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## FROM SELF-VERIFICATION TO IDENTITY FUSION:

Consequences of Identity Verification on Intergroup Relations

DE LA AUTO-VERIFICACIÓN A LA FUSIÓN DE IDENTIDAD:

Consecuencias de la Verificación de la Identidad sobre las Relaciones Intergrupales

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## **CHAPTER 1**

## **Theoretical review**

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#### **CHAPTER 1**

#### **Theoretical Review**

#### Introduction

Intergroup conflict has been the cornerstone of Social Psychology since its first steps. Some of the most distinguished social psychologists arrived to the United States trying to escape from the Nazi horror that ravaged Europe. Therefore, it is not surprising that this extermination of a group on the basis of ethnic or religious reasons led these psychologists to delve into the mechanisms that explain such terrible events. This kind of apparently insane behavior cannot reside in individual explanations of psychopathology, but on the intergroup processes that cause, justify and perpetuate intergroup conflicts.

The examination of these processes has allowed social psychologists to develop an extensive literature on conflict resolution and promotion of intergroup relations. The present doctoral thesis aims to enrich this literature from a novel perspective: verification of ingroup identity. From this approach, people strive to verify the characteristics of the group with which they are aligned (Gómez, Seyle, Huici, & Swann, 2009). Decades of research on the verification motive at the individual level have revealed several benefits of self-verification at the individual, interpersonal and societal levels (North & Swann, 2009). Basically, our proposal builds on previous research by transferring knowledge about self-verification to the intergroup realm with the aim of improving orientations towards different outgroups.

The main contribution of the thesis is the merger of two lines of research separated so far: promotion of intergroup relations and verification motives. It also extends knowledge on both fields in many ways. Regarding the promotion of intergroup relations, this thesis provides a new strategy, which is considerably different from other methods, to increase intergroup harmony. Verification of ingroup identity is linked to the social aspects of the self-concept, therefore, it assigns to identity a prominent role. More importantly, it seems relatively easy to implement, as it requires validating an identity already formed, rather than creating a new one. With regard to research on verification motives, the present thesis scrutinizes for the first time some antecedents and consequences of identity verification at the individual and group levels. Among the reported consequences of identity verification, identity fusion will receive especial attention. Identity fusion represents the intersection point between verification of personal and group identities. As it is related with extreme behavior on behalf of the group, we will check several manipulations to modify levels of identity fusion.

Throughout this introductory chapter we present the theoretical framework of the thesis. In the first section a brief review of the most important strategies to improve intergroup relations is given followed by the introduction of our proposal. In the second section we summarize the main contributions of the self-verification theory. In the third section, the extension of the self-verification motive to the collective level is considered. In the fourth section, we present the verification of ingroup identity. In the fifth and last section, we provide an overview of the thesis.

#### 1. Strategies to improve intergroup relations

The promotion of intergroup relations has been a long-term concern for social psychologists, who have dealt with it from different perspectives. In the vast field of strategies for improving relations between conflicting groups, three proposals have received considerable empirical and theoretical attention: intergroup contact hypothesis, extended contact and recategorization<sup>1</sup>.

According to the Intergroup Contact Hypothesis, contact among members of different groups may undermine intergroup hostility (Allport, 1954). The original formulation of the hypothesis posits that the contact experience must meet four requirements to be positive: 1) equal status within the situation, 2) common goals, 3) intergroup cooperation, and 4) support of authorities, law or custom. However, recent meta-analytic findings (Pettigrew & Tropp, 2006) point out that these four conditions typically have a positive effect on prejudice reduction, although they are not essential. Intergroup contact has long been considered one of the most effective strategies for improving intergroup relations across different situations, groups and cultures (for a review see Dovidio, Gaertner, & Kawakami, 2003; Pettigrew, 1998; Pettigrew & Tropp, 2000, 2006, 2008, 2011). Nonetheless, intergroup contact is sometimes not a viable option, for instance, when conflicting groups are sharply segregated (i.e.: Greek Cypriots and Turkish Cypriots). Yet another obstacle for the intergroup contact approach is that high prejudiced individuals are reluctant to enter into interactions with outgroup members (Pettigrew, 1998).

<sup>&</sup>lt;sup>1</sup> Even though there are other strategies for improving intergroup relations, we have focused on those strategies that are most directly related to the objectives of the present thesis.

Some of the limitations of this approach are alleviated by the Extended Contact Hypothesis, which states that *knowledge that an ingroup member has a close relationship with an outgroup member can lead to more positive intergroup attitudes* (Wright, Aron, Mclaughlin-Volpe, & Ropp, 1997, p. 73). Extended contact reduces intergroup anxiety and other negative emotions that can make people refrain from initiating interactions with outgroup members (Turner, Hewstone, & Voci, 2007). It can be applied in those circumstances in which direct contact is unfeasible as in segregated situations and it is likely to be implemented on a large scale since one person with outgroup friends can influence the attitudes of many other ingroup members (Wright et al., 1997).

Finally, a third strategy to reduce ingroup bias is recategorization, which involves either creating or increasing the salience of a superordinate category. In particular, the Common Ingroup Identity Model (Gaertner & Dovidio, 2000, 2009), suggests that leading members of different groups to conceive of themselves as members of a single, superordinate group, will improve attitudes towards former outgroup members as a consequence of the cognitive and motivational processes related to ingroup bias. Research on the Common Ingroup Identity Model demonstrates that one-group representations consistently relates to more positive attitudes towards former outgroup members (see Gaertner & Dovidio, 2000), nevertheless, this approach has been criticized in two directions (Dovidio, Gaertner, & Saguy, 2009). The first critique concerns the difficulty to create and maintain over a long period of time a superordinate identity powerful enough to outrange established and resistant categorizations (Hewstone, 1996). The second critique suggests that people may amplify levels of bias when distinctiveness is threatened (Deschamps & Brown, 1983) motivated by the desire to maintain the distinctiveness of their group relative to other groups (Branscombe, Ellemers, Spears, & Doosje, 1999a).

So far we have outlined the main proposals to improve intergroup relations, even though this short review does not encompass the whole repertoire of available strategies. Each method presents strengths and weaknesses, therefore, to maximize their results, it is convenient to combine several strategies. Furthermore, we propose that verification of ingroup identity may be applied in conjunction with other ways to promote intergroup harmony. It is possible that some of the reviewed strategies work through increasing verification of ingroup identity. Verification of ingroup identity is different from these strategies because it is closely related to the self-concept and, in particular, with those aspects of the selfconcept which are linked to group membership. Unlike other strategies for prejudice reduction, verification of ingroup identity does not require an effort from ingroup members. Verification implies confirming an identity that already exists which, in principle, should be easier than creating or modifying a norm (as in extended contact), a representation (as in recategorization) or a willingness to interact (as in intergroup contact).

Verification of ingroup identity draws on decades of research on verification of personal identity. According to self-verification theory (Swann, 1983, 2011), individuals prefer others to see them as they see themselves, even if their self-views are negative, as discussed in the next section.

#### 2. Self-verification theory

Self-verification theory (Swann, 1983) states that people actively try to verify, validate and maintain their stable self-views with the aim of reinforcing their perceptions of control and predictability. This theory rests on the early assumption of Lecky (1945) and on subsequent self-consistency theories (e.g. Aronson, 1968; Festinger, 1957). Lecky (1945) proposed that personality is a system of ideas which are consistent with each other and with their core, the idea of the self. From this perspective, behavior is a manifestation of a single, primary motive, maintaining self-consistency in an unstable environment. Later, the original formulation of the dissonance theory by Festinger (1957) indicated that the inconsistency between two elements, typically between attitudes and behaviors, produces discomfort and, correspondingly, pressures to reduce or eliminate the dissonance. Revisions of the dissonance theory (Aronson, 1968) have adopted an ego-based perspective of dissonance, which would rest on the inconsistency between a positive self-view and a bad or foolish behavior.

#### 2.1. Reasons for self-verification

Self-verification theory draws on self-consistency theories and, in particular, on dissonance theory, however, there are two important differences between them. First, whereas dissonance theory highlights that people gain consistency by changing transient self-views to match overt behaviors, self-verification theory stresses that people strive

to maximize the extent to which their experiences confirm and reinforce their self-views (Swann, 2011). Second, dissonance theory considers that consistency is an end in itself, however, self-verification theory conceives of consistency as a means of boosting perceptions of prediction and control (Swann, Stein-Seroussi, & Giesler, 1992a).

This second difference leads us to consider the reasons underlying verification. Although it may be counter-intuitive, self-verification theory posits that people are motivated to verify their self-views even when they happen to be negative. Therefore, there must be forceful reasons supporting this motivation. According to Swann et al. (1992), these reasons are both epistemic and pragmatic.

Regarding the former, people seem to prefer information which confirms their pre-existing attitudes, beliefs, or behaviors over disconfirming information, which challenges these tendencies (Hart et al., 2009). In fact, some authors have proposed a "congeniality bias" or "confirmation bias" to refer to the seeking or interpreting of evidence in ways that are favorable to existing beliefs, expectations, or hypothesis (Nickerson, 1998). Apart from this cognitive preference for confirmatory information, self-verification provides individuals with a sense of existential security in a changing world (Swann, 1987). Self-conceptions have a dynamic role which is important for interpreting and organizing self-relevant experiences and in responding to threats from the social environment (Markus & Wurf, 1987).

Along with these reasons of an epistemic character, motivation to self-verify is also fueled by pragmatic reasons. Relating to people who see us more favorably than we see ourselves can have negative consequences. This flattering view may end in disappointment and feelings of deception when our true self become visible to them (Leary, 2007). Being accepted by someone who is aware of our flaws constitutes a solid proof of confidence and intimacy. Moreover, when others share the image we have about ourselves, it is easier to avoid situations in which we may feel embarrassed by our incompetence. For instance, a good friend will not ask us out for a dance if he/she knows well that we lack a sense of rhythm.

Swann et al. (1992a) found support for both kinds of reasons across two studies examining the spontaneous verbalizations of participants when selecting interaction partners. Participants preferred to interact with self-verifying partners because they would be reassured that they really know themselves (epistemic reason) and because they expected to have a more positive and harmonious interaction than with a nonverifying partner (pragmatic reason).

These reasons are particularly important regarding self-views that are held with high certainty (Swann & Pelham, 2002). When self-views held with high certainty are not verified, one's sense of self-understanding is undermined and the risk of interpersonal conflicts grows notably. Therefore, the more certainty attached to the self-view, the more intense is the desire to verify it (Chen, Chen, & Shaw, 2004). Once established that people are motivated by epistemic and pragmatic reasons to confirm and validate their existing self-views, the next step involves explaining how they achieve self-verification.

#### 2.2. Strategies to foster self-verification

According to self-verification theory, individuals are not passive recipients of verifying feedback, but they adopt an active role in their search for confirmatory evaluations. To that end, people employ two kinds of activities: one is behavioral and the other is cognitive (Swann, Rentfrow, & Guinn, 2002).

The behavioral activities consist of constructing social environments in which self-views are likely to be verified. Swann et al. (2002) propose three strategies that can be used to shape those environments: 1) selective interaction, 2) displaying identity cues, and 3) creating allies or interpersonal prompts. Growing research has demonstrated that people prefer to choose interaction partners who confirm their self-views over those who challenge them (Hixon & Swann, 1993; Robinson & Smith-Lovin, 1992; Swann et al., 1992). This tendency to selectively interact with self-verifying partners is not confined to laboratory studies, but extends to other areas of real life. Burke and Stets (1999) collected longitudinal data from 286 couples during the first three years of marriage. Results indicated that self-verification increased subjective and behavioral commitment as well as emotional attachment. Moreover, lack of self-verification in the marital relations may lead partners to abandon their spouses with the hope of finding a verifying partner (Swann, De La Ronde, & Hixon, 1994).

The second behavioral strategy to promote self-verification involves exhibiting identity cues that make clear how we really are. They refer to physical appearance (i.e.: clothes, hairstyles, make-ups), possessions (i.e.: cars, houses), political affiliation or social activism, professions or hobbies, etc. When an individual enters an interaction,

he/she tries to mobilize his/her activity to convey a certain impression that leads others to act in accordance with his/her plan (Goffman, 1959). Identity cues can fulfill this function, however, to effectively reflect our self-views, they must meet three requirements: a) they must be noticed by others, b) they must induce specific reactions in others, and c) they must be controllable by the individual (Swann, 1983).

When these two strategies fail to elicit verifying feedback, people still have an opportunity to achieve self-verification through interpersonal prompts. Several studies have demonstrated that individuals increase their endeavors to elicit self-verifying feedback when they fear that their interaction partners do not see them as they see themselves (Swann & Hill, 1982; Swann & Read, 1981a). Burke and Stets (1999) proposed that *altercasting* (Weinstein & Deutschberger, 1963) may be used to gain self-verification by shaping behavior to provoke reactions from others that allow the individual to align self-relevant perceptions with identity standards.

Regarding cognitive activities, other strategies can work together to restore stable self-views in case behavioral strategies are not as effective as expected. Motivated by the desire for self-verification, people selectively pay attention, encode, retrieve and interpret self-relevant information in an attempt to accommodate reality to their self-conceptions. For instance, Swann & Read (1981a) found that participants spent more time examining evaluations when they anticipated that those evaluations would confirm their self-views, regardless of whether those self-views were positive or negative. Additionally, participants who perceived themselves as likeable remembered more positive self-relevant information, whereas participants who perceived themselves as dislikeable remembered more negative self-relevant information.

