scope to include characteristics of targets such as their emotional expressions. Specifically, the current research suggests that while reputation matters in both the United States and in parts of East Asia, it may matter more than emotional expression in the United States. Consistent with Thomson et al. (2018), one possible explanation for our findings is that European Americans may have lower barriers to trusting others than East Asians since European Americans have more fluid in-groups and out-groups. Indeed, this may explain why European Americans give more to strangers than East Asians (Yamagishi, Jin, & Miller, 1998) and why in the present studies, just having reputational information about neutral targets was enough for European Americans to trust them as much as smiling targets. However, it may be more difficult for Taiwanese (and other East Asians) to trust excited smiling targets, even those with high reputations, because they have higher barriers to trusting strangers. Indeed, future research is needed to explore these possibilities.

Practical Implications

Our findings have several practical implications. First, they reinforce the importance of soliciting direct information about targets’ trustworthiness and other relevant characteristics rather than relying solely on targets’ emotional expressions. Second, they demonstrate cultural differences in how people use emotional and reputational cues when investing resources, suggesting the need for culturally sensitive interventions to combat affective biases in resource allocation. Finally,

our findings reveal a potential source of miscommunication between U.S. and East Asian contexts: while U.S. Americans and other individuals who show big broad toothy smiles may be intending to express trustworthiness and competence, their excited smiles may also be interpreted as emotionally unstable in Taiwanese and other East Asian settings.

Limitation and Future Directions: Constraints on Generality

While our studies shed light on cultural similarities and differences in the basis of trust and resource sharing, there are limitations that raise interesting questions for future research. First, our trust measure was based on participant transfers in the Trust Game, an important measure of financial investment. Future research should explore whether these patterns hold in real-world settings, such as in lending and hiring contexts, where ideal affect match has already been shown to drive decisions (Park et al., 2017; Sims et al., 2014, 2018).

Second, our studies used computer-generated facial stimuli, which allowed us to control and manipulate emotional expressions with precision. When we tested how our stimuli faces were perceived in a separate sample, that sample viewed some expressions as less natural and creepier than others (see Supplemental Materials Section 11). Despite this, the pattern of findings in the present studies was consistent with previous work using similar paradigms (Blevins et al., 2024). Still, future research should investigate whether our findings generalize to human faces in real-world settings.

Third, the reputation information was presented as being based on previous participants' ratings. It is possible that the reputational information may have had a stronger effect on Taiwanese's trust of targets if it had been provided by close others rather than other study participants (Yamagishi & Yamagishi, 1994). Future research should explore this possibility.

Finally, it would be interesting to examine whether reputational information increases trust for targets with different negative expressions. This would be consistent with Schug et al. (2010), in which overall emotional expressivity predicted cooperation during a behavioral economic game. Future research should of course include other cultures as well.

Despite these limitations, we found both cultural similarities and differences in the cues that people use to trust strangers. While both European Americans and Taiwanese trusted and invested more in targets with better reputations, when targets' reputations were unknown, they trusted and invested in targets whose emotional expressions more closely matched their ideal affect. There were cultural differences as well: When targets' reputations were clearly good or bad, targets' reputations mattered more than their emotional expressions for European Americans, suggesting that for them, emotional expressions primarily signal reputational status. This was only partly true for Taiwanese: Information about targets' reputations could not completely override Taiwanese participants' relative distrust of excited targets, revealing cultural differences in the meaning of excited smiles.

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