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The Roles of Entitativity and Essentiality in Judgments of Collective Responsibility

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Two studies investigated the roles of entitativity and essentiality in judgments of collective responsibility. Analyses focused on four group types (i.e. intimacy groups, task groups, social categories, and loose associations). Repeated measures analyses revealed that intimacy groups and task groups were rated highest in entitativity while intimacy groups and social categories were rated highest in essentiality. Correlational analyses revealed that entitativity played a more central role in judgments of collective responsibility for all four group types. However, tests of interaction effects revealed that essentiality moderated the effect of entitativity on blame judgments. Implications of the role of collective responsibility in intergroup relations are discussed.

KEYWORDS collective responsibility, entitativity, essentialism, lay theories, intergroup relations

SHOULD parents be held responsible for the bad acts of their children? Were all Germans to blame for the Holocaust? Are all the employees of a company accountable for the criminal acts of a few coworkers? Are all Palestinians to blame for the act of a single suicide bomber? Each of these questions concerns group-based, or collective, responsibility. The formal legal system provides one answer to such questions and, with few exceptions, holds responsible and punishes only the direct causal agents of a bad act. However, a growing body of research indicates that lay people cast a broader net in assigning blame. In many instances, lay people appear to believe that shared group membership with a wrongdoer is a basis for blame.

Collective responsibility refers to how perceivers assign blame to individuals who were not direct causal agents of negative events but

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do share a social association with a wrongdoer (e.g. Chiu & Hong, 1992; Hamilton, 1978; Lickel, Schmader, & Hamilton, 2003; Sanders et al., 1996; Shultz, Jaggi, & Schleifer, 1987). Such judgments of collective responsibility are of theoretical and practical interest because they frequently play a role in intergroup hostility and aggression. For example, Israelis may assign responsibility to the Palestinian people as a whole for the acts of a single suicide bomber. Conversely, Palestinians may blame all Israeli citizens for the acts of the government and military.

In this paper, we will introduce a folk theoretical perspective that will provide answers to two central questions concerning lay notions of groups and responsibility that underlie such judgments. First, for which kinds of groups are perceivers more likely to make judgments of collective responsibility? Our opening examples came from quite different groups. Is it reasonable to argue that lay people assess responsibility for a social category (such as 'Germans') in the same manner as for a family or work group? The two studies presented in this paper are the first to systematically address this question. Second, from the lay person's point of view, what is the 'glue' (Hamilton, Sherman, & Rodgers, 2004) that makes a particular social association worthy of collective blame? We will empirically examine two folk theories, group *entitativity* and group *essentiality,* that lay perceivers may use when making such judgments. Each of these folk theories is a plausible basis for a lay person to assign collective responsibility—the current empirical research is the first to our knowledge to clearly differentiate the roles of entitativity and essentiality in judgments of collective responsibility.

Collective responsibility in different types of groups

We opened this paper by asking how lay people think about collective responsibility in very different types of groups. Is it reasonable to argue that a single framework for group-based responsibility can be applied to such different types of groups such as nationality, family, and company? Certainly, it seems that these groups differ in many respects and past research indicates that perceivers possess an implicit folk taxonomy distinguishing between four types of groups (Lickel et al., 2000; Lickel, Hamilton, & Sherman, 2001). These four group types are intimacy groups (e.g. friends, families), social categories (e.g. women, Jews), task groups (e.g. a jury, co-workers), and loose associations (e.g. people in line at a bank, people who like classical music).

These different types of groups in the folk taxonomy are to some degree mirrored in how social psychologists have divided their field of study with close relationships researchers focusing on intimacy groups, organizational scholars focusing on task groups, and stereotyping and social identity researchers focusing on social categories (and perhaps, with techniques like the minimal group paradigm, loose associations). Some scholars who focus on studying how people think about social category memberships might argue that the application of collective responsibility to such groups is of a completely different nature than applying responsibility to a task or intimacy group. We argue that there may be important lay theories used in collective responsibility judgments, such as entitativity and essentiality, which cut across different group memberships. However, we agree that such a claim requires evidence. Therefore, in our studies, we will examine how entitativity and essentiality predict collective responsibility judgments across different types of groups (e.g. task groups versus social categories) but also within a particular type of group (e.g. among different social categories).

Entitativity and collective responsibility

Social psychologists have long been interested in the social influence of interpersonal and intragroup relationships on people's behavior (Asch, 1955; Cialdini, 2000; Hovland, Janis, & Kelley, 1953; Janis, 1971; Milgram, 1974; Moscovici & Zavalloni, 1969; Sherif, 1966). However, lay people appear to also have a strong (if imperfect) understanding of the

effects of social influence on behavior. We argue that *folk* theories of social influence play a key role in collective responsibility judgments. Furthermore, we argue that group *entitativity* is tightly connected, if not synonymous, with perceptions of social influence within a group. The term entitativity was coined by Campbell (1958) to describe the degree to which groups are perceived as coherent entities. Campbell's analysis essentially applied visual gestalt principles (e.g. physical similarity, common movement, boundedness, etc.) to groups and the first subsequent work on entitativity (Knowles, 1976) kept to this perspective. Some later work stressed ideas of homogeneity or the behavioral consistency of group members (e.g. Castano & Yzerbyt, 1998; McConnell, Sherman, & Hamilton, 1997; McGarty, Haslam, Hutchinson, & Grace, 1995).

However, another line of recent work has sought to differentiate entitativity from perceptions of group member homogeneity and to define entitativity in terms of the perceived interdependence of group members, rather than their similarity. For example, Gaertner and Schopler (1998) defined entitativity as the interconnection of group members and showed that social interaction influenced the extent to which people saw an ingroup (and a relevant outgroup) as high in entitativity. Welbourne (1999) argued for a distinction between behavioral consistency versus the coordination of group members' goals and actions; her research indicated that perceptions of high levels of joint goals and coordinated action had information-processing effects that high levels of behavioral consistency did not. Lickel et al. (2000) examined the extent to which a variety of variables predicted perceptions of entitativity and found that variables related to group member interdependence (e.g. interaction, common goals) were strongly related to perceptions of entitativity, whereas other relevant variables such as the group's size, its permanence, and the impermeability of membership in the group were much less strongly related to perceptions of entitativity. Thus, many (though certainly not all) researchers' working definitions of entitativity revolve around the idea of perceived interdependence among group members. One value of such a definition is that it is fairly distinct from other concepts such as group-member homogeneity or, as we will discuss, essentiality.