#### 2.3. Outcomes of self-verification

Self-verification predicts a wide range of outcomes at the individual, interpersonal and societal levels (Swann, 2011). Within positive outcomes at the individual level, self-verification bolsters psychological coherence, reduces anxiety and improves health (North & Swann, 2009). Psychological coherence constitutes an important source of emotional comfort. Self-verification fosters psychological coherence because it increases the perception that things are as they are expected to be. It also increases the perception of a controllable and predictable world, therefore, it can be anxiety reducing. For instance, Wood, Heimpel, Newby-Clark, and Ross (2005) demonstrated that low

self-esteem participants reacted anxiously to positive feedback about their performance, apparently because this feedback was inconsistent with their self-conceptions. More importantly, if self-verification omits from repeated anxious episodes related to self-evaluation, health should be improved to some extent.

On the other hand, alteration of self-conceptions could have a negative impact on health according to Brown's identity disruption model (Brown & McGill, 1989). This model proposes that life events can have negative consequences on health through identity disruptions, that is, any change to existing identities. They obtained supporting evidence for this suggestion by assessing the impact of positive life events on health for high and low self-esteem participants. Positive life events improved health for high selfesteem participants, but predicted deterioration in health for low self-esteem participants.

So far, self-verification seems to produce positive effects on individuals, however, it could be counterproductive with people who develop exaggeratedly negative self-views (Swann, 2011). In this case, people may end up in the hands of partners who despise and mistreat them and enter a vicious cycle from which they cannot escape.

At the interpersonal level, self-verification promotes more harmonious social interactions, improves relationship quality and engenders trust. Self-verification provides people with the possibility of better predicting the behavior of both members of the interaction. Predictability not only makes superfluous interactions easier but it constitutes one of the components of trust in a romantic relationship (Rempel, Holmes, & Zanna, 1985). Trust is supposed to mediate the positive effect of self-verification in subjective commitment and emotional attachment (Burke & Stets, 1999). On the other hand, self-verification enhances quality in relationship because it fosters higher levels of intimacy (North & Swann, 1999). According to Reis and Shaver (1988), an interaction is more likely to be experienced as intimate if members perceive their partner's response as validating (confirming that one is accepted and valued) as well as understanding and caring. Therefore, self-verification may be essential in developing satisfactory and stable relationships.

Apart from the outcomes on the individual and interpersonal levels, self-verification also has far-reaching effects. On a societal level, self-verification can contribute to the eradication of social stereotypes, by individuating people and

recognizing their uniqueness. Swann, Kwan, Polzer, and Milton (2003) studied genderstereotypic perception of men and women in a prospective research with master students. Results showed that at the end of the semester, perceivers who individuated targets tended to bring their appraisals into alignment with targets' self-views, and, in turn, they exhibited less stereotypic perceptions.

Finally, and more important for the present dissertation, it is the link between self-verification, identity fusion and extreme behavior, which will be addressed in Chapter 4. When a discrepant feedback challenges self-views, individuals try to compensate by intensifying their efforts to obtain self-verifying evaluations (e.g., Swann & Hill, 1982; Swann & Read, 1981a). If this challenge is directed to people who have their personal identities "fused" with their social identities, compensatory self-verification strivings can be materialized as increased willingness to perform extreme behaviors on behalf of the group, for instance, fighting and dying for the group (Swann, Gómez, Seyle, & Morales, 2009). For fused people, activating personal identities is tantamount to activating social identities, because they are imbued with a feeling of connectedness and reciprocal strength with the group (Gómez et al., 2011a). Therefore, when fused people are not verified either in the individual identity or in the social identity level, they are likely to react by increasing their willingness to fight and die for the group (Swann et al., 2009).

Identity fusion cannot fully explain all kinds of extreme behavior, however, results to date encourage us to explore this question in greater depth. In particular, and given the impact of this process on extreme behavior oriented towards groups, it would be interesting to know whether identity fusion may be altered by contextual or individual factors. We will return to this topic more carefully in the third package of studies (Chapter 4).

#### 3. Collective verification

So far we have examined how verification strivings apply to the individual self. Nevertheless, recent developments in the field of self-verification theory have extended this motive to other levels of self-definition such as collective identities (Chen et al., 2004; Chen, Shaw, & Jeung, 2006) and ingroup identities (Gómez, Morales, Huici, Gaviria, & Jiménez, 2007; Gómez et al., 2009). Collective identities refer to the characteristics that a person perceives as self-descriptive when thinking about himself or herself as a group member. Collective identities transcend the mere categorization of oneself in terms of group membership. They also involve the beliefs about the attributes that characterize the self as a group member (Chen et al., 2006). For instance, the collective identity of a woman can include beliefs about being emotional or nurturing whereas the collective identity of a man can imply convictions about being independent and competitive.

Collective self-verification entails the confirmation of personal self-views linked to group membership, that is, the verification of a group member's specific conceptions about his or her standing on group relevant dimensions. Even though members of the same group usually share similar attribute dimensions to compose their collective selfviews, groups are internally differentiated on the basis of prototypicality (Hogg, 1996). That is, group members vary in their perceptions of their position on group-relevant dimensions along a prototypicality gradient within the group. Therefore, collective selfverification does not mean being perceived by others as a highly prototypical exemplar of the group, but rather to be positioned along the relevant dimension in the same point in which the individual sees himself or herself (Chen et al., 2006).

Results from various studies support the extension of self-verification motives to the collective level (Chen et al., 2004, 2006), and more importantly they delineate the circumstances in which collective self-verification is more likely to occur. Four moderators are important according to Chen et al. (2004):

- 1) Certainty of the collective self-view. People are in greater need to have others verify their self-views when these self-views are held with high certainty.
- 2) Nature of one's bond to the source of verification. The need for collective verification is stronger when the source of verification is an ingroup member.
- Salience of the collective level of self-definition. When the collective level of selfdefinition is salient, individuals intensify their strivings to obtain verification.
- 4) Importance of the group identity. When self-views related to the group identity are central to defining the overall sense of the self, the desire for collective verification increases.

Regarding its effects, collective self-verification leads to preference for interactions with partners who validate self-views (Chen et al., 2004), replicating previous studies conducted at the individual level. Additionally, in naturally occurring

groups, collective self-verification has proven to be associated with higher perception of prototypicality and higher devotion to the group (Chen et al., 2006).

Research from this perspective has demonstrated that self-verification motives are not restricted to the individual level of self-definition, but they also operate at the collective level. These two forms of verification are referred to characteristics that define oneself as a unique individual (self-verification) or as a group member (collective self-verification). Still, there is a more abstract level of identity verification that has recently been analyzed, the group identity level (Gómez et al., 2007, 2009).

#### 4. Verification of ingroup identity

Group identity comprises convictions about the characteristics of the groups with which individuals are aligned. Those attributes that a group member assigns to the group as a whole do not necessarily describe himself or herself as an individual. For instance, a Portuguese may see himself or herself as cheerful, but he or she most probably endorses a group identity characterized, among others, by melancholia. Furthermore, a Portuguese will be interested in having others recognize melancholia as a typical trait of his or her group although he or she is personally cheerful. Even though, group identities are negative and non self-descriptive, people prefer and seek evaluations that confirm them, especially if they are highly invested in those identities (Gómez et al., 2009). This proposal may partly contradict the basic assumption of social identity theory: the motivation to maintain a positive social identity.

#### 4.1. The Social Identity Theory approach

According to the Social Identity Theory (Tajfel & Turner, 1979), there is an individual tendency to achieve and maintain a positive social identity, which usually takes the form of ingroup bias. Groups tend to maximize differences between the ingroup and the outgroup on those dimensions that positively reflect the ingroup. Comparing their group with different outgroups on favorably evaluated dimensions, group members gain a sense of positive distinctiveness and, in turn, a positive social identity. However, when the result of the comparison is not satisfying, people experience an unpleasant state that leads them to implement diverse strategies to counteract it and to achieve a positive social identity.

From this perspective, verification of group identity seems to be possible only regarding positive attributes. However, in one of its most distinctive arguments, self-

verification theory states that people with negative self-views also strive to verify those self-conceptions (Swann, Hixon, & De La Ronde, 1992b; Swann & Read, 1981a; Swann, Wenzlaff, Krull, & Pelham, 1992c). Thus, when extended to the social level, verification motives conflict with the basic assumption of the social identity theory, the motivation to achieve a positive social identity, when considering negative attributes assigned to the group.

Although the social identity theory has been one the most influential and productive perspectives over the last 30 years, critics have pointed out some of its limitations (for a review see Brown, 2000). Social identity theory lies on the assumption that a positive social identity is mainly based on favorable intergroup comparisons, however, the correlation between strength of group identification and ingroup bias is positive but weak (Hinkle & Brown, 1990). But more importantly for our argument, social identity theory falls short to explain investment in negative identities such as stigmatized groups or low status groups. For instance, recent findings suggest that for committed members of low status groups the distinctiveness motive takes precedence over the desire for ingroup superiority (Ellemers, Spears, & Doosje, 2002). Thus, group members prefer to hold a negative identity rather than a positive, but not distinctive identity (Mlicki & Ellemers, 1996). In this vein, a considerable amount of studies have demonstrated that ingroup members react to the devaluation of their group by increasing group identification and cohesion (Branscombe, Schmitt, & Harvey, 1999; Jetten, Branscombe, Schmitt, & Spears, 2001; Schmitt, Spears, & Branscombe, 2003).

These findings call into question the basic assumption of social identity theory that group members strive to achieve and maintain a positive social identity. Sometimes ingroup members embrace a negative identity and even increase identification with the group in response to devaluation. On the basis of self-verification theory, it would be reasonable to expect members of devalued groups to prefer and actively seek situations and interaction partners who verify their negative identity. With respect to positive identities, evidence interpreted hitherto as supporting self-enhancement motives at the intergroup level may actually disguise self-verification motives.

4.2. Extension of the self-verification motive to the intergroup domain

One of the first empirical approaches to self-verification motives at the intergroup level comes from the research of Gómez, Huici, and Morales (2004). They conducted

two studies manipulating intergroup contact and a third study manipulating intergroup value similarity. As predicted, both strategies improved the outgroup evaluation, but more importantly, they also increased the overlap between the meta-stereotype (ingroup members' beliefs about how they are evaluated by outgroup members) and the image that ingroup members hold about themselves. In a subsequent study, Gómez and Huici (2008) explored the effect of vicarious intergroup contact and the support of an authority figure on the improvement of outgroup and meta-stereotype evaluations. Vicarious intergroup contact and support of an authority figure improved outgroup evaluation. Importantly, this effect on outgroup evaluation was partially mediated by increased overlapping between the meta-stereotype and the ingroup's image.

These pioneering studies yielded promising results, however, they suffered from two main shortcomings: verification of ingroup identity was deducted from a composite measure (the degree of overlap between the meta and the ingroup's self-stereotype) and it was measured, never manipulated. A series of studies by Gómez et al. (2009) overcame these limitations through five experiments focused on verification of ingroup identity. Results of all studies provided convergent evidence indicating that people evaluated individuals who verified their ingroup identities as more competent and preferred to interact with them to a greater extent than with individuals who enhanced these identities. Strivings for verification of ingroup identity were more intense among participants who were highly identified with their group or were very certain of their group identities. Additionally, results showed that strivings for verification were independent of the extent to which the identities were self-descriptive, such that participants sought verification of their group identity even when they were not personally reflected in that image. Finally, this research showed for the first time that verification strivings are not restricted to the content of identities, but they also extend to the valence of those identities (i.e., the extent to which the identities are valued).

Overall, this set of studies represents the first evidence that individuals actively seek verification for their convictions regarding the characteristics of the social group in which they are psychologically invested. These results are coherent with evidence found in the individual (Swann, 1983; Swann & Read, 1981a) and the collective (Chen et al., 2004, 2006) levels. First, verification strivings emerged regardless of the valence of the group identity, such that people sought feedback that verified positive as well as negative group identities. Second, those strivings appeared even when the identities

were not self-descriptive, indicating that participants were not motivated by a desire to enhance personal virtues that other group members lacked (Gómez et al., 2009). Third, verification strivings were stronger among people whose group- or self-views were held with high certainty. Finally, participants consistently preferred to interact with a negative but verifying partner over a positive but disconfirming one, which seems difficult to understand from the Social Identity perspective.

#### 4.3. Outstanding issues on research about verification of ingroup identities

As aforementioned, decades of research on self-verification has documented positive and negative outcomes at the individual level as well as several variables that make self-verification more or less likely to occur (for a review see North & Swann, 2009). In contrast, research on verification of ingroup identity is in its infancy, and there are many unanswered questions yet to be addressed by future research.

One of the issues that remain unexplored concerns the antecedents of verification of ingroup identity, that is, the processes and situations that launch verification strivings. Self-verification occurs in the service of pragmatic reasons as to guarantee feelings of control and predictability. Consequently, when people perceive a threat to their sense of control, they compensate by increasing their strivings to validate their stable self-conceptions (Swann & Read, 1981b). Forthcoming research should determine whether reduced control in the intergroup domain spurs the need to verify group identities.

In a similar vein, individuals are more prone to elicit confirmatory reactions from their partners when they suspect that these partners hold impressions that might disconfirm their self-views (Swann & Read, 1981a). It is possible that these compensatory reactions extend to the group level, such that interacting with others who do not see the ingroup as ingroup members do could increase efforts to obtain verifying feedback in order to restore the integrity of the self system (Gómez et al., 2009). Consistent with this assumption, recent evidence states that people who have their personal and group identities "fused" show increased willingness to fight and die for the group when their personal or group conceptions are challenged (Swann et al., 2009).