Furthermore, entitativity (defined in terms of interdependence) has been shown to predict group-based responsibility. In our research of people's judgments of collective responsibility for the Columbine High School shootings, we found that entitativity predicted the extent to which different groups were blamed for the actions of the shooters (Lickel et al., 2003). Lickel et al. (2003) did not analyze the data by group type, but did find that groups rated higher in entitativity were assigned greater levels of collective responsibility than groups rated lower in entitativity. For example, intimacy groups such as the killers' parents and friendship group (i.e. the Trenchcoat mafia) were rated highest in entitativity and collective responsibility while less entitative loose associations (e.g. people in their neighborhood) were rated lower in both variables. This research also showed that two inferences about group social influence by fellow group members may explain why collective responsibility is linked to entitativity. These inferences—responsibility by omission (failure to prevent the bad act) and commission (indirectly encouraging it)—were both predicted by ratings of entitativity of the group. However, for some groups that were peers of the shooters, commission was a stronger predictor of responsibility, whereas for groups with an authority relationship to the shooters (such as their families) omission was more important. Thus, although both omission and commission were related to perceptions of entitativity, they were not simply synonymous with it. The studies of the Columbine shootings provided a starting point for investigating the role of entitativity in collective responsibility judgments. However, the studies were bound by particular details of the Columbine shootings. More important, those studies did not contrast entitativity with other variables that might account for responsibility judgments. In particular, perceptions of essentiality were not considered. Thus, we focus on the contrast between entitativity and essentiality in the current research.

Essentiality and collective responsibility

Lay theories of essentiality generally refer to perceptions of a 'deep', inalterable, biological quality that gives rise to surface features. Drawing on work examining people's understanding of other biological objects (e.g. Atran, 1994; Malt, 1995; Medin, 1989), social psychologists have begun to consider the extent to which lay people think of some groups as defined by an underlying essence. Allport (1954) first noted the importance of essentiality in social categories and its potential role in prejudice. More recently, Rothbart and Taylor (1992) argued that social categories are perceived as natural kinds (objects with an underlying essence as opposed to being human artifacts). Lickel et al. (2000) examined two variables (the group's duration and its impermeability) derived from Rothbart and Taylor's (1992) analysis and found these variables to be distinct from perceptions of entitativity. Haslam and colleagues (Haslam, Rothschild, & Ernst, 2000, 2002; Rothschild & Haslam, 2003) have also argued that lay perceivers use essentialism as an explanatory mechanism for social categories. Furthermore, they developed a two-factor scale for assessing essentialist beliefs about social categories. The 'natural kinds' dimension (which most closely resembles conceptualizations of essentiality) consists of beliefs in the naturalness, immutability, historical invariance, permeability, and prerequisite features of groups. They demonstrated that essentiality varies across social categories, with 'women' (for example) rated high on the natural kinds dimension, while 'midwesterners' rated low on the natural kinds dimension.

Empirical work suggests that essentiality might play a role in collective responsibility judgments. For example, essentiality is associated with dispositional judgments (Yzerbyt, Corneille, & Estrada, 2001; Yzerbyt, Rocher, & Schadron, 1997) and sexual prejudice (Haslam et al., 2002), suggesting that perceivers do indeed use a folk theory of essence to infer information about group members. It is believed that perceivers use essence as an explanatory mechanism by attributing features of the group to all members (Yzerbyt, et al., 1997). It is conceivable that if a perceiver believes that social categories all possess a deep genotypic similarity, s/he may infer that all members of the social category may behave in a similar manner when placed in a similar situation. The perceiver might also believe that the other members of the group possess the same bad character as the actor, and be blamed for being 'bad people'. Thus, for either of these reasons, essentiality might lead to group blame for the act of the wrongdoer. Another indirect piece of evidence comes from the individual difference literature, which demonstrates that perceivers who believe individual humans possess an unalterable fixed nature (i.e. an essence) are more likely to punish moral transgressors than individuals who believe in malleable human nature (Chiu, Dweck, Tong, & Fu, 1997).

However, it remains unclear whether lay theories of essentiality simply influence dispositional judgments or whether they influence group blame and responsibility judgments as well. While previous research (Lickel et al., 2003) has demonstrated that the entitativity of a group may influence judgments of collective responsibility, it is less clear that essentiality influences these perceptions and judgments. For instance, while lay theories of entitativity relate to the functioning of the group and the degree of social influence exerted by group members (see Lickel et al., 2000, 2003; Moreland & McMinn, 2004), lay theories of essentiality do not provide such information.

Yzerbyt and colleagues (Yzerbyt et al., 2001; Yzerbyt & Rocher, 2002) have discussed instances in which entitativity and essentiality are capable of bidirectional influence. Therefore, in addition to our main analyses, we also explored whether entitativity and essentiality would have an interactive effect on judgments of collective responsibility. While such effects have not been tested before, we found it plausible that essentiality could magnify the effects of entitativity. If one believes that group members are both interdependent and possess a shared essence, then judgments of collective

responsibility might be especially strong. In such cases, group members are perceived as simultaneously being 'in cahoots' and 'cut from the same cloth'.

Study 1

The first goal of Study 1 was to examine whether perceivers believe that membership in different types of groups (i.e. intimacy groups, task groups, social categories, and loose associations) generally entails different levels of collective responsibility. Based on past research (Lickel et al., 2000, 2003) we predicted that groups highest in perceived entitativity (i.e. intimacy groups) would be rated highest in degree of collective responsibility followed by task groups, social categories, and loose associations.

Our second goal was to more closely examine the extent to which participants' perceptions of entitativity of the groups would predict collective responsibility. In our past research on entitativity (Lickel et al., 2000), we found that perceptions of entitativity were strongly related to perceptions of the degree of interdependence among members of the group. Thus, as in our analysis of the Columbine shootings (Lickel et al., 2003), our operational definition of entitativity revolved around the idea of perceived social interdependence among group members. However, there are other group variables, notably group size, and essentialist variables (i.e. duration and permeability) that might also account for differences among groups in collective responsibility. We chose to operationalize essentiality with these latter two variables because previous writings and research have demonstrated that a key feature of essentialism is a notion of 'inalterability' (Haslam et al., 2000; Lickel et al., 2000; Rothbart & Taylor, 1992). Thus, Study 1 attempted to tease apart the contributions of entitativity and essentiality to judgments of collective responsibility.

Method

Participants Study participants were 211 University of California, Santa Barbara students who participated in the study for partial completion of a class requirement. Gender was not assessed.