At this point, it might be argued that another antecedent of verification of ingroup identity may be meta-stereotypes, which are the shared beliefs that members of the ingroup hold about the way in which outgroup members evaluate them (Gómez, 2002;

Vorauer, Main, & O'Connell, 1998). Previous research (Gómez & Huici, 2008; Gómez et al., 2004) has conceptualized verification of ingroup identity as the degree of overlap between the meta-stereotype and the image that ingroup members have about themselves. Therefore, when meta-stereotypes are activated, ingroup members should strive to verify their convictions about their group, especially if they expect that those meta-stereotypes may not be in accordance with the image that ingroup members have about themselves.

Finally, it is important to broaden our understanding of the outcomes of verification of ingroup identity. Verification of self-views has proven to engender several consequences at different levels of analysis (North & Swann, 2009), however, there is limited knowledge about the effects of verification of ingroup identity. Previous research offers evidence that verification of ingroup identity increases desire for interaction and improves the evaluation of the person or group who gives a validating feedback (Gómez et al., 2009). These results are promising since they suggest the possibility of using verification of ingroup identity to promote intergroup orientations. However, more research in this line is needed, especially concerning behavioral measures.

#### 5. Overview of the present thesis

The present thesis aims to address some of the issues aforementioned through several studies encapsulated in three thematic packages, theoretically and methodologically independent, but traversed by a common concern: promoting positive intergroup relations.

In the first package (Chapter 2), we explore an antecedent of group verification: meta-stereotypes. Meta-stereotypes bring to mind not only the image of the ingroup in the eyes of the outgroup but also the image that ingroup members have about themselves. As people are motivated to verify the convictions about their groups, we expect participants to show more positive orientations towards the outgroup when meta-stereotypes come into alignment with the image that ingroup members hold about their group. On the contrary, when meta-stereotypes are discrepant with the image of the ingroup orientations should be undermined. Additionally, we examine the moderator role that

status can have on the effects of meta-stereotype activation on intergroup orientations, as well as the interactive effect of the valence and the subjective experience of retrieval.

In the second package (Chapter 3), we further explore the consequences of verification of ingroup identity on relations with minority groups (immigrants). To that end, verification of ingroup identity is directly manipulated to observe the effects it has on the evaluation of the source of feedback (immigrants) and more importantly, on a behavioral measure, donating behavior towards the outgroup as a whole. This variable is particularly relevant, because it represents the first behavioral evidence that verification of ingroup identity may contribute to promote intergroup relations. Additionally, we introduce a novel moderator for the effects of verification of group identity, intergroup threat, which determines when verification strivings override enhancement strivings.

In the last package (Chapter 4) we focused on the process of identity fusion. As mentioned above, when "fused" people perceive a threat to their personal or group selves, they show compensatory reactions that can take the form of extreme behavior on behalf of the group. Previous research has repeatedly demonstrated that fused people are more willing to fight and self-sacrifice for the group, however, no studies to date have explored the possibility to increase or decrease levels of identity fusion. We develop several strategies threatening various aspects of the self-view or of the self-group relationship to test the degree of stability of identity fusion. Additionally, we further explore the sensitivity of fusion to contextual aspects directly affecting group identity, in what we will describe as the World Cup study.

In the final section (Chapter 5), we discuss the relevance and applicability of these findings for the intergroup domain, as well as the shortcomings and implications of this thesis for future research.

## **CHAPTER 2**

## The effects of meta-stereotype activation on intergroup relations as a consequence of relative status and the verification of ingroup identity

Introduction Study 1: Method Results Conclusion Study 2: Method Results Conclusion Study 3: Method Results Conclusion Study 4: Method Results Conclusion General discussion Limitations and future research Conclusions

#### **CHAPTER 2**

## The effects of meta-stereotype activation on intergroup relations as a consequence of relative status and the verification of ingroup identity

#### Introduction

People's beliefs regarding the stereotype that outgroup members hold about the ingroup (i.e. meta-stereotypes) have important implications for intergroup relations. Research up to date has focused on the negative consequences that follow meta-stereotypes on intergroup orientations. However, to the best of our knowledge, no study has considered that meta-stereotype activation could produce just the opposite, that is, positive intergroup orientations. In addition, the underlying mechanisms that lead meta-stereotype activation to affect intergroup relations still remain unexplored.

In the current report we present evidence on both, the processes that moderate the effects of meta-stereotype activation on intergroup orientations, and the mechanisms that mediate such effects. Our goal is to better understand reactions to meta-stereotype activation as a function of the relative status of the ingroup as compared to the outgroup. In particular, we predict that meta-stereotype activation will produce negative effects on intergroup orientations towards similar status outgroups. However, it will have positive effects towards lower status outgroups. Additionally, we propose that meta-stereotype activation will affect intergroup orientations through changes in verification of ingroup identities -convictions about the characteristics of the groups of which individuals are members (Gómez et al., 2009). To explain when and why meta-stereotype activation can engender positive or negative consequences for intergroup relations, we consider the effects of meta-stereotypes activation for intergroup relations and the role of status and verification of ingroup identification of ingroup identification of ingroup identification of ingroup relations activation for intergroup relations and the role of status and verification of ingroup identification of ingroup identification of ingroup identification of ingroup identification of ingroup relations activation for intergroup relations and the role of status and verification of ingroup identification for intergroup relations and the role of status and verification of ingroup identification for intergroup relations and the role of status and verification of ingroup identification of ingroup identification of ingroup identification for intergroup relations.

#### Meta-stereotypes and intergroup relations

Prior research has demonstrated that people tend to treat and evaluate others in light of their group membership, but as much as people stereotype others, they are conscious that others also stereotype them (Gómez, 2002). The shared beliefs that members of a group hold about how they are evaluated by outgroup members have been described as meta-stereotypes (Vorauer et al., 1998).

Despite their relevance for the intergroup realm, few studies have explored metastereotypes and, more importantly, most of them have highlighted the negative effect of meta-stereotypes for intergroup relations (Finchilescu, 2010; Kamans, Gordijn, Oldenhuis, & Otten, 2009; Vorauer et al., 1998). Although some works have also documented positive effects of meta-stereotypes, they considered meta-stereotype as the underlying process that leads perspective taking or evaluative concern to make individuals behaving more positively toward outgroup members (Vorauer, Martens, & Sasaki, 2009; Vorauer & Turpie, 2004), but not as the predictor of such behaviors.

The supposed negative effect of meta-stereotypes might be moderated by the nature of the intergroup relations that previous work has considered, which involved important differences in intergroup status, but also high levels of intergroup competitiveness, conflicts and discrimination. For example, most researchers have focused on ethnic or national groups divided by long-term conflicts or discrimination as White and Black Americans (Judd, Park, Yzerbyt, Muller, & Gordijn, 2005; Livingstone, 2002; Sigelman & Tuch, 1997), White and Indian Canadians (Vorauer et al., 1998; Vorauer, Hunter, Main, & Roy, 2000), or Black and White South Africans (Finchilescu, 2010; Gordijn, Finchilescu, Brix, Wijnants, & Koomen, 2008). Results from these studies were interpreted in terms of status differences. However, the existence of severe conflict and discrimination could have overridden the effect of relative status. In this line, few works have focused on groups enjoying different status in a context of relative harmony, as French and French-speaking Belgians (Klein & Azzi, 2001; Yzerbyt, Provost, & Corneille, 2005).

It seems, so far, that the influence of meta-stereotypes is necessarily adverse for intergroup relations (Finchilescu, 2010; Kamans et al., 2009; Vorauer et al., 1998), probably because people generally assume that outgroup members have a negative image of the ingroup (e.g. Kramer & Messick, 1998; Kramer & Wei, 1999). Meta-stereotypes' activation has proved to generate negative emotions about intergroup interaction, lowered self-esteem, and self-concept clarity (Vorauer et al., 1998), and increased intergroup anxiety (Finchilescu, 2010) and to enhance legitimization of antisocial meta-stereotypical behaviors (Kamans et al., 2009). These findings can be interpreted as a sign of the harmful nature of meta-stereotypes. However, the context where intergroup relations unfold as well as the relative status should be taken into account.

The role of status on the consequences of meta-stereotype activation

When there is no history of long-term conflict and/or chronic discrimination, the relative status between the groups might moderate the effects of meta-stereotype activation on intergroup relations. We predict that meta-stereotype activation will have negative effects on intergroup attitudes towards similar status outgroups, but positive effects towards lower status outgroups.

The "reactive distinctiveness" hypothesis (Jetten, Spears, & Postmes, 2004) may account for our expectations about the effects regarding similar status outgroup. As predicted by Social Identity Theory (Tajfel & Turner, 1979; see also Jetten et al., 2004 for a meta-analyses), a threat to intergroup distinctiveness, such as perceiving high intergroup similarity, induces differentiation in order to restore group distinctiveness. This differentiation is *reactive* because it develops in response to a threat to intergroup distinctiveness. In the present study, that threat might be produced by the activation of the meta-stereotypes. This fact can lead people to judge the ingroup and the outgroup as excessively similar when they enjoy the same level of status. In this case, we might expect that meta-stereotype activation would deteriorate intergroup relations insofar as they would stimulate a greater need for distinctiveness from groups perceived as similar to the ingroup (Brown & Abrams, 1986; Jetten, Spears, & Manstead, 1998; Tajfel, 1982).

However, some others have advocated a positive effect of similarity, as stated by the belief congruence theory (Rokeach, 1960). This hypothesis assumes that similarity promotes attraction and positive relations both at the interpersonal and intergroup level. Similarity is attractive insofar as it facilitates dyadic interactions, fosters a sense of familiarity and safety, and validates individuals' self-concepts (Byrne, 1971). However, some studies addressing the impact of similarity on intergroup relations (Brown & Abrams, 1986; Mummendey & Schreiber, 1984) have yielded mixed results (see Roccas & Schwartz, 1993). Similarity has proven to increase ingroup favoritism on relevant dimensions, simultaneously with readiness to engage in intergroup interaction (Roccas & Schwartz, 1993). To resolve this inconsistency, some have suggested taking intergroup background into consideration to contextualize the meaning of similarities and differences (Mummendey & Wenzel, 1999). For instance, Roccas and Schwartz (1993) suggest that intergroup similarity poses a more serious threat to social identities in real groups as compared with artificial groups. In fact, the vast majority of studies on the similarity-attraction hypothesis have been conducted in laboratory (Luo & Zhang, 2009), therefore, the positive effects of similarity may be overestimated.

When there is no similarity in status between the groups, the need for positive distinctiveness is minimal. Therefore, there is no reason to expect meta-stereotype activation to negatively affect relations of groups differing in status even though previous studies have documented negative outcomes (Finchilescu, 2010; Kamans et al., 2009; Vorauer et al., 1998). On the contrary, perception of the difference in status as legitimate may lead to intergroup acceptance and even appreciation (Mummendey & Wenzel, 1999).

We state that previous results highlighting the negative consequences of metastereotypes were mainly due to the history of intergroup discrimination, rather than to a status difference between the groups. For instance, meta-stereotypes can exert a negative effect on intergroup interactions because members of a high status group expect to be viewed as prejudiced by members of the low status group (Vorauer et al. 1998). However, when the relationship of status is perceived as legitimate, the fear of being considered prejudiced should be diminished. Additionally, meta-stereotype activation could even induce a positive comparison with low status groups (see Branscombe et al., 1999a). These reasons lead us to predict a positive effect of metastereotype activation on intergroup orientations when the outgroup has lower status than the ingroup.

Finally, we expect to find a high desire for contact with members of higher status outgroups regardless of meta-stereotype activation. When the difference in status is perceived as legitimate, individuals of lower status groups can display outgroup favouritism (Jost & Burguess, 2000; Sachdev & Bourhis, 1987) and attach great pragmatic importance to the out-group's perspective due to its greater control over outcomes and resources (Vorauer, 2006). As a consequence, contact with members of high status outgroups may be desirable in itself or based on pragmatic reasons.

Most of the previous studies about meta-stereotypes have focused separately on outgroups of lower (Vorauer et al., 1998, 2000), similar (Yzerbyt, Muller, & Judd, 2009) and higher status than the ingroup (Hopkins et al., 2007; Kamans et al., 2009; Klein & Azzi 2001; Sigelman & Tuch, 1997). Nonetheless, a few studies have simultaneously analyzed the perspective of groups of low and high status, but they did

not explore the consequences of meta-stereotypes (Yzerbyt et al., 2005), nor the effect of status (Finchilescu, 2010). Thus, to the best of our knowledge, no previous research has compared the moderator role of relative ingroup-outgroup status on the effect that meta-stereotype activation may have on intergroup orientations.

In addition, little work has been done to explain the processes that cause metastereotype to affect intergroup orientations, mainly because previous research has been focused on meta-stereotype activation as the process that influences some outcome measures (Vorauer et al., 2009; Vorauer & Turpie, 2004). Our work also constitutes the first attempt to reveal one of the possible mechanisms through which meta-stereotypes operate on intergroup relations. In particular, we propose that perception of verification of ingroup identities may mediate the effects of meta-stereotype activation on intergroup orientations.

The role of verification of ingroup identity on the consequences of meta-stereotype activation

Over the past number of decades, self-verification theory (Swann, 1983) has demonstrated that individuals wish and expect to be seen in the same way they see themselves, and they prefer to interact with others who view them as they view themselves. This coherence motive extends also to the collective level (Chen et al., 2004, 2006) and to the group level through a process named as verification of ingroup identity (Gómez et al., 2009). As mentioned in Chapter 1, verification of ingroup identity refers to individuals' strivings to validate their group memberships and their beliefs about their groups. More importantly, individuals strive to verify their ingroup identity even when such ingroup identities happen to be negative and non-selfdescriptive. In particular, these strivings are stronger among individuals who are highly invested in their group identities (Gómez et al., 2009).