Materials and procedure Participants were instructed that they would be completing a survey of their perceptions of different social groups. Participants were presented with the questionnaire packet and asked to work through it at their own pace.

The questionnaire packet contained 15 rating tasks, each page of which assessed participants' judgments of a different group property (e.g. group size, collective responsibility, etc.) to be rated on a 9-point scale with labeled anchors. For each judgment task, participants were presented with a list of the same 30 groups. The sample of 30 groups presented to participants was selected from past research on perceptions of group entitativity and the folk taxonomy of group types (Lickel et al., 2000). These group types are intimacy groups (e.g. romantic partners, close friends), task groups (e.g. jury, airline flight crew), social categories (e.g. Blacks, citizens of Poland), and loose associations (e.g. people who like classical music, people waiting at a bus stop). The 30 groups were presented in a different order for each rating task. Four different versions of the questionnaire were developed that placed the rating tasks in random orders in the packet.

Collective responsibility Participants' perceptions of the degree to which membership in each group entailed *collective responsibility* read as follows: 'Rate how responsible a member of the group should feel if another member of the group committed a serious negative act'. Because it may be construed that asking participants to judge how blameworthy a group member should feel if a group member commits a wrong-doing only assesses one aspect of collective responsibility, we ran two follow up studies ($N = 50$ in each study) in which we assed two different collective responsibility items in comparison to the one used in the studies in the present paper. Specifically, participants in the first follow-up sample rated 'how blameworthy a member of the group should be considered'

while a separate group of participants in another follow up sample rated 'how much the wrongdoer's group should be blamed' if a group member committed a wrongdoing. We then computed means for each of the 30 groups in these two new samples and correlated these means with the group means for the 'should feel responsible' item from Study 1. These two new items correlated highly with our 'feel' item ($r = .94$, $p < .001$, and $r = .91$, $p < .001$), for the first and second follow up samples respectively. Thus, it is clear that the collective responsibility item used in Studies 1 and 2 is highly correlated with other items that more blatantly assess collective blame.

Entitativity Participants' perceptions of the degree of interdependence among members of the 30 groups were assessed with six items. These consisted of ratings of the degree of *interaction* ('For each group, we would like your opinion about the extent to which the people in the group interact with each other'), *behavioral influence* ('the degree to which the behavior of individuals in the group can be controlled or influenced by other people in the group'), *norms* ('the degree to which the group has formal and informal rules'), *interpersonal bonds* ('the degree to which you think there are strong interpersonal bonds among the people in the group'), *shared knowledge* ('the degree to which the members of the group share knowledge and information'), and *common goals* ('the extent to which the people in the group have common goals') among members of each of the 30 groups.

Essentiality Participants rated the *duration* ('the extent to which each group is a long-term or short-term group'), and *permeability* ('Groups that are easy to join and leave are very permeable, whereas groups that are difficult to join and leave are not very permeable. For each group below, rate how permeable the group is') of the 30 groups.

Participants also rated the *homogeneity* ('the degree to which the members of the group are likely to possess the same personality traits and abilities'), *size*, and the extent to which each of the target groups '*qualified as a group*'. The 'qualify as a group' item was a general measure of entitativity used in prior research (Lickel et al., 2000).

Omission and commission Participants' justifications of *omission* were assessed as follows: 'Rate the degree to which members of the group should be expected to prevent others in the group from committing serious negative acts'. Justifications of *commission* were assessed with the following statement: 'Rate the degree to which it would be suspected that a member of the group might have contributed in some way to a serious negative act committed by another member of the group'.

Results

To examine our hypotheses, we conducted three sets of analyses. First, we conducted repeated measures analyses to examine the extent to which the four types of groups (i.e. intimacy groups, task groups, social categories, and loose associations) were perceived to differ in collective responsibility, entitativity, and essentiality. Second, we examined the extent to which entitativity predicted judgments of collective responsibility while teasing out the effects of other group properties (size and group-member homogeneity) and essentialist variables (duration and permeability). Third, because previous research has demonstrated that entitativity may influence perceptions of essentiality and vice versa (see Yzerbyt et al., 2001; Yzerbyt & Rocher, 2002), we examined possible interactive effects of these two dimensions on collective responsibility.

Repeated measures analyses As previously discussed, we selected groups based on past research (Lickel et al., 2000) distinguishing four different types of groups (i.e. intimacy groups, task groups, social categories, and loose associations). We present results based on the cluster assignments for these groups identified in past research (Lickel et al., 2000). However, we did verify that the same group clusters could be identified with the present data. The results of these clustering analyses on the present data

did replicate (with some minor exceptions) the results of our past research. The patterns of means and the significance of differences do not differ when using the clusters generated from the present analysis.

In order to examine participants' beliefs about the different types of groups, we created composite ratings for each variable for each group. We then ran a repeated measures analysis of variance using 'type of group' as the independent variable to examine the extent to which the four types of groups differed with respect to collective responsibility, entitativity, and essentiality. We created an essentiality composite of duration and permeability ratings ($\alpha = .62$) and an entitativity composite (interaction, behavioral influence, interpersonal bonds, common goals, shared knowledge, and norms; $\alpha = .89$).

Figure 1 presents the means by group type. As predicted, there was a main effect for group type on entitativity ($F(3,208) = 1026.80$, $p < .001$). Post hoc analyses revealed that intimacy groups were rated highest in entitativity, followed by task groups, social categories, and loose associations (all $ps < .05$). There was also a main effect of group type on collective responsibility ($F(3,208) = 325.95$, $p < .001$). Consistent with our hypothesis that groups rated higher in entitativity should be rated higher in collective responsibility, the pattern of means paralleled the pattern for entitativity ($ps < .05$) except the difference between social categories and loose associations. Also as expected, groups differed in essentiality (i.e. duration and permeability) ($F(3,207) = 36.45$, $p < .001$). Participants rated intimacy groups and social categories higher in essentiality than task groups and loose associations ($ps < .05$). Task groups, in turn, were rated higher in essentiality than loose associations. Intimacy groups and social categories did not differ from each other in essentiality.