The activation of the meta-stereotype may generate verification strivings, because it forces individuals to think about the image of their group in the eyes of outgroup members, but also to compare such beliefs with the self-perception of the ingroup. As people prefer to interact with those who verify their ingroup identity rather than with those who enhance it (Gómez et al., 2009), even negative meta-stereotypes can lead to positive outcomes insofar as they align with the image that people have about their groups. In fact, under some circumstances, individuals work to legitimize negative meta-stereotypical behavior. Kamans et al. (2009) showed that some people act in line with a negative meta-stereotype to differentiate the ingroup from the outgroup. Individuals generally attempt to modify the meta-stereotype in a positive direction (Klein & Azzi, 2001), but sometimes they try to modify it in a negative direction (Kamans et al., 2009) to gain distinctiveness. These previous pieces of research support our notion that strivings for verification of ingroup identity are independent of the valence of such identity.

#### Overview of the package 1

The present research explores the consequences of meta-stereotype activation for intergroup orientations as well as the processes that moderate and mediate such effects. As strivings to verify group identity have been operationalized as preference for interaction with verifying partners (see Gómez et al., 2009) and intergroup contact has proven to be an effective strategy for improving intergroup relations (Pettigrew & Tropp, 2006), we included desire for interaction with outgroup members as the outcome measure. All four experiments were conducted in a relatively cooperative and harmonious context, the European Union, with the aim of distinguishing the influence of status from the influence of discrimination. As group identification moderates verification strivings (Gómez et al., 2009), we included an identification scale in all the studies.

Study 1 was designed to test the effect of meta-stereotype activation on the desire to interact with members of outgroups enjoying lower, similar or higher status than the ingroup. In study 2, we focused on two kinds of lower status outgroups, countries of the European Union or ethnic minorities. Our goal was to check whether the effect of meta-stereotype activation differs as a function of the specific outgroups considered. Study 3 tried to replicate the results obtained in Study 1 regarding outgroups of similar status with a different sample and a different methodology. Finally, in Study 4 we added another dependent variable, willingness to be sincere with outgroup members. But, more importantly, we sought to explore how the accessibility and the valence of the meta-stereotype interact to produce ironic effects on intergroup orientations. The *a priori* expected effect of the valence could be dramatically reversed, such that negative meta-stereotypes could produce positive consequences and positive meta-stereotypes could generate negative effects, if participants experience difficulty to

retrieve them. Therefore, the effect of the valence will be qualified by the subjective ease or difficulty of retrieval.

#### Study 1:

### Does outgroup status moderate the effect of meta-stereotype activation on the desire to interact with outgroup members?

The present study was designed to investigate the effect of meta-stereotype activation on the desire to interact with outgroup members when the status of the outgroup is similar, lower or higher than the status of the ingroup. The design was a factorial 2 (control vs. meta-stereotype activation) x 3 (outgroup status: lower vs. similar vs. higher) with identification as a continuous measure.

Our general prediction is that meta-stereotype activation will decrease the desire to interact with outgroup members of similar status outgroups (hypothesis 1a), but it will increase the desire to interact with members of lower status outgroups (hypothesis 1b), both as compared to a control condition. Meta-stereotype activation will not produce any effect on the desire to interact with members of a higher status outgroups as compared to a control condition (hypothesis 1c). In addition, we expect that the effect of meta-stereotype activation on the desire to interact with members of similar and lower status outgroups will be mediated by verification of ingroup identity (hypothesis 1d).

#### Method

#### **Participants**

One hundred and three undergraduates (91 women and 12 men, mean age = 32.59, SD = 8.37) enrolled at the Universidad Nacional de Educación a Distancia (UNED) completed the questionnaire individually on the web for course credit.

#### Procedure

After providing students with a brief description of the investigation, without disclosing its real purpose, they were randomly assigned to the different experimental conditions. Participants first completed an ingroup identification scale adapted from Jetten, Spears, and Manstead (1996), including four items: "I identify with Spaniards", "I feel strong ties with Spaniards", "I feel attached to my identity as a Spaniard", and "I

feel a strong sense of solidarity with other Spaniards", on a 7-point scale ranging from 0 ("strongly disagree") to 6 ("strongly agree"),  $\alpha = .93$ .

After this, participants were presented with a list of the other 26 countries in the European Union. *Participants in the lower status outgroup condition* were asked to choose the country they considered as having the lowest status as compared to Spain. The same procedure was followed with participants assigned to the *similar* and *higher status outgroups conditions*. Participants learned that anytime that we referred to "the outgroup" in the following questionnaire, they should think of the country they had specified. No analyses were qualified by the specific country that each participant had chosen.

Manipulation check of status. To check that participants considered the outgroup as having a lower, similar, or higher status than the ingroup, they responded to the following items on a 7-point scale ranging from 0 ("strongly disagree") to 6 ("strongly agree"): "I think that, in general, the economic level of outgroup members is similar/lower/higher to/than the economic level of Spaniards", "I think that outgroup members have similar/lower/higher access to education as compared with Spaniards," and "I think that the political influence of the outgroup at the European Union is similar/lower/higher to/than the influence of Spain", ( $\alpha = .86$ ). Items were adapted for each condition according to the relative status of the ingroup as compared to the outgroup. When responses to the manipulation check were compared to the midpoint of the scale (3), participants in the similar status outgroup condition perceived the outgroup as having a similar status than the ingroup, M = 4.13, SD = .91, t(37) = 7.65, p < .001, participants in the low status outgroup condition perceived the outgroup as having a lower status than the ingroup, M = 3.96, SD = 1.49, t (27) = 3.43, p < .01, whereas participants in the high status outgroup condition perceived the outgroup as having a higher status than the ingroup, M = 4.29, SD = 1.68, t(36) = 4.66, p < .001. An ANOVA showed no differences between the three means, ps > .41.

Once the specific outgroup was chosen depending on the outgroup status condition, participants were randomly assigned to the control or to the meta-stereotype activation condition. *Participants in the control condition* directly proceeded to the rest of the questionnaire. Participants in the *meta-stereotype activation condition* were asked to indicate, in counterbalanced order, the percentage of ingroup members (i.e., Spaniards) that, according to outgroup members (i.e., members of the country that they

had selected), was characterized by each of three positive (*nice, sociable,* and *funny*) and three negative traits (*unpunctual, rude,* and *arrogant*), previously obtained in a pilot testing study. In addition, they had to evaluate each of the traits on a 7-point scale ranging from -3 ("completely negative") to +3 ("completely positive"). We conducted a repeated measure ANOVA considering the valence of the positive and the negative traits as the intra-subject factor and the relative status of the ingroup as the inter-subject factor. A main effect of the intra-subject factor emerged, F(2, 50) = 1563.87, p < .001, indicating that participants perceived the positive and negative traits as different according to their valence, M = 2.44, SD = .47 and M = -2.19, SD = .57, respectively. Both evaluations were perceived as different from the midpoint of the scale (0), ps < .001. No other effect was significant, ps > .09.

Desire to interact with outgroup members was evaluated by a 3-items scale ranging from 0 ("strongly disagree") to 6 ("strongly agree"): "I would like to have more friends from this country", "I would like to visit that country if it means meeting people from there" and "I would like to work/study with people from this country",  $\alpha = .87$ .

*Verification of ingroup identity* was assessed by using three items adapted from Gómez et al. (2009) ranging from 0 ("strongly disagree") to 6 ("strongly agree"): "Members of this country treat Spaniards in such a way that they make us feel that our country is understood", "Members of this country understand Spaniards" and "Members of this country see Spaniards as we see ourselves",  $\alpha = .80$ .

When all questions had been completed, participants were debriefed, thanked, and dismissed.

#### Results

To test the effect of status, meta-stereotype activation and identification on our outcome measures (desire to interact and verification of ingroup identity) we performed two multiple regression analyses including as predictors: outgroup status, meta-stereotype activation, and identification, all two way interactions and the three way interaction on the desire to interact with outgroup members. We represented meta-stereotype activation and outgroup status by effect coding (-1, 1, and -1, 0, 1, respectively). Also, as suggested by Aiken and West (1991), identification was centered.

#### Desire to interact with outgroup members

The regression analysis onto desire for interaction yielded a significant effect of the interaction between status and meta-stereotype activation condition,  $\beta = -.36$ , t (95) = -2.91, p < .01. As showed in Figure 2.1, in the similar outgroup status condition, the desire to interact with outgroup members was lower in the meta-stereotype activation condition than in the control condition, M = 4.42, SD = 1.03 vs. M = 5.04, SD = .56, respectively, t (36) = 2.27, p < .05. However, in the lower status outgroup condition, the desire to interact with outgroup members was higher in the meta-stereotype activation condition than in the control condition, M = 4.00, SD = 1.55 vs. M = 2.60, SD = 1.44, respectively, t (26) = -2.48, p < .05. Finally, no difference was produced between the control and the activation conditions in the higher status outgroup condition, p = .89.

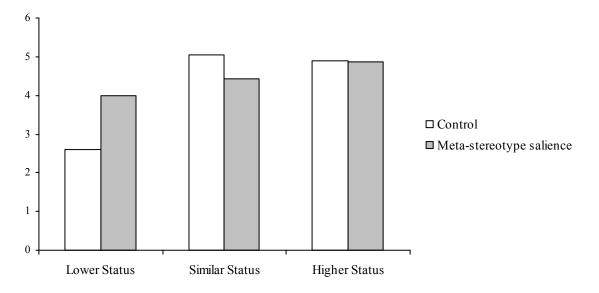


Figure 2.1. Desire to interact with outgroup members as a function of metastereotype activation and outgroup status

The regression analysis also yielded a main effect of status  $\beta = .70$ , t (95) = 5.79, p < .001, indicating that participants showed a lower desire to interact with members of a lower status group, M = 3.25, SD = 1.63, than with members of a higher status group, M = 4.88, SD = .79, t (63) = -5.33, p < .001, and with members of a similar status group, M = 4.71, SD = .89, t (64) = -4.68, p < .001. No difference was found between the similar and higher status conditions, p = .38. No other effects were significant, ps = .15.

#### Verification of ingroup identity

The regression analysis onto verification of ingroup identity yielded a significant effect of the interaction between status and meta-stereotype activation condition,  $\beta = -.40$ , t (95) = -2.81, p < .01. In the similar status outgroup condition, the verification of ingroup identity was lower in the meta-stereotype activation condition than in the control condition, M = 3.17, SD = .94 vs. M = 3.93, SD = 1.13 respectively, t (36) = 2.25, p < .05. However, in the lower status outgroup condition, the verification of ingroup identity was higher in the meta-stereotype activation condition than in the control condition, M = 3.28, SD = .81 vs. M = 2.18, SD = .93 respectively, t (26) = -3.31, p < .01. Finally, in the higher status outgroup condition, no difference was produced between the control and the activation conditions, p = .22.

The regression analysis also yielded a main effect of status  $\beta = .29$ , t (95) = 2.11, p < .05, indicating that participants showed greater verification of ingroup identity in the similar status outgroup condition, M = 3.53, SD = 1.09, than in the lower status outgroup condition, M = 2.69, SD = 1.03, t (64) = 3.15, p < .01, and in the higher status outgroup condition, M = 2.82, SD = .99, t (73) = 2.94, p < .01. No difference was found between the lower and higher status conditions, p = .61. No other effects were significant, ps = .26.

#### Verification of ingroup identity as mediator

To test whether the interactive effect of outgroup status and meta-stereotype activation on the desire to interact with outgroup members was mediated by verification of ingroup identity, we conducted a bootstrapping test (n boots = 5,000) using the SPSS macro provided by Preacher and Hayes (2008). The high status outgroup condition was excluded from the analysis because, as predicted, we did not find an effect of meta-stereotype activation on the outcome measures on this condition. The results of the analysis (see Figure 2.2) indicated that verification of ingroup identity mediated the interaction between meta-stereotype activation by outgroup status on the desire to interact with outgroup members (the confidence interval of the bootstrapping at the 95% confidence interval did not include zero, and the effect of the manipulation was no longer significant when the mediator was included in the equation).

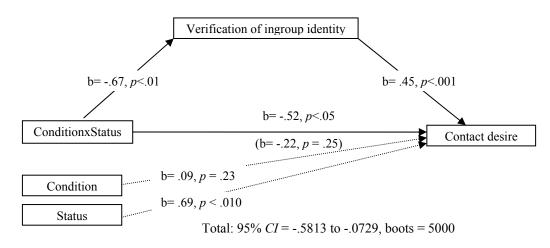


Figure 2.2. Verification of ingroup identity as a mediator of the impact of outgroup status and meta-stereotype activation on the desire to interact with outgroup members

#### Conclusion

The present study tested the effect of meta-stereotype activation on the desire to interact with outgroup members when the status of the outgroup was similar, lower or higher than the status of the ingroup. As predicted, the activation of the meta-stereotype reduced the desire to interact with members when the outgroup had similar status than the ingroup (hypothesis 1a), whereas it increased the desire to interact with outgroup members when the outgroup had lower status than the ingroup (hypothesis 1b). Also as expected, when the status of the outgroup was higher than the status of the ingroup, meta-stereotype activation did not affect the desire to interact with outgroup members (hypothesis 1c).

Furthermore, verification of ingroup identity mediated the effects of the interaction between outgroup status and meta-stereotype activation on the desire to interact with outgroup members (hypothesis 1d). When the status of the outgroup was similar to the status of the ingroup, meta-stereotype activation reduced the desire to interact with outgroup members because it decreased the verification of ingroup identity. On the contrary, when the status of the outgroup was lower than the status of the ingroup, meta-stereotype activation increased the desire to interact with outgroup members because it decreased the desire to interact with outgroup members because it decreased the desire to interact with outgroup members because it decreased the desire to interact with outgroup members because it increased the desire to interact with outgroup members because it increased the desire to interact with outgroup members because it increased the verification of ingroup identity.

Ingroup identification did not moderate the effects of status or meta-stereotype activation on the desire to interact with outgroup members. However, inspection of

means revealed that ingroup identification was significantly higher than the theoretical midpoint of the scale (3), M = 4.48, SD = .99, t (102) = 9.60, p < .001, and 83.5% of participants were highly identified with the group. The fact that we did not find a moderation effect of identification was probably an artifact of the distribution of the participants on this variable but not a reason to reject the validity of our findings.

These results partially support the findings indicating that meta-stereotype activation can produce negative consequences for intergroup relations (Vorauer et al., 1998). This negative effect only emerged when ingroup and outgroup shared a similar level of status, probably because this high degree of similarity could have threatened the sense of distinctiveness that ingroup members need (Jetten et al., 1998).

In contrast, when the outgroup held a lower status than the ingroup, the activation of the meta-stereotype stimulated the desire for interaction with outgroup members, who could constitute a source of positive comparison (Branscombe et al, 1999a). Finally, in the case of high status outgroups, the desire for intergroup contact was stable and high across conditions. Even though the level of verification was similar to the low status condition, the desire for interaction was higher, suggesting that interacting with members of higher status groups may be desirable for other purposes.

Three main reasons motivate us to continue exploring the effects of metastereotype activation on intergroup orientations only with outgroups having a similar or lower status than the ingroup. First, the desire to interact with members of higher status outgroups is already sufficiently high, therefore, there is little room for improvement. Second, members of low status groups are usually the target of prejudice and discrimination. According to study 1, verification of ingroup identity could be a tool to increase the desire to interact with members of these groups. Third, meta-stereotype activation reduced the desire to interact with members of similar status outgroups. As few studies have analyzed the meta-stereotype effects when ingroup and outgroup have similar status, these results need replication.

In order to consolidate findings obtained in the present study, and to increase its generalizability, Studies 2 and 3 were designed to replicate and extend previous results. One main characteristic differentiates Studies 2-3 from Study 1: the effects of metastereotype activation will be tested separately; when the outgroup has a lower status than the ingroup (Study 2) and when the outgroup has the same status than the ingroup (Study 3). In addition, Study 2 will test the effect of meta-stereotype activation with two kinds of low status outgroups: lowers status country vs. lower status ethnic minority. Study 3 will be conducted using paper and pencil questionnaires instead of web versions, and participants will be high school students instead of undergraduates. To increase intergroup similarity, the outgroup will not be selected by each participant, but it will be fixed based on previous preliminary studies.

#### Study 2:

## Is the effect of meta-stereotype activation moderated by the type of lower status outgroup considered?

Study 2 explored the consequences of meta-stereotype activation considering two types of lower status outgroups: a country vs. a minority (immigrants). One of the most important studies on meta-stereotypes, Vorauer et al.'s (1998), considered an ethnic minority as the lower status outgroup. Including this condition would allow for the comparison between our results and theirs.

The design is a factorial 2 (control vs. meta-stereotype activation) x 2 (lower status country vs. lower status minority) with identification as a continuous measure. We expected that participants in the meta-stereotype activation condition would increase the desire to interact with outgroup members as compared to participants in the control condition (hypothesis 2a) and that this effect would be mediated by verification of ingroup identity (hypothesis 2b). Meta-stereotype activation should increase the desire to interact with outgroup members to the same extent when the lower status outgroup is a country and when it is a minority (hypothesis 2c).

#### Method

#### **Participants**

Sixty seven undergraduate students (46 women and 21 men, mean age = 33.78, SD = 9.29) enrolled at the Universidad Nacional de Educación a Distancia (UNED) completed this questionnaire individually on the Web for course credit.

#### Procedure

The procedure basically replicated the design of Study 1. During the first wave, participants completed the same ingroup identification scale as in Study 1,  $\alpha = .90$ .

Participants in the low status outgroup condition followed the same procedure as in Study 1. Participants in the minority outgroup condition were presented with a list of the largest immigrant groups living in Spain (Moroccan, East European, Latinos, Africans, Asian or others) and they were asked to select the group of immigrants they consider as the most representative of the category "immigrant". Once each participant decided the low status outgroup or the minority outgroup, they learned that anytime that we referred to "the outgroup" in the following questionnaire, they should think of the group they had chosen. No analyses were qualified by the specific outgroup that each participant had chosen, so this variable was excluded from now on.

*Manipulation check of status.* Participants were presented with the same three questions as in Study 1 (i.e., "I think that, in general, the economic level of the outgroup is lower than the economic level of Spaniards"),  $\alpha = .67$ . An ANOVA on the manipulation check including the meta-stereotype activation condition and the type of outgroup (country vs. minority), showed no significant effects, ps > .18. A t-test indicated that participants perceived the outgroup status as lower to the ingroup status as compared to the theoretical mid-point of the scale (3), M = 3.43, SD = 1.26, t (66) = 2.81, p < .01.

Next, participants were randomly assigned to the meta-stereotype activation or to the control conditions and followed the same procedure as in Study 1. For participants in the meta-stereotype activation condition, a paired *t*-test indicated that participants perceived the positive and negative traits as different according to their valence, M = 2.46, SD = .48 and M = -2.14, SD = .66 respectively, t (29) = -28.58, p < .001.

Desire to interact with outgroup members and Verification of ingroup identity were assessed by the same scales as in Study 1,  $\alpha s = .87$  and .84 respectively.

When participants had completed all questions they were debriefed, thanked, and dismissed.

#### Results

To test the effect of the meta-stereotype condition, type of outgroup and identification on the outcome variables (desire for interaction and verification of ingroup identity), we performed two multiple regression analyses including meta-stereotype activation, identification with the ingroup and the type of outgroup (lower status country vs. lower status minority) and the two and three way interactions on the

desire to interact with outgroup members. We represented meta-stereotype activation and type of outgroup by effect coding (-1, 1). Also, as suggested by Aiken and West (1991), identification was centered.

#### Desire to interact with outgroup members

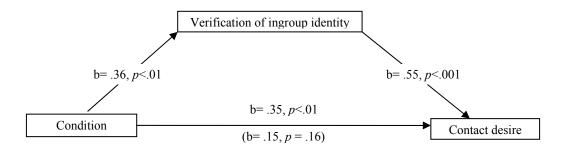
As expected, the regression analysis onto desire for interaction yielded a significant effect of the meta-stereotype activation condition,  $\beta = .32$ , t (59) = 2.62, p < .05. Participants in the meta-stereotype activation condition reported more desire to interact with outgroup members than participants in the control condition, M = 4.62, SD = 1.04 vs. M = 3.68, SD = 1.44 respectively, t (65) = 3.02, p < .01. No other effects were significant, ps > .25.

#### Verification of ingroup identity

The regression analysis onto verification of ingroup identity yielded a significant effect of the meta-stereotype activation condition,  $\beta = .29$ , t (59) = 2.57, p < .01. Participants in the meta-stereotype activation condition showed more verification of ingroup identity than participants in the control condition, M = 3.62, SD = .99 vs. M = 2.72, SD = 1.23 respectively, t (65) = 3.24, p < .01. No other higher order effects were significant, ps > .09.

#### Verification of ingroup identity as mediator

To test whether the effect of meta-stereotype activation on the desire to interact with outgroup members was mediated by the verification of ingroup identity, we conducted a bootstrapping test (n boots = 5,000) using the SPSS macro provided by Preacher and Hayes (2008). The results of the analysis (see Figure 2.3) indicated that the verification of ingroup identity mediated the effect of meta-stereotype activation on the desire to interact with outgroup members (the confidence interval of the bootstrapping at the 95% confidence interval did not include zero, and the effect of the manipulation was no longer significant when the mediator was included in the equation).



Total: 95% CI = .0690 to .4202, boots = 5000

Figure 2.3. Verification of ingroup identity as a mediator of meta-stereotype activation on the desire to interact with members of a lower status outgroup

#### Conclusion

Replicating the results of Study 1, Study 2 showed that meta-stereotype activation increased the desire to interact with outgroup members when the outgroup status was lower than the ingroup status (hypothesis 2a). In addition, the verification of ingroup identity mediated the effect of meta-stereotype activation on the desire to interact with outgroup members (hypothesis 2b). More importantly, replicating but also extending previous results, this study demonstrated that meta-stereotype activation increased the desire to interact with low status outgroup members to the same extent when the outgroup was a country and when the outgroup was an ethnic minority group (hypothesis 2c).

As in Study 1, no effect was moderated by ingroup identification. A t-test indicated that the mean of ingroup identification was significantly higher than the theoretical midpoint of the scale (3), M = 4.43, SD = 1.19, t (66) = 9.79, p < .001, with only five participants below this midpoint. In particular, 92.5% of participants scored higher than the midpoint of the scale (3).

Results of Study 2 seem to contradict the findings of Vorauer et al. (1998) with ethnic minorities. Probably, the reason for this contradiction lies in the Canadian context, which differs substantially from the Spanish context. Due to a long history of discrimination, Indian Canadians actually hold a negative image of White Canadians, very discrepant with the image that Canadians have about themselves. In such circumstances, verification of ingroup identity can hardly emerge.

The results of Study 2 replicated those of Study 1 for the lower status outgroup, but the effect of meta-stereotype activation on desire to interact with outgroup members when the status of the outgroup is similar still needs replication. Study 3 replicates and increases the generalizability of previous findings. Three key points differentiate Study 3 from Studies 1 and 2: (1) we conducted our study with high school students instead of adults, (2) we fixed a specific outgroup with similar status to the ingroup according to preliminary studies and (3) we employed paper and pen questionnaires instead of web studies.

#### Study 3:

#### Replication of Study 1 with different sample and methodology

The main goal of the present study was to replicate and extend the results obtained in Study 1 concerning the effect of meta-stereotype activation on the desire to interact with members of a similar status outgroup. Our general prediction is that metastereotype activation will decrease the desire to interact with members of a similar status outgroup as compared to a control condition (hypothesis 3a). In addition, the effect of meta-stereotype activation on the desire to interact with outgroup members will be mediated by verification of ingroup identity (hypothesis 3b).

#### Method

#### **Participants**

Thirty eight high school students (14 girls and 24 boys, mean age = 15.37, SD = 1.05) from Madrid participated with the consent of their school and parents.

#### Procedure

After providing students with a brief description of the investigation, without disclosing its real purpose, participants first completed the same ingroup identification scale as in previous studies,  $\alpha = .78$ . Next, participants were randomly assigned to the meta-stereotype activation or to the control conditions.

In the present study, we slightly modified the procedure and decided to fix the same outgroup for all participants. To that end, we did three preliminary studies.

Forty eight high school students (17 girls and 31 boys, mean age = 14.69, SD = .72) participated in a pilot study in order to determine which country from the European Union was the most similar to the ingroup according to their status. The countries which received the highest frequencies were Italy (29.2%), France (29.2%), and Portugal (20.8%). In order to make sure these countries were considered as similar in status to

Spain, we conducted two additional pilot studies asking for countries with lower and higher status than Spain. Forty eight high school students (20 girls and 28 boys, mean age = 14.62, SD = .53) had to determine which countries from the European Union had higher status than Spain, while 45 high school students (18 girls and 27 boys, mean age = 15.9569, SD = .49) had to determine which countries from the European Union had lower status than Spain. Portugal was one of the most cited countries in the pilot study considering lower status whereas France was one of the most cited countries in the pilot study study considering higher status outgroups. Italy was not referred to by the participants in these additional pilot studies. These findings led us to consider Italy as the country with unequivocally most similar status as compared with Spain.

Next, participants were randomly assigned to the meta-stereotype activation or to the control condition and followed the same procedure as in Study 1. For participants in the meta-stereotype activation condition, a paired *t*-test analysis showed a significant difference between the valence of positive and negative traits, M = 2.16, SD = .54 and M = -1.55, SD = .77 respectively, t (18) = -15.26, p < .001.

*Manipulation check of status.* Participants completed the same scale as in Studies 1 and 2 with statements as: "I think that, in general, the economic level of Italians is similar to the economic level of Spaniards",  $\alpha = .74$ . An ANOVA on the manipulation check of status showed no difference between the control and the meta-stereotype activation conditions, F(1, 36) = .06, p = .80. A *t*-test indicated that participants perceived the ingroup status to be similar to the outgroup status as compared to the theoretical midpoint of the scale (3), M = 4.04, SD = 1.05, t(37) = 6.13, p < .001.

Desire to interact with outgroup members and Verification of ingroup identity were measured by the same scales as in Studies 1-2,  $\alpha s = .69$  and .75 respectively.

When all questions had been completed, participants were debriefed, thanked, and dismissed.

#### Results

To test the effect of meta-stereotype activation and identification on our outcome variables (desire for interaction and verification of ingroup identity), we performed two multiple regression analyses including as predictors: meta-stereotype activation (effect coding, -1, 1), and identification (centered), and the two way interaction on the desire to interact with outgroup members.

#### Desire to interact with outgroup members

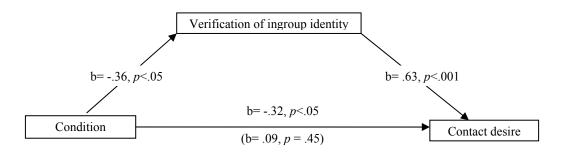
The regression analysis onto desire for interaction yielded a significant effect of the meta-stereotype activation condition,  $\beta = -.36$ , t (34) = -2.20, p < .05. Participants in the meta-stereotype activation condition, showed a lower desire to interact with outgroup members than participants in the control condition, M = 4.05, SD = .69 vs. M = 4.68, SD = 1.03, t (36) = -2.22, p < .05. No other effect was significant, ps > .50.