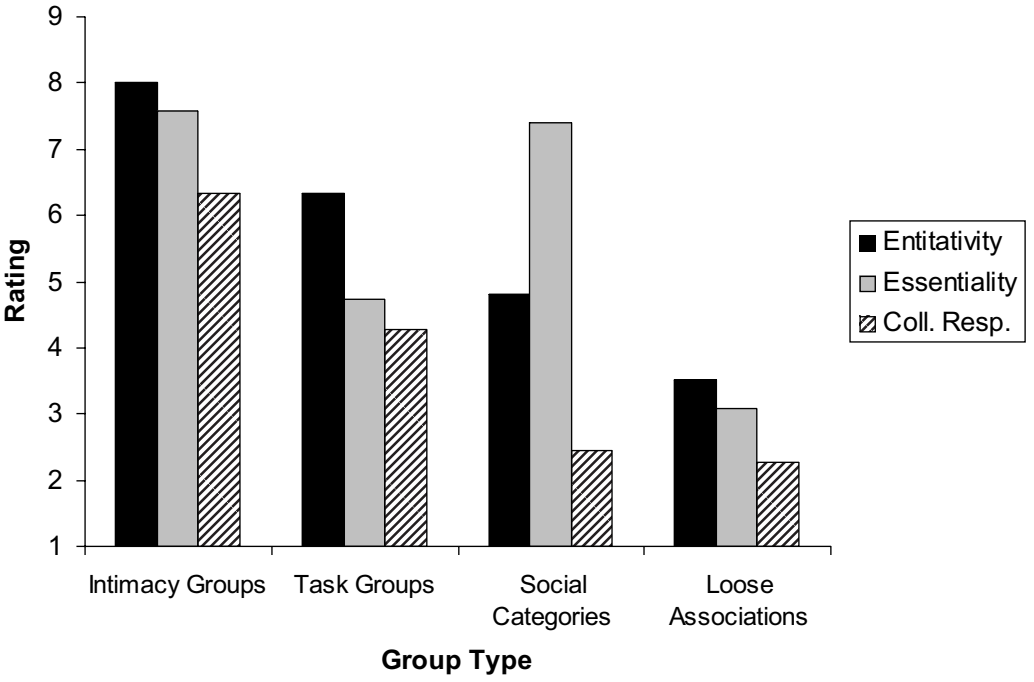

Figure 1. Ratings of entitativity, essentiality (composite of duration and permeability), and collective responsibility as a function of group type, Study 1.

Entitativity and essentiality predicting collective responsibility We first examined the zero-order correlations among the key variables of interest. Because each participant rated all 30 groups, it was necessary to account for dependence of observations when examining these correlations. Zero-order correlations between all the rating tasks were calculated for each participant, which created 211 correlation matrices (one for each participant). The median correlations were then obtained. Entitativity and essentiality were moderately correlated ($r = .50$, $p < .001$). Entitativity and essentiality were both correlated with collective responsibility (rs = .43, $p < .001$ and .20, $p < .05$, respectively).

Our second question concerned the extent to which entitativity or essentiality uniquely predicted ratings of collective responsibility. Because each participant in the study rated each of the 30 groups on each of the variables, the study has a nested correlational design. Because of this nested design, we used hierarchical linear modeling (HLM; Raudenbush & Bryk, 2001) as our analytic method. HLM is a statistical method that takes into account the dependent, hierarchical nature of data. In the current study, group ratings (level-1 model) are nested within individuals (level-2 model). For these analyses, which utilized the HLM software package (Bryk, Congdon, Cheong, & Raudenbush, 2000), models were specified with a random effect for variables (e.g. they were free to vary), when analysis of variance components revealed significant variability. Taking this individual variation into account, mean slopes for each variable of interest were computed across individuals. All variables were participant centered, entered as participant centered predictors and *Z*-transformed, such that standardized coefficients are reported throughout this paper. Nine participants were removed from analyses due to missing data on at least one variable rating, leaving a final sample size of 202 participants.

In this first set of HLM analyses, group size, homogeneity, essentiality, and entitativity were entered as predictors of collective responsibility. Results of this analysis confirm that, controlling for other factors that might account for collective responsibility ratings, perceptions of entitativity accounted for a significant portion of the variance in participants' ratings. Thus, size ($\gamma = -.21$, $p < .001$), homogeneity ($\gamma = .10$, $p < .001$), and essentiality ($\gamma = .06$, $p < .001$) each had a smaller role than entitativity ($\gamma = .42$, $p < .001$) when all variables were entered as predictors of collective responsibility ratings. These results indicate that entitativity plays a unique role in predicting people's judgments of collective responsibility. It should be noted that this present analysis uses those group properties that we propose lay people are directly relying upon to assess a group's entitativity. However, the results are parallel when using the distal 'qualify as a group' variable rather than the composite. When used in lieu of the composite measure of entitativity, this variable was a significant predictor of collective responsibility ($\gamma = .29$, $p < .001$) when controlling for size, essentiality, and group-member homogeneity.

Entitativity as a predictor within different types of groups The preceding analysis shows that, across different types of groups, entitativity is a predictor of collective responsibility. However, a reader might question the extent to which this is driven by high ratings of collective responsibility for intimacy and task groups, with no meaningful variation in collective responsibility for social categories or loose associations. One way to examine this is to focus analyses within each group type. Thus, for example, insofar as there is variation in how much collective responsibility is applied to different social categories, is this variation predicted by ratings of entitativity?

To examine variation in the strength of relationship between entitativity and collective responsibility within each of the four group types, we conducted separate HLM models for each of the four group types. Entitativity significantly predicted variation in collective responsibility among the intimacy groups ($\gamma = .17$, $p < .01$), task groups ($\gamma = .33$, $p < .001$), social categories ($\gamma = .17$, $p < .01$), and loose associations ($\gamma = .22$, $p < .001$), when controlling for homogeneity, size, and essentiality (Figure 2). Thus, entitativity is a predictor not only of between group-type differences (e.g. it explains