#### Verification of ingroup identity

The regression analysis onto verification of ingroup identity yielded a significant effect of the meta-stereotype activation condition, B = -.42, t (34) = -2.52, p < .05. Participants in the meta-stereotype activation condition perceived lower verification of ingroup identity than participants in the control condition, M = 3.16, SD = .83 vs. M = 3.93, SD = 1.15, t (36) = -2.37, p < .05. No other effects were significant, ps > .28.

#### Verification of ingroup identity as mediator

To test whether the effect of meta-stereotype activation on the desire to interact with outgroup members was mediated by verification of ingroup identity, we conducted a bootstrapping test (n boots = 5,000) using the SPSS macro provided by Preacher and Hayes (2008). The results of the analysis (see Figure 2.4) indicated that verification of ingroup identity mediated the effect of meta-stereotype activation on the desire to interact with outgroup members (the confidence interval of the bootstrapping at the 95% confidence interval did not include zero, and the effect of the manipulation was no longer significant when the mediator was included in the equation).



Total: 95% *CI* = -.4194 to -.0548, boots = 5000

Figure 2.4. Verification of ingroup identity as a mediator of meta-stereotype activation on the desire to interact with members of a similar status outgroup

#### Conclusion

Study 3 replicated previous findings from Study 1 showing that meta-stereotype activation reduced the desire to interact with outgroup members when ingroup and outgroup had a similar status (hypothesis 3a), and that this effect was mediated by a decrease in the perception of verification of ingroup identity (hypothesis 3b). This result is coherent with the literature about positive distinctiveness (i.e. Brewer, 2003; Mummendey, 1995). A high similarity between ingroup and outgroup on relevant dimensions threatens the sense of distinctive social identity (see Brewer, 1999). Therefore, participants could reduce their desire to interact with outgroup members if they perceive a threat to their social identity.

Ingroup identification did not moderate the effect of meta-stereotype activation, probably because most participants scored over the midpoint of the scale. A t-test indicated that the mean of ingroup identification was significantly higher than the theoretical midpoint of the scale (3), M = 4.48, SD = .99, t (37) = 9.17, p < .001, with only four participants below this midpoint. In particular, 89.5% of participants scored higher than the midpoint of the scale.

The fact of replicating previous results considering a different methodology and age range help consolidate our findings from Study 1. So far, Studies 1 to 3 have shown that the activation of meta-stereotypes produces different effects on the desire to interact with outgroup members, and that these effects are moderated by the outgroup status and mediated by the verification of ingroup identity.

Even though the results across three studies seem sufficiently consistent to generalize our findings, critics might argue at least three limitations. First, we activated meta-stereotypes by using specific traits obtained in three pilot testing studies. Some participants could disagree with some of those traits. Second, we presented simultaneously positive and negative traits. Therefore, it was not possible to explore the effect of the valence of the meta-stereotype on the outcome measures. Third, all these studies have maintained a constant number of traits for the meta-stereotype activation condition. However, the meta-stereotype could be more accessible for some participants than for others, which could influence their subsequent responses.

The next and final study of this package was designed to solve such limitations. Participants had the opportunity of deciding the traits which they wanted to include in the meta-stereotype, instead of using a restrictive list of traits. Study 4 manipulated the number and the quality of the traits required to test the effect of the meta-stereotype accessibility and valence.

We will focus on lower status outgroups because the interaction with them is less desirable as Studies 1 and 2 have shown. Therefore, it is more interesting to deepen our understanding of the conditions that could stimulate contact with low status groups, which usually are the target of prejudice.

#### Study 4:

### How does the interaction of accessibility by valence of the meta-stereotype influence intergroup orientations?

Previous research has demonstrated that the recalled content may be qualified by the degree of difficulty with which such content can be brought to mind. Schwarz et al. (1991) showed that when participants were asked to describe six (high accessibility) or twelve (low accessibility) situations in which they were assertive or unassertive, participants assigned themselves higher assertiveness after recalling six rather than twelve examples of assertive behavior and they attributed themselves more unassertiveness after recalling six rather than twelve examples of unassertive behavior.

Based on Schwarz et al. (1991), Study 4 tries to test whether the degree of accessibility and the valence of the meta-stereotype moderate the effect of its activation on the desire to interact with outgroup members. We expect that the valence of the meta-stereotype will be qualified by the ease of retrieval. The difficulty of generating a lengthy list of meta-stereotypical traits of a certain valence (positive or negative) will lead to the conclusion that members of other groups do not assign so many traits with that valence to their group. The consequence will then be a lower desire to interact with outgroup members when thinking about positive traits, and a higher desire for interaction when focusing on negative traits. In a similar vein, the ease of retrieval of meta-stereotypical traits with a specific valence will induce higher desire for interaction when listing only positive traits and a lower desire for interaction when thinking about positive traits.

Additionally, we included a new dependent variable. As we use the same outcome measure across the three studies, we cannot determine whether the activation of meta-

stereotype could have positive effects on other variables. One of the factors that could increase interpersonal and intergroup conflict is distrust between the counterparts (Dovidio et al., 2008). People are reluctant to tell others what they really think of them to avoid negative consequences. However, making people aware that others have an accurate perception of their group could lead them to reciprocate that sincerity by telling outgroup members how ingroup members see them. We predict that, when meta-stereotype activation increases verification of ingroup identity, ingroup members will be more willing to be sincere with outgroup members.

Summarizing, the main goal of the present study is to explore the interactive effect of the valence and the accessibility of meta-stereotype activation on intergroup orientations, in particular, the desire to interact and willingness to be sincere with outgroup members. The design is a factorial 2 (accessibility of the meta-stereotype: low vs. high) x 2 (valence of the meta-stereotype: positive vs. negative) with identification as a continuous measure.

We expect that participants in the positive valence condition will show more positive intergroup orientations in the high accessibility than in the low accessibility condition (hypothesis 4a). Reversely, participants in the negative valence condition will display more positive intergroup orientations in the low accessibility than in the high accessibility condition (hypothesis 4b). Additionally, we expect that this interaction between valence and accessibility will be mediated by the verification of ingroup identity (hypothesis 4c).

#### Method

#### **Participants**

One hundred and sixty four undergraduate students (139 women and 25 men, mean age = 30.85, SD = 9.16) enrolled at the Universidad Nacional de Educación a Distancia (UNED) completed the questionnaire individually on the Web for course credits.

#### Procedure

After providing participants with a brief description of the investigation, without disclosing its real purpose, participants were randomly assigned to one of the four experimental conditions. Participants first completed the ingroup identification scale adapted from Jetten et al. (1996),  $\alpha = .89$ . Then, participants were asked to select a

country of low status as in Studies 1 and 2. *Participants in the low accessibility conditions* had to list seven traits they think that outgroup members assign to ingroup members. *Participants in the high accessibility conditions* were asked to write three traits that they think outgroup members assign to ingroup members. *Participants in the high accessibility conditions* were asked to write three traits that they think outgroup members assign to ingroup members. *Participants in the positive valence conditions* had to list only positive traits whereas *participants in the negative valence conditions* were asked to write only negative traits.

In all conditions, after indicating the percentage of ingroup members that, according to outgroup members, are characterized by each of those traits they had written before, they had to indicate: 1) their evaluation of each of the traits on a 7-point scale ranging from -3 ("completely negative") to +3 ("completely positive"),  $\alpha s = .92$  and .84 for the low and high accessibility conditions respectively, 2) their certainty about each of the traits they had listed on a 7-point scale ranging from -3 ("completely certain")  $\alpha s = .87$  and .89 for the low and high accessibility conditions respectively of the task of choosing the traits on a 3 items-scale ("difficulty of the task", "time required to complete the task", and "effort employed to complete the task"),  $\alpha = .94$ , ranging from 0 ("a lot") to 9 ("very little").

An accessibility x valence ANOVA on the perceived valence of the traits revealed a main effect of the valence, F(1, 160) = 144.28, p < .001, indicating that participants in the negative valence conditions perceived the negative traits as more negative than participants in the positive valence conditions, M = -1.21, SD = 1.28 vs. M = 1.36, SD =1.43 respectively, p < .001. Participants in the negative valence conditions perceived the traits as negative as compared to the midpoint of the scale (0), t(72) = -8.07, p < .001, whereas participants in the positive valence conditions perceived the positive traits as positive as compared to the midpoint of the scale, t(90) = 9.06, p < .001. No other effect was significant, ps > .16.

The 2 x 2 ANOVA on the certainty of the traits did not yield any significant effect, ps > .13, indicating that the certainty of the traits they had chosen for the meta-stereotype did not vary as a function of the experimental manipulations. Participants were certain about the traits, as the mean was higher than the theoretical midpoint of the scale (0), t(163) = 5.68, p < .001.

The 2 x 2 ANOVA on the complexity of the task indicated a main effect of accessibility, F(1, 160) = 10.87, p < .001. Participants in the low accessibility condition perceived the task as more complex than participants in the high accessibility condition, M= 4.17, SD= 2.12 vs. M= 5.28 SD= 2.31 (lower means indicating more difficulty), t (162) = -3.19, p < .01. The effect of the valence was also significant, F(1, 160) = 12.63, p < .001. Participants in the negative valence conditions perceived the task as more complex than participants in the positive valence conditions, M= 4.04, SD= 2.27 vs. M= 5.27, SD= 2.14, t(162) = -3.58, p < .001. No other higher effect was significant, p = .20.

Finally, participants proceeded to the rest of the questionnaire. All the measures used 7-point scales ranging from 0 ("strongly disagree") to 6 ("strongly agree").

*Manipulation check of status*. In order to test whether participants considered that the outgroup had a lower status than the ingroup, they completed the same scale as in previous studies,  $\alpha = .81$ . A t-test indicated that participants perceived the outgroup status to be lower than the ingroup status as compared to the theoretical midpoint of the scale (3), M = 4.22, SD = 1.40, t (163) = 11.20, p < .001

Desire to interact with outgroup members and Verification of ingroup identity were measured by the same scales as in Study 1,  $\alpha s = .81$  and .75 respectively.

*Willingness to be sincere with outgroup members* was assessed by three items: "I trust outgroup members enough to say what I do not like about them", "If I had to interact with outgroup members, I would be sincere with them" and "I would have no problem to say what I think about outgroup members",  $\alpha = .78$ .

When all questions had been completed, participants were debriefed and thanked.

#### Results

To determine the effect of meta-stereotype accessibility and valence, and ingroup identification on the outcome variables (desire to interact with outgroup members, willingness to be sincere with outgroup members, and verification of ingroup identity), we performed three multiple regression analyses including as predictors: meta-stereotype accessibility, meta-stereotype valence, identification, and the two way and three way interactions. We represented meta-stereotype accessibility and valence by effect coding (-1, 1) and, as suggested by Aiken and West (1991), identification was centered.

#### Desire to interact with outgroup members

As predicted, the regression analysis on the desire to interact with outgroup members yielded a significant effect of the interaction between accessibility and valence,  $\beta = .40$ , t (156) = 5.33, p < .001. As shown on the left side of Figure 2.5, participants in the positive valence condition expressed more desire to interact with outgroup members in the high accessibility condition than in the low accessibility condition, M = 4.37, SD = .87 vs. M = 3.19, SD = 1.42 respectively, t (89) = 4.81, p < .001. However, as shown on the right side of Figure 5, participants in the negative valence condition expressed more desire to interact of expressed more desire to interact with outgroup members in the negative valence condition expressed more desire to interact of expressed more desire to interact with outgroup members in the negative valence condition expressed more desire to interact with outgroup members in the low accessibility condition than in the high accessibility condition, M = 4.17, SD = 1.12 vs. M = 3.31, SD = 1.41 respectively, t (71) = 2.87, p < .01. No other effect was significant, ps > .26.

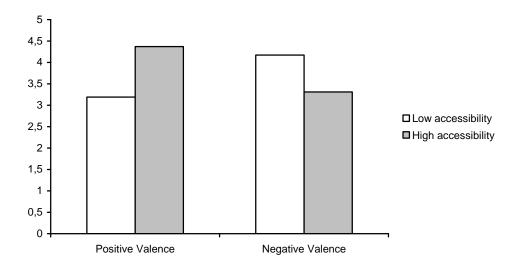


Figure 2.5. Desire to interact with members of a lower status outgroup as a function of meta-stereotype accessibility and valence

#### Willingness to be sincere with outgroup members

The regression analysis onto willingness to be sincere with outgroup members yielded a significant effect of the interaction between accessibility and valence,  $\beta = .35$ , t (156) = 4.50, p < .001. As shown on the left side of Figure 2.6, participants in the positive valence condition expressed more willingness to be sincere with outgroup members in the high accessibility condition than in the low accessibility condition, M = 3.65, SD = 1.37 vs. M = 2.61, SD = 1.33 respectively, t (89) = 3.64, p < .001. However,

as shown on the right side of Figure 2.6, participants in the negative valence condition expressed more willingness to be sincere with outgroup members in the low accessibility condition than in the high accessibility condition, M = 3.47, SD = 1.13 vs. M = 2.63, SD = 1.49 respectively, t (71) = 2.74, p < .01. No other effects were significant, ps > .10.

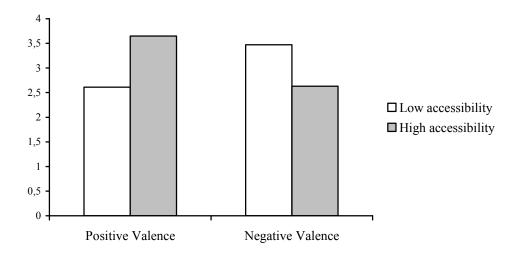


Figure 2.6. Willingness to be sincere with members of lower status outgroups as a function of the meta-stereotype accessibility and valence

#### Verification of ingroup identity

The regression analysis onto verification of ingroup identity yielded a significant effect of the interaction between accessibility and valence  $\beta = .38$ , t (156) = 5.12, p < .001. As shown on the left side of Figure 2.7, participants in the positive valence condition expressed more verification of ingroup identity in the high accessibility condition than in the low accessibility condition, M = 3.13, SD = 1.25 vs. M = 2.28, SD = .79 respectively, t (89) = 3.83, p < .001. However, as shown on the right side of Figure 2.7, participants in the negative valence condition expressed more verification of ingroup identity in the high accessibility condition, M = 2.79, participants in the negative valence condition expressed more verification of ingroup identity in the low accessibility condition than in the high accessibility condition, M = 2.92, SD = .98 vs. M = 2.11, SD = 1.01 respectively, t (71) = 3.46, p < .001. No other effect was significant, ps > .09.

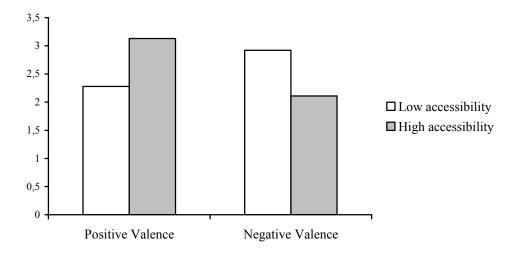


Figure 2.7. Verification of ingroup identity as a function of the meta-stereotype accessibility and valence

# Verification of ingroup identity as mediator of the effect on the desire to interact with outgroup members

To test whether the interactive effect of accessibility and valence on the desire to interact with outgroup members was mediated by verification of ingroup identity, we conducted a bootstrapping test (n boots = 5,000) using the SPSS macro provided by Preacher and Hayes (2008). The results of the analysis (see Figure 2.8) indicated that verification of ingroup identity partially mediated the effect of the interaction between the accessibility and valence of the meta-stereotype on the desire to interact with outgroup members (the confidence interval of the bootstrapping at the 95% confidence interval did not include zero, and the effect of the interaction was less significant when the mediator was included in the equation).

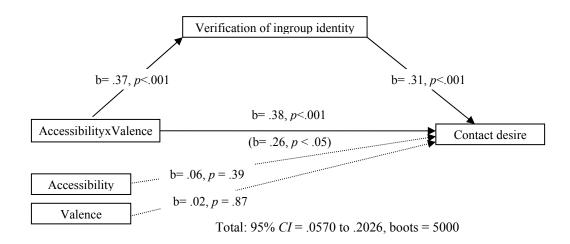


Figure 2.8. Verification of ingroup identity as a mediator of the impact of metastereotype accessibility and valence on the desire to interact with outgroup members

Verification of ingroup identity as mediator of the effect on willingness to be sincere with outgroup members

To test whether the interactive effect of the meta-stereotype accessibility and meta-stereotype valence on the willingness to be sincere with outgroup members was mediated by the verification of ingroup identity, we conducted a bootstrapping test (n boots = 5,000) using the SPSS macro provided by Preacher and Hayes (2008). The results of the analysis (see Figure 2.9) indicated that verification of ingroup identity partially mediated the effect of the interaction between the accessibility and valence of the meta-stereotype on the willingness to be sincere with outgroup members (the confidence interval of the bootstrapping at the 95% confidence interval did not include zero, and the effect of the interaction was less significant when the mediator was included in the equation).

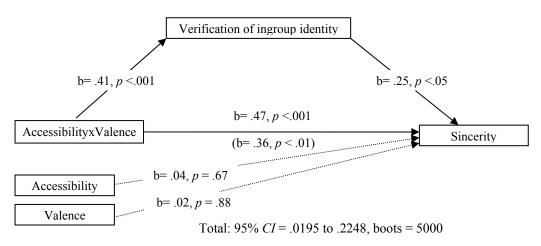


Figure 2.9. Verification of ingroup identity as a mediator of the impact of metastereotype accessibility and valence on the willingness to be sincere with outgroup members

#### Conclusion

Results of Study 4 confirmed our prediction about the interactive effect of metastereotypes' accessibility and valence on the desire to interact with outgroup members and on the willingness to be sincere with members of lower status outgroups.

Participants in the positive valence condition displayed more desire to interact with outgroup members and willingness to be sincere with the outgroup in the high accessibility than in the low accessibility condition (hypothesis 4a), while participants in the negative valence condition reported more desire to interact with outgroup members and willingness to be sincere with them in the low accessibility than in the high accessibility condition (hypothesis 4b). Additionally, these interactive effects were partially mediated, in both cases, by the verification of ingroup identity (hypothesis 4c).

Ironically, focusing on positive traits that supposedly other groups assign to the ingroup may have negative consequences when individuals experience difficulty to think about them. However, focusing on negative traits that supposedly other groups assign to the ingroup may have positive consequences when individuals experience the task as complex.

These results suggest that we must be careful when it comes to promoting contact with lower status groups through meta-stereotypes. Leading people to focus on the positive characteristics that outgroup members assign to the ingroup is not effective in stimulating contact if they perceive the retrieval of traits as difficult. On the positive side, our findings suggest that negative meta-stereotypic traits can also be used with a reconciling purpose. If people are asked to formulate too many negative characteristics they should reach the conclusion that the image of the outgroup about the ingroup is not as negative as they thought.

The results of this study give further support and extend our previous findings, to the extent that they delimit the conditions in which meta-stereotypes may be effective to encourage intergroup contact with outgroups of lower status. As far as people from majority groups are reluctant to engage in interactions with individuals from minority groups, manipulating the difficulty to access the meta-stereotype seems to be a promising strategy to mitigate this problem.

The present study also adds theoretically two important aspects: (1) metastereotype activation also affects willingness to be sincere with the outgroup, thus, it opens the door to high quality intergroup relations, and (2) verification of ingroup identity also partially mediates the effect of meta-stereotype activation on willingness to be sincere with the outgroup.

#### **General Discussion**

The vast majority of the investigations about meta-stereotypes have highlighted the negative consequences they produce in the intergroup domain (Finchilescu, 2010; Kamans et al., 2009; Vorauer et al., 1998; Yzerbyt et al., 2009). Individuals usually overestimate the negativity of the evaluations that outgroup members make about the ingroup (Sigelman & Tuch, 1997; Vorauer et al., 1998), what paves the way for misunderstandings to emerge. However, the investigation presented here has demonstrated that meta-stereotype activation can benefit intergroup relations depending on the relative status of the ingroup as compared to the outgroup and on the perception of verification. These findings were obtained in a context free of severe intergroup conflicts and discrimination, unlike previous works on meta-stereotypes, which were mainly conducted with competitive groups. Our context allowed us to explore the influence of status without the risk of confounding its effects with those engendered by discrimination and conflict.

Meta-stereotype activation increased the desire to interact with members of low status groups and, also, the desire to be sincere with them. This finding is particularly interesting, since people usually prefer the interaction with members of similar and high status groups rather than with low status groups. It should be noticed, however, that the positive effect of meta-stereotype activation on intergroup orientations depends on the interplay between their valence and accessibility. The subjective ease or difficulty of thinking about meta-stereotypic traits qualified the valence of those traits (see Schwarz et al. 1991) generating paradoxical effects. We found that intergroup orientations were improved with positive, easy to recall meta-stereotypes as well as with negative, difficult to recall meta-stereotypes. Also we showed that intergroup orientations deteriorated when we activated positive, difficult to recall meta-stereotypes or negative, easy to recall meta-stereotypes.

In the case of similar status between ingroup and outgroup, meta-stereotype activation reduced the desire for interaction. This negative effect of meta-stereotype activation could be a consequence of perceived similarity between the groups, which may threat distinctiveness (Brown & Abrams, 1986; Jetten et al., 1998; Tajfel, 1982). Dovidio, Gaertner, and Validzic (1998) found that, in the presence of similarity in status, ingroup bias could be eliminated if the groups had distinct areas of expertise albeit equally valued. As these authors suggest, when both groups are equal in status but possess different experiences, they can believe in reciprocal benefit and respect the other group's contribution. That is not the case of this investigation, in which the outgroups with similar status to the ingroup were also very similar in national characters (i.e.: Spain and Italy). One way of preventing the negative effect of meta-stereotypes in this situation could be to highlight and value the differences between the groups in order to stimulate an appropriate level of distinctiveness.

Additionally, we provided an underlying mechanism to explain the effect of metastereotype activation on intergroup orientations. Regarding outgroups of similar and low status, verification of ingroup identity consistently mediated the effect of metastereotype's activation on intergroup orientations. The influence of meta-stereotypes on intergroup relations seems to depend on the degree of accordance between the metastereotype and the image that ingroup members have about themselves. As people strive to verify both the content and the valence of their group identity (Gómez et al., 2009), even a negative meta-stereotype can promote intergroup contact insofar as it matches with the perception of ingroup members. Therefore, to be effective as a strategy to improve intergroup orientations, meta-stereotypes should come into alignment with the image that ingroup members hold about themselves. As for the case of high status outgroups, meta-stereotype activation did not alter the desire to interact with outgroup members, probably, because of a ceiling effect. According to the information search model from Vorauer (2006), members of low status groups attach great pragmatic importance to the opinion of higher status groups insofar as the high status group has more control over resources and is considered to possess more competence to provide valid evaluations. The intense desire for interaction with high status group could be explained from this perspective on the basis of a greater need to engage in information search activities (Vorauer, 2006).

Other reason for this strong desire to interact with high status groups could also be derived from the motivation to promote equality between groups (Saguy, Dovidio, & Pratto, 2008). Members of high status groups prefer to talk about commonalities with members of low status groups in order to maintain the *statu quo* and avoid power-related discussions that could question their advantaged position. On the contrary, members of low status groups show greater desire to talk about group-based power as well as of commonalities in an attempt to promote social equality.

#### Limitations and future research

According to previous research on collective self-verification (Chen et al., 2004) and verification of ingroup identity (Gómez et al., 2009), strivings for verification are stronger among high-identified individuals. As a consequence, the mediator role of verification of ingroup identity on the desire to interact with outgroup members and willingness to be sincere with the outgroup should be moderated by ingroup identification. However, we have not found any effect of the level of ingroup identification, probably, because of a ceiling effect. The ingroup identification may have a moderator effect with samples more heterogeneous in this factor. Research about meta-stereotypes has traditionally studied ethnic or national groups with some exceptions (see Gómez & Huici, 2008; Koudenburg & Gordijn, 2011; Lammers, Gordijn, & Otten, 2008). As national or ethnic groups are likely to induce greater levels of identification, it would be recommendable to diversify the groups selected in order to disentangle the effect of ingroup identification on the reactions to meta-stereotype activation.

It could be argued that different ways of activating meta-stereotypes could also produce different consequences for intergroup relations. For example, asking participants to write the traits they consider as included in the meta-stereotype without specifying the valence would allow us to know whether people mention more positive or negative characteristics when they think about the image that others have about their group. Future research should explore other alternatives of improving intergroup orientations through variations in strategies to activate meta-stereotypes.

#### Conclusions

The present investigation was designed to test the role of outgroup status and verification of ingroup identity on the consequences that meta-stereotype activation has on intergroup orientations. The findings from four experiments demonstrated that meta-stereotype activation does not necessarily damage intergroup relations as prior research have suggested. The impact of meta-stereotype activation is moderated by the relative status between ingroup and outgroup when there is no conflict. In case of lower status outgroups, meta-stereotype activation seems to be an appropriate strategy to improve intergroup relations, while it represents a danger in cases of intergroup relations with similar status outgroups. Additionally, we showed how the effect of meta-stereotype activation on the desire to interact with members of low status groups depends on the interplay between the accessibility and valence of the meta-stereotype. As for the mechanisms that could mediate between meta-stereotype activation and their effects, we have found consistent support for the role of verification of ingroup identity. Meta-stereotype activation increases or decreases the desire to interact with outgroup members insofar as they verify the ingroup identity or fail to do so.

### **CHAPTER 3**

### When Verification of Ingroup Identity works and when does not as a strategy to improve intergroup relations: Selfverification vs. Self-Enhancement

Introduction Study 1: Method Results Conclusion Study 2: Method Results Conclusion General discussion Limitations and future research Conclusions

#### **CHAPTER 3**

When Verification of Ingroup Identity works and when does not as a strategy to improve intergroup relations: Self-verification vs. Self-Enhancement.

#### Introduction

Up to now, we have explored the relation between meta-stereotype salience and verification of ingroup identity and their effects on intergroup orientations. When metastereotype salience increased verification of ingroup identity, participants were more willing to engage in intergroup contact. Although these results are positive and promising, desire for contact does not necessarily leads to real contact. In the next set of studies we delve further into the benefits of verification of ingroup identity with a focus on actual behavior aimed at outgroup members. To that end, we directly manipulated verification of ingroup identity.

Previous research has shown that out-group derogation occurs in the service of ego defense or self-enhancement motives (Brown, Collins, & Schmidt, 1998; Fein & Spencer, 1997). From this vantage point, prejudice is derived, in part, from the motivation to maintain a feeling of self-integrity and self-worth. When individuals perceive a threat to their self-images, they may elaborate prejudiced evaluation of others to feel better about themselves.