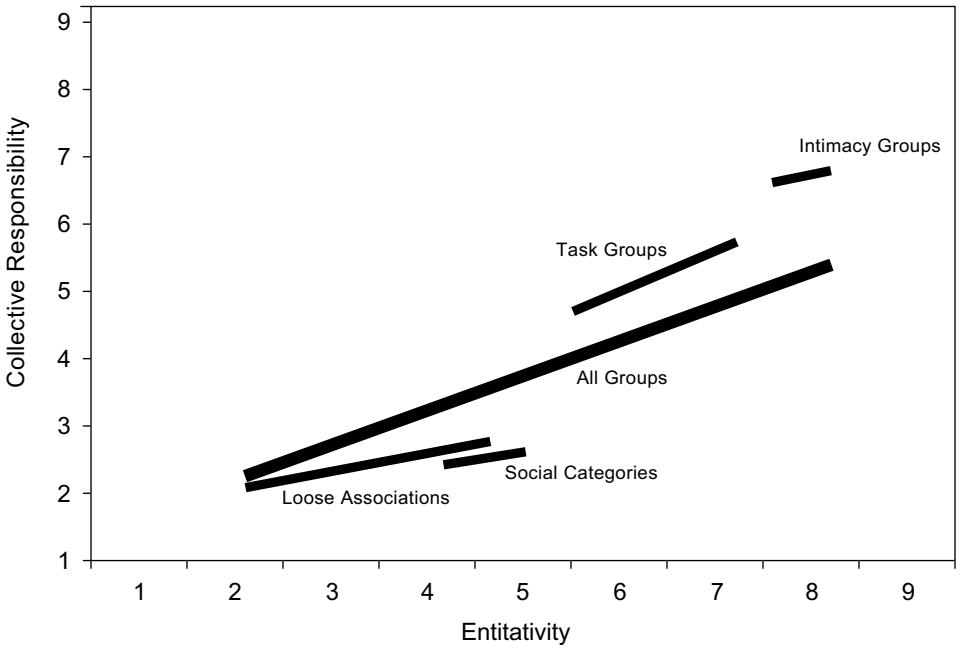

Figure 2. Relationship between entitativity and collective responsibility. Slopes represent partial coefficients, controlling for homogeneity, size, duration, and permeability for each group type, Study 1. The length of each line indicates the range of means of entitativity ratings for the groups in each group type.

the differences between task groups and social categories) it is also a predictor of within group-type differences (e.g. differences among social categories).

The interactive effects of entitativity and essentiality Finally, to investigate the possible interactive effects of entitativity and essentiality (Yzerbyt et al., 2001, Yzerbyt & Rocher, 2002), we conducted a set of analyses that included an Essence × Entitativity interaction term. The interaction term significantly predicted judgments of collective responsibility ($\gamma = .04$, $p = .001$). Post hoc analyses of simple slopes (Aiken & West, 1991; Bauer & Curran, in press) revealed that the effect of entitativity on collective responsibility was greatest at high levels of essentiality (one *SD* above the mean) ($\gamma = .62$, $p < .01$). This relationship remained significant but weakened at mean levels of essentiality ($\gamma = .58$, $p < .001$), and low levels of essentiality (one *SD* below the mean) ($\gamma = .54$, $p < .001$). It should be noted that due to the correlational nature of our data, it is equally possible that entitativity moderates the effects of essentiality on collective responsibility or vice versa. However, because prior analyses in Study 1 revealed entitativity (but not essentiality) to be a significant predictor of collective responsibility, we focused on the moderating role of essentiality on the effects of entitativity on collective responsibility judgments.

In a secondary set of analyses, we examined the extent to which participants' ratings of the appropriateness of applying justifications of commission and omission were related to entitativity, essentiality, and collective responsibility. Because lay perceivers use entitativity information to explain the functioning of groups, it was hypothesized that entitativity, but not essentiality, would predict variability in inferences of omission and commission. Entitativity was

moderately correlated with omission (r = .64, p < .001), and commission (r = .51, p < .001). Essentiality was weakly correlated with omission (r = .24, p < .001), and commission (r = .25, p < .001). These results suggest that lay perceivers may use entitativity information when making judgments of collective responsibility to a greater degree than essentialist beliefs. However, when entered simultaneously and controlling for size and homogeneity, entitativity predicted omission (γ = .44, p < .001), and commission (γ = .32, p < .001), but essentiality only weakly predicted justifications of commission (γ = .07, p < .01), and not omission.

Discussion

The results of Study 1 supported all of our hypotheses concerning judgments of collective responsibility. Our first goal was to demonstrate that different types of groups (Lickel et al., 2000) differ in the extent to which perceivers believe that membership in the group entails collective responsibility. In support of this, intimacy groups were highest in collective responsibility, followed by task groups, and then by social categories and loose associations. We also demonstrated the role of entitativity in predicting judgments of collective responsibility both between and within each group type. Finally, we demonstrated that the effects of entitativity on collective blame increase with increasing perceptions of essentiality.

Study 2

The primary purpose of Study 2 was to conceptually replicate and extend the findings from Study 1. There were several limitations to Study 1. First, we did not use equivalent numbers of different types of groups (i.e. people rated different numbers of social categories and task groups). In Study 2, participants rated five of each of the four types of groups. Furthermore, we operationalized both essentiality and entitativity somewhat differently in order to examine the conceptual generalizability of the effects we found in Study 1. In Study 2, we used an established measure of entitativity and essentialist beliefs (Haslam et al., 2000). Haslam et al.'s (2000) scale was designed to assess perceptions of essentiality in social categories. Their scale contains two subscales. One, indexing the extent to which the social category is viewed as a 'natural kind', is most similar to how we defined essentiality in our introduction (and to the index of duration and impermeability in Study 1). The second subscale is referred to as 'entitativity' and consists of questions assessing informativeness, inherence, uniformity, and exclusivity. We were interested in the extent to which this entitativity subscale would be consistent with the items we used in Study 1. Thus, Study 2 uses a different sample of groups as well as a different operationalization of essentiality and entitativity in order to provide a robust replication of Study 1.

Method

Participants Study participants were 80 University of Southern California students (60 females, 20 males) who volunteered for extra psychology course credit. There were no gender differences on the entitativity, essentiality, and collective responsibility measures both within group type or for the four group types combined.

Materials and procedure Participants were instructed that they would be completing a survey of their perceptions of different social groups. As in Study 1, participants were presented with the questionnaire packet with one rating task per page and asked to work through it at their own pace. There were 14 rating tasks. For each judgment task, participants were presented with a list of the 20 groups to be rated on 9-point scales with labeled anchors. The sample of 20 groups presented to participants was selected from past research (Lickel et al., 2000), such that participants were presented with five of each group type (e.g. intimacy groups, social categories, etc.). Examples of the groups included a local street gang (intimacy group), cast of a play (task group), citizens of Poland (social category), and people in a movie audience (loose association). As in Study 1, the groups were presented in a different order for each rating scale.

Collective responsibility, omission, and commission These items were identical to those used in Study 1.

Entitativity Six items assessed perceptions of group entitativity. These were the four items from Haslam et al.'s (2000) scale that loaded on their entitativity factor and two items from our previous research (Lickel et al., 2003). The items from Haslam et al.'s (2000) scale assessed the uniformity of group members (uniformity), inductive potential of group membership (informativeness), the degree to which group members share an underlying reality (inherence), and the extent to which membership in the group precludes membership in other groups (exclusivity). Two items from Study 1 (interaction and common goals) were also used to assess perceptions of entitativity. These six items formed a reliable composite ($\alpha = .82$).

Essentiality To assess perceptions of essentiality, the five items from Haslam et al.'s (2000) essentialist beliefs scale that correspond to the 'natural kinds' dimension were administered. These items assessed group boundaries (discreteness), the naturalness of the group (naturalness), degree to which a member could become a non-member (immutability), historical invariance (stability), and degree to which the group is defined by necessary features (necessity). Because the immutability and historical invariance items were fairly equivalent to the wording of the permeability and duration items used in Study 1, we did not include these Study 1 items in Study 2. The five items formed a fairly reliable scale ($\alpha = .67$).

Results

Repeated measures analyses Our first hypothesis was that the four group types (intimacy groups, task groups, social categories, and loose associations) would differ in terms of perceived essentiality, entitativity, and collective responsibility. As in Study 1, we conducted repeated measures analyses of variance with group type as the single repeated measures factor. The four types of groups differed in collective responsibility ($F(3,77) = 172.91$, $p < .001$), entitativity ($F(3,77) = 147.12$, $p < .001$), and essentiality ($F(3,77) = 134.26$, $p < .001$) (Figure 3). Post hoc analyses revealed that intimacy groups were rated highest in collective responsibility followed by task groups, social categories, and loose associations (all ps $< .05$). This same pattern was observed for entitativity (all ps $< .05$). As predicted, social categories were rated higher (ps $< .05$) in essentiality than task groups and loose associations, and were equivalent to intimacy groups. These patterns replicated Study 1.

Entitativity and essentiality predicting collective responsibility We hypothesized that perceptions of entitativity contain information for the lay perceiver about the actual functioning of social relationships within the group, while perceptions of essentiality do not provide this information. Thus, perceived entitativity should be associated with increased judgments of collective responsibility, but essentiality should be weakly or not at all associated with such judgments. As in Study 1, we used HLM to account for the nested nature of our data. One participant was removed from analyses due to incomplete data.

Median zero-order correlations between all the rating tasks were calculated for each participant. Entitativity was moderately correlated with essentiality ($r = .65$, $p < .001$). More important, the median correlation between entitativity and collective responsibility was larger ($r = .58$, $p < .001$), than the correlation between essentiality and collective responsibility ($r = .38$, $p < .001$, $z = 1.63$, $p = .05$), one-tailed (see Cohen & Cohen, 1983). To examine the direct effects of entitativity and essentiality on judgments of collective responsibility, we analyzed a model with these two composites simultaneously predicting collective responsibility. Entitativity strongly predicted collective responsibility judgments ($\gamma = .58$, $p < .001$), but essentiality did not ($\gamma = .02$, *ns*).

As in Study 1, we also conducted a secondary set of analyses investigating justifications of omission and commission. Entitativity was moderately correlated with omission ($r = .60$, $p < .001$), and commission ($r = .55$, $p < .001$).

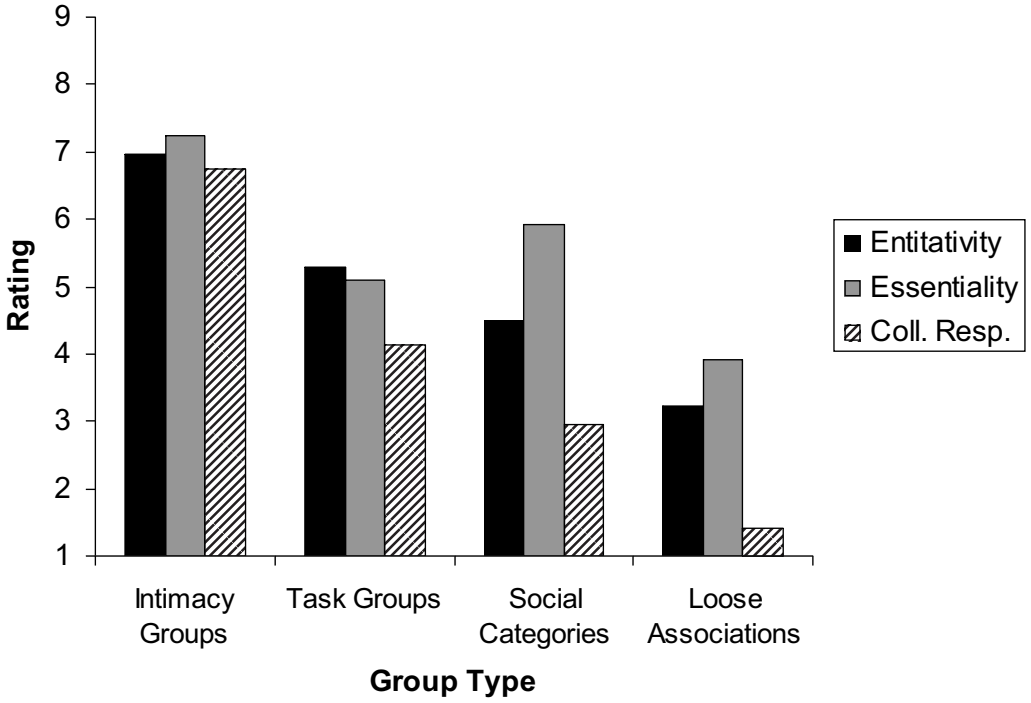

Figure 3. Ratings of entitativity, essentiality, and collective responsibility as a function of group type, Study 2.

Essentiality was weakly correlated with omission (r = .33, p < .01), and commission (r = .31, p < .01). When entered simultaneously, entitativity predicted omission (γ = .60, p < .001), and commission (γ = .63, p < .001), but essentiality did not predict either justification.

Entitativity as a predictor within different types of groups We also examined the relationship between entitativity and collective responsibility within each group type. Entitativity predicted variation in collective responsibility within intimacy groups (γ = .18, p < .001), task groups (γ = .18, p < .001), social categories (γ = .16, p < .001), and loose associations (γ = .37, p < .001) when essentiality was entered simultaneously in the model. Figure 4 shows these results, with the length of each line representing the range of entitativity ratings of the groups within the group type.

The interactive effects of entitativity and essentiality As in Study 1, we investigated the possible interactive effects of entitativity and essentiality. The Entitativity × Essentiality interaction term significantly predicted judgments of collective responsibility (γ = .07, p < .005). As in Study 1, post hoc analyses of simple slopes (Aiken & West, 1991; Bauer & Curran, in press) revealed that the effect of entitativity on collective responsibility was greatest at high levels of essentiality (one *SD* above the mean) (γ = .66, p < .001). This relationship remained significant but was slightly weakened at mean levels of essentiality (γ = .59, p < .001), and low levels of essentiality (one *SD* below the mean) (γ = .52, p < .001).

Discussion

Using a broad, established measure of essentialist beliefs and entitativity (Haslam et al., 2000)

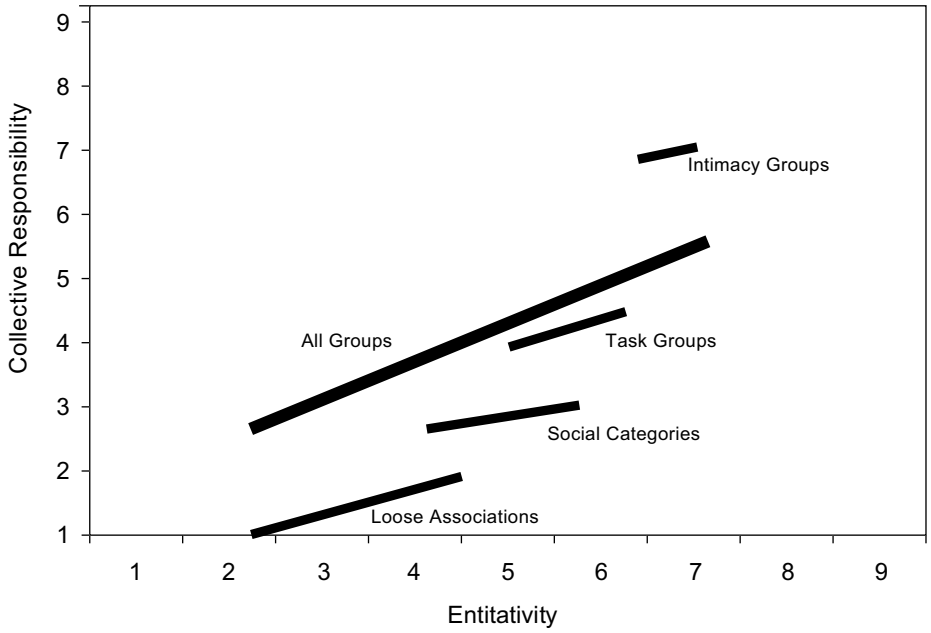

Figure 4. Relationship between entitativity and collective responsibility. Slopes represent the partial coefficient controlling for essentiality for each group type, Study 2. The length of each line indicates the range of means of entitativity ratings for the groups in each group type.

and a varied analytic approach, Study 2 conceptually replicated the major findings of Study 1. We replicated the finding that the four types of groups differ in perceptions of collective responsibility, essentiality, and entitativity. Furthermore, we again found that entitativity was a stronger predictor of collective responsibility than essentiality. Even when examining variation in collective responsibility within social categories that are defined more by essence than entitativity, entitativity was a significant predictor of collective responsibility. As in Study 1, a significant interaction revealed that the effect of entitativity on collective responsibility was stronger with increasing levels of essentiality. Overall, these data support our theorizing that lay perceivers use primarily folk theories of entitativity as an interpretative mechanism for understanding social influence on moral behavior in groups, but that essentiality may play a small moderating role in influencing these judgments.

General discussion

When bad events occur, humans have an insatiable appetite for understanding and explaining those events. This search for understanding occurs whether one is ascribing responsibility for the event to an individual or a group. When making sense of an individual, the perceiver's focus is on those invisible but vital mental states that help explain the actor's deeds. Did he intend to do this? Was it an accident? Is he unrepentant, or does he regret his bad acts? These mental states cannot be seen directly, but people's inferences about them are crucial in determining judgments of individual responsibility. For collective responsibility, we argue that inferences of another invisible psychological concept are important, namely the ties that bind people together in social relationships and groups. We argued that entitativity is, at its core, the lay perceiver's distilled understanding of the social relationships and interdependence

among members of a group. We contrasted this with essentiality, which we argued was particularly linked to seeing a group as having both permanence and inalterability. In our efforts to understand these lay theories of groups, we first established that group types differ in collective responsibility, entitativity, and essentiality. Our more specific analyses identified that lay perceivers use primarily entitativity information when making judgments of collective responsibility. Finally, we found a moderating effect of essentiality such that increasing perceptions of essentiality slightly increased the effect of entitativity on collective blame judgments.

We acknowledge limitations to the current set of studies. First, our data are correlational in nature. Although we did replicate the pattern of results, we cannot definitively state that entitativity perceptions increase perceptions of collective responsibility. In addition, the explanatory power of our essentiality composites may have been limited do to relatively low reliability coefficients. Future research should focus on laboratory manipulations of entitativity and essentiality. Second, we investigated third party perceptions of groups rather than groups to which members have an emotional investment. We would caution about firmly extrapolating the present results to all intergroup settings.

Below, we discuss some implications and future directions for research related to lay theories and also theories of intergroup relations and prejudice.

Implications for development and content of theories of groups

In this paper, we argued that perceivers rely upon intuitive theories of groups in order to make judgments of collective responsibility. To date, there is some evidence that psychological essentialism as a processing heuristic for social categories emerges early in life. For example, Hirschfeld and Gelman (1997) found that preschoolers believed that people of different races would speak different languages and that even if swapped at birth, the children would grow up to speak the language of their birth parents. There is also evidence indicating that children use a theory of essentiality when reasoning about racial categories (Hirschfeld, 1995). Similar essentialist theories in children hold true for gender as well (Taylor, 1996) and one study found that 12-year-old Indian children believed that caste was fixed at birth (Mahalingam, 1999). It remains to be seen whether folk theories of essentiality for other group types emerge early in life as well.

One intriguing finding in our data is that intimacy groups and social categories are both perceived as high in essentiality. To our knowledge no prior research has conclusively shown this. At first glance, ascribing equal levels of essence to both types of groups may appear unusual. However, this simply suggests that both intimacy groups and social categories are viewed as inalterable, impermeable, and historically invariant. When placed in this context, one may easily imagine how lay perceivers view a family as possessing a deep essence that transcends time and social circumstance in much the same manner as gender or racial categories. However, it is less clear how and why people would ascribe essentiality to other intimacy groups such as friendship groups. There clearly remains much to be done to understand how essentialist beliefs may be applied to groups other than social categories such as race or gender.

There is an even greater gap in our knowledge about the development of intuitive theories about entitativity. While research has demonstrated that the four types of groups presented in the current article are used spontaneously by adults to encode social information (e.g. Sherman, Castelli, & Hamilton, 2002), there are no data concerning when or under which circumstances children may develop their theory of group entitativity. Likewise, while there is a growing body of research about the effects of entitativity on social judgments, little is known about how children's beliefs about groups and social relationships develop. We would hypothesize that children reach an understanding of entitativity by first developing an understanding of the relational principles used in dyadic relationships in which the child is involved. As we've discussed elsewhere (Lickel et al., in press),

people's beliefs about the relational principles used in a group are tightly connected to the perceived entitativity of the group. Fiske (1991) has argued that there is a developmental order to children's understanding of relational principles (beginning with an understanding of communal sharing and only later developing an understanding of authority ranking, equality matching, and much later, market pricing). However, little structured empirical research on children's understanding of the operation of these relational styles has been conducted. Developmental research on relational principles and entitativity would seem to be particularly important for future research.

The last issue we would raise in this section is the connection of our present research with other work that has taken a perceiver-focused approach to the study of group perception (Hong, Levy, & Chiu, 2001; Plaks, Levy, Dweck, Stroessner, 2004). One particularly relevant lay theory approach has been conducted by Dweck and colleagues (e.g. Dweck, Chiu, & Hong, 1995). These researchers have identified individual differences in the extent to which people believe that traits are fixed versus malleable. Entity theorists focus on traits and endorse stereotypes to a greater extent than incremental theorists, while incremental theorists focus more on situational and mediating psychological mechanisms (and stereotype less) than their entity counterparts (see Plaks et al., 2004). Plaks et al. (2004) propose that entity theorists may be especially likely to perceive essentialism in groups, while incremental theorists may be especially likely to perceive entitativity in groups. If so, this would have interesting ramifications for collective responsibility research. Entity theorists should assign less blame to the group (but endorse dispositional judgments to a greater degree) while incremental theorists should assign more blame (but not endorse dispositional judgments). This seemingly counterintuitive prediction deserves further study.

Implications for intergroup relations and prejudice

What are the broader implications of these findings for intergroup relations? First, we would suggest that collective responsibility (and therefore entitativity) plays a strong role in fueling many intergroup conflicts. In intergroup conflicts, retaliation for the actions of an individual is often spread or displaced to other outgroup members beyond the provocateur. These other outgroup members are targeted for collective blame and therefore retaliation because of their shared group membership with the provocateur. Although categorization of the situation in intergroup terms ('them' and 'us') is a crucial first step in the process by which collective blame and retaliation occur in intergroup contexts, we would argue that perceptions of the entitativity of the outgroup also play a role in moderating the extent to which retaliation is directed at other outgroup members beyond the provocateur. Furthermore, the argument that members of the outgroup are 'in cahoots' is a powerful justification for collective blame and retaliation against individuals who have a tenuous direct connection to the event that precipitated the intergroup conflict. The observed interaction between essentiality and entitativity on judgments of collective responsibility also indicates that increasing perceptions of groups as impermeable and stable over time magnifies the effect of entitativity on collective responsibility judgments. Therefore, groups who are perceived as both 'in cahoots' and 'cut from the same cloth' may be especially vulnerable to group-based retaliation. Consider the following observation from a Western journalist in the ongoing conflict in Iraq:

> When an Iraqi man loses a family member to an American missile, he must take another American life to even the score. He may not subscribe to the notion that some Americans are noncombatants, viewing them instead as the members of a supertribe that has come to invade his land. (Robertson, *Salon*, September 23, 2004)

According to this correspondent's interpretation, Iraqis perceive the Americans to be a highly interdependent group (i.e. 'supertribe') in which members are interchangeable for the purpose of retaliation. This may be further exaggerated by perceptions that Americans share an inalterable, underlying essence.

Interestingly, though, some of the same factors that may lead to applying collective responsibility to an outgroup (such as Iraqis blaming Americans) may also lead, under some circumstances, to people applying collective blame to their ingroups. An emerging literature on group-based emotions has found that people may feel vicarious shame, guilt or ingroup-directed anger when they believe that members of the ingroup have behaved in a blameworthy fashion (e.g. Doosje, Branscombe, Spears, & Manstead, 1998; Lickel, Schmader, Curtis, Scarnier, & Ames, 2005). In turn, these emotional reactions elicit behaviors to cope with the blameworthy action of the ingroup member. In particular, guilt motivates apology and reparations, shame motivates distancing from the wrongdoer, and ingroup directed anger motivates confrontation and punishment of the ingroup wrongdoer (e.g. Doojse et al., 1998; Iyer, Schmader, & Lickel, 2005; Lickel et al., 2005). At least in part, these reactions of ingroup blame rely upon perceptions of entitativity. In particular, vicarious guilt has been linked to the interdependence/entitativity of the group to which the wrongdoer and the perceiver belong (Lickel et al., 2005). It is also possible that vicarious shame is heightened in groups that are high in essentiality. We clearly believe that there is a distinction in people's thinking between the more relational aspects of their group membership versus the identity aspects of the group membership (Brewer & Gardner, 1996). Thus, group-based shame is more related to the identity aspects of group memberships, whereas group-based guilt is particularly linked to the relational aspects of group membership (Lickel et al., 2005). Clearly, there are many connections yet to be made with regard to different facets of collective responsibility (whether directed toward ingroups or outgroups) and folk theories of groups.

Finally, we also believe that entitativity may play a role in some forms of prejudice, particularly in which there is suspicion of coordinated action by the group. Thus, for example, anti-Semitism historically involves an ugly preoccupation of Jewish conspiracy to undermine or control government, economy, or culture within predominantly Christian societies (Ruotsila, 2000). Such conspiracy theories rest upon something different than just ascribing negative traits to Jews. It is not only that anti-Semites view Jews as a homogeneous group of 'bad people' who might be dislikable or untrustworthy. Instead, beyond that, there is a theory of coordinated action amongst Jews, an interdependence of Jewish goals and actions, which threaten the (non-Jewish) perceiver. Such a theory cannot rest very easily upon perceptions of homogeneity of traits or even belief in a group essence. Instead, conspiracy theories such as this rest upon perceptions of entitativity, the belief that there is interdependence of goals, actions, and relationships among members of the group.

In conclusion, groups differ in countless ways, and yet a few key dimensions of social association may explain much of the important differences in how lay people perceive groups. In the present paper, we argued that two key folk theories—entitativity and essentiality—differ across groups and also differ in their effects on collective responsibility judgments. We hope our work can be used as a stepping stone to further examine how such perceptions of group entitativity, essentiality, and collective blame influence social cognition and intergroup relations.

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