The link between prejudice and self-enhancement motives at the individual (Fein & Spencer, 1997; Meindl & Lerner, 1984) and intergroup levels (Branscombe & Wann, 1994) has been repeatedly documented. However, no research up to date has considered the role played by self-verification motives in the evaluation and behavior towards the outgroup. Our general assumption is that, under certain circumstances, prejudice may also stem, in part, from of a failure to obtain verification of ingroup identity. Therefore, the main goal of the present package of studies is to disentangle the factors that modulate the prevalence of enhancement or verification of ingroup identities regarding orientations towards the outgroup.

This set of studies represents the first attempt to examine the influence of verification motives on prejudice and behavior towards the outgroup. But more importantly, it identifies a variable that determines the effectiveness of enhancement

versus verification of ingroup identities to improve orientations towards the outgroup, intergroup threat.

#### The motivation of self-enhancement as a precursor of prejudice

According to a considerable amount of research, people's desire to see themselves favorably is a basic and universal human need (see Sedikides, Gartner, & Toguchi, 2003). The desire to perceive the self in a positive light seems to override the desire to verify certain and central beliefs about the self as well as the desire to accurately assess the self (Sedikides, 1993).

The need for self-enhancement is so powerful that it transcends the individual level. One of the core elements of Social Identity Theory (Tajfel & Turner, 1979) refers to the need to achieve and maintain a positive social identity, which is satisfied by a comparison between the ingroup and relevant outgroups in relevant dimensions. When the social comparison yields negative results, individuals experience a state of dissatisfaction that activates different mechanisms to counteract it (Tajfel, 1981). One of those mechanisms, as stated by Hogg and Abrams (1990), may be intergroup discrimination. From their perspective, intergroup discrimination and self-esteem are imbricated in a reciprocal relationship. Intergroup discrimination enhances social identity and, in turn, elevates self-esteem due to the need for self-esteem. Self-esteem may be considered either as the outcome of some forms of intergroup behavior or as the motivating force behind them.

Although there is considerable research exploring the first possibility, self-esteem as the dependent variable, the goal of the present research is to analyze the influence of self-enhancement motives on intergroup orientations. In this vein, Fein and Spencer (1997) consistently demonstrated that self-image maintenance processes play an important role in stereotyping and prejudice. Across three studies they found that individuals were more likely to negatively evaluate a member of a stereotyped group if their self-images had been threatened by negative feedback as compared to participants whose self-images had been bolstered through a self-affirmation procedure. These studies showed that people can restore a threatened self-image by a number of ways. Prejudice and discrimination may be a means of maintaining a positive self-image, but they can be countered when individuals are offered the opportunity to self-affirm. In a related endeavor, Branscombe and Wann (1994) tested the impact of the levels of ingroup identification and collective self-esteem on outgroup derogation under identity-threatening and non-threatening conditions. High identification and reductions in collective self-esteem following a threat to collective identity led to outgroup derogation. However, level of collective self-esteem did not predict outgroup derogation in the non-threatening condition.

It seems, so far, that people react to a threat to their identity by derogating outgroup members (Branscombe & Wann, 1994; Crocker, Thompson, McGraw, & Ingerman, 1987; Fein & Spencer, 1997; Meindl & Lerner, 1984). Most researchers have interpreted these reactions as an attempt to restore damaged self-esteem. Derogating outgroup members allows for downward, enhancing comparisons and, in turn, elevating self-esteem. However, it could be argued that some of those compensatory activities may be guided not by self-enhancement, but by self-verification motives. For instance, Crocker et al. (1987) found that high, but not low self-esteem participants responded to threats to their self-concept by derogating outgroup members. In line with the basic assumption of self-enhancement perspective, individuals are motivated to maintain a sense of self-worth, therefore, both high and low self-esteem participants should derogate outgroup members to compensate for the reduction in self-esteem.

Alternatively, an explanation of these differing results for high and low selfesteem individuals based on self-verification motives appears to be more plausible. High self-esteem participants could have perceived unfavorable feedback as threatening insofar as it did not match with their self-concepts, whereas low self-esteem participants could have accepted unfavorable feedback because it confirmed their self-views. Previous research on self-verification theory has demonstrated that when self-views are threatened, individuals engage in compensatory activity in an attempt to restore the belief that their self-concepts offer accurate images of reality (Swann & Hill, 1982; Swann & Read, 1981a). Furthermore, such compensatory activities also operate at the level of ingroup identities (Gómez et al., 2009). This reasoning leads us to consider the influence of self-verification motives on the evaluation and behavior towards the outgroup. The interplay between self-verification and self-enhancement motives

So far, considerable research has evidenced the relevance of self-enhancement motives for understanding prejudice and discrimination. These studies frequently assume the pervasiveness of the self-enhancement motive. Among self-evaluation motives, self-enhancement has received the broadest empirical and theoretical attention. However, considerable research on self-verification motives suggests that the prevalence of self-enhancement over other motives should not be taken for granted.

The controversy between self-enhancement and self-verification as motivational determinants of the self-evaluation process still remains unresolved. Research offers mixed results (see Swann, Pelham, & Krull, 1999) that fuel the debate about which of these two motives is hegemonic. Self-verification theory (Swann, 1983) posits that individuals are motivated and actively try to confirm strongly held beliefs about themselves. The most provocative aspect of this theory states that verification strivings occur even when an individual's self-concept is negative.

It is precisely in the case of negative self-views that the predictions made by selfenhancement and self-verification perspectives differ. Whereas self-verification theory predicts that people with negative self-views will strive to receive unfavorable feedback validating those self-images, self-enhancement theorists suggest that they will seek for self-enhancing information to maintain a sense of self-worth. Regarding people with positive self-concepts, the predictions of self-enhancement and self-verification theories concur, because favorable feedback is simultaneously self-enhancing and self-verifying. This coincidence could have led some researchers to confound results reflecting selfverification strivings as evidence for the prevalence of the self-enhancement motive (Swann, 1990).

To resolve this controversy, some researchers have tried to subsume both perspectives in a single framework (e.g. Lecky, 1945; Trope, 1986). The most productive among these reconciling attempts is perhaps the formulation of Shrauger (1975), who proposed that affective responses are guided by self-enhancement motives whereas cognitive responses are driven by self-consistency motives. In line with this thesis, Swann, Griffin, Predmore, and Gaines (1987) measured the reactions of individuals with negative or positive self-concepts to favorable or unfavorable social feedback. Cognitive responses (e.g. perceived self-descriptiveness) were controlled by

the consistency of the information with their self-views, whereas affective responses (e.g. mood states) depended on how self-enhancing the feedback was. A recent metaanalysis (Kwang & Swann, 2010) further supports the thesis of Shrauger (1975) that self-enhancement and self-verification strivings influence affective and cognitive responses, respectively. These results suggest that both motives express themselves differently as a function of the response class and of the relevance of other motivational forces.

It seems so far that the attempt to demonstrate the prevalence of one motive over the others has not been as fruitful as expected. We suggest that individuals are simultaneously motivated to self-enhance and self-verify when possible. For instance, Swann et al. (1989) found that individuals sought favorable feedback about the positive attributes of their self-concept and also unfavorable feedback about their negative aspects, regardless of their level of self-esteem. Thus, people with low self-esteem may strive for self-enhancement by working to verify their positive attributes, whereas people with high self-esteem may strive for self-verification by displaying a preference for unfavorable feedback about their negative attributes.

Instead of emphasizing one motive over the other, it could be more advantageous to focus on the interplay between the diverse motives behind behavior. With that purpose in mind, we tested the influence of verification and enhancement motives on orientations towards the outgroup.

#### Overview of package 2

Both self-enhancement and self-verification motives have proven to transcend the interpersonal level (see Gómez et al., 2009; Branscombe & Wann, 1994). However, to the best of our knowledge, no research to date has addressed the interaction of these two motives in the intergroup domain. To that end, it is necessary to focus exclusively on the negative aspects of the ingroup identity because, otherwise, enhancement and verification motives would be confounded.

As low status groups are usually the target of prejudice, we decided to focus on these groups. In the first study we will check whether the verification or the enhancement of ingroup identity by members of a lower status outgroup (immigrants) may reduce prejudice and increase positive behavior towards the source of the feedback. In Study 2 we will investigate which strategy, verification or enhancement of ingroup identity, is more effective to promote intergroup orientations when intergroup threat is salient.

Based on the thesis of Shrauger (1975), we expect that intergroup threat will lead participants to opt for an affective processing and, as a consequence, enhancement of group identity will be the appropriate strategy to improve intergroup orientations. In the absence of such a threat, participants could follow a cognitive route, therefore, verification of ingroup identity will increase positive orientations towards the outgroup.

#### Study 1:

# Does verification of negative ingroup identity reduce prejudice and increase pro-outgroup behavior?

In this study we checked whether the verification of ingroup identity by members of a lower status outgroup (immigrant students from UNED) reduces the prejudice toward the source of that verification and increases positive behaviors towards it. We predict that participants whose group identity is verified by outgroup members will show more positive intergroup orientations than participants who receive an enhancing feedback.

#### Method

#### **Participants**

One hundred and twenty undergraduate students from UNED (108 women and 12 men, mean age = 29.69, SD = 8.45) participated in this study. They completed the questionnaire individually on the web for course credit.

#### Procedure

The experiment was developed in two waves. During the first wave participants learned that they should construct a list of five negative characteristics of the ingroup (Spaniards) considering one requirement: they should be certain about those characteristics. Some examples of the characteristics cited by participants are "Lazy", Rude", or "Unpunctual". To ensure that participants listed only negative traits, we asked them to rate the valence of the traits that they had chosen on a scale ranging from -3 ("completely negative") to +3 ("completely positive"),  $\alpha = .77$ . Using the midpoint of the scale as the reference point (0), participants considered the traits to be negative, M =

-1.53, SD = 1.08, t (119) = -15.55, p < .001. Additionally, participants rated their certainty on those traits on a 7-point scale ranging from -3 ("strongly uncertain") to +3 ("strongly certain"),  $\alpha = .82$ . Ratings were higher than the theoretical midpoint of the scale (0), M = 1.26, SD = 1.03, t (119) = 13.48, p < .001. Finally, participants were asked to indicate the extent to which the traits describing the ingroup also described themselves personally on a 7-point scale ranging from -3 ("it does not describe at all") to +3 ("it describes me perfectly"),  $\alpha = .73$ . Considering the midpoint of the scale as a reference point (0), participants stated that those characteristics did not personally describe themselves, M = .99, SD = 1.36, t (119) = -8.01, p < .001.

At the end of the first wave, participants learned that the characteristics they had assigned to their ingroup would be evaluated by a group of immigrant students from UNED in order to assess the degree of overlap between participants' ingroup selfdescription and evaluators' description of their ingroup (Spaniards). After this comparison supposedly took place, each participant would receive an e-mail to proceed to the second wave.

During the second wave, participants were told that they would immediately receive a customized report about the evaluation that immigrant students had done about their responses. *Participants in the verification condition* learned that the image that immigrants had about their group agreed with their own image. In particular, four of the five characteristics they had written during the first wave agreed with the characteristics that immigrants used to describe ingroup members. *Participants in the enhancement condition* learned that the image that immigrants had about their group did not agree with their own image. In particular, four of the five characteristics they had written during the first wave agreed with their group did not agree with their own image. In particular, four of the five characteristics they had written during the first wave were exactly the opposite (and, in turn, positive) to those characteristics that immigrants used to describe ingroup members. After reading this report, participants in the verification and enhancement condition learnt that, before receiving their customized report, they should complete the rest of the questionnaire.

This questionnaire contained the dependent variables (outgroup evaluation, competence of the evaluators, and pro-outgroup donations) and a manipulation check on perceived verification of ingroup identity.

We measured *Outgroup evaluation* by means of three feeling thermometers adapted from Haddock, Zanna, and Esses (1993): "Positive-Negative", "Like-Dislike", and "Favorable-Unfavorable",  $\alpha = .88$ . Participants had to rate each thermometer on a scale ranging from 0 (the negative pole) to 100 (the positive pole).

*Perceived competence of the evaluators* was measured by a 3-items scale adapted from Gómez et al. (2009). Participants had to evaluate to what extent they consider the evaluators as "Competent", "Credible", and "Sincere" on a scale ranging from 0 ("strongly disagree") to 6 ("strongly agree"),  $\alpha = .88$ .

*Pro-outgroup donations* were measured by asking participants the percentage (%) of credits that they were willing to donate to other immigrant students from UNED, in case they do not need them. As participation in this study provided with 0.20 extra points to be added to the final score, participants were offered the possibility to partially or completely donate those points to other immigrant students.

Finally, we included a *manipulation check of the perceived verification of ingroup identity* which was assessed by a 3-items scale adapted from Gómez et al. (2009) on a scale ranging from 0 ("strongly disagree") to 6 ("strongly agree"),  $\alpha = .85$ . An ANOVA on the manipulation check of the perceived verification yielded a significant effect of condition, F (2, 117) = 3.89, p < .05. Participants in the enhancement condition expressed less perceived verification than participants in the verification and control conditions, ps < .05 (see Table 3.1 in the results section). No difference was found between participants in the verification and control conditions, p = .99.

When all questions had been completed, participants were debriefed, thanked, and dismissed.

#### Results

Table 3.1 contains means and standard deviations of all outcome measures.

#### Perceived competence of the evaluators

The ANOVA on the perceived competence of the evaluators yielded a significant effect of the condition, F(2, 117) = 5.13, p < .01, indicating that participants in the enhancement condition perceived less competence in evaluators than participants in the verification and control conditions, ps < .01. No difference was found between participants in the verification and control conditions, p = .75.

#### Outgroup evaluation

The ANOVA on outgroup evaluation yielded a significant effect of the experimental condition, F(2, 117) = 3.99, p < .05, indicating that participants in the enhancement condition evaluated outgroup members more negatively than participants in the verification and control conditions, ps < .05. No difference was found between participants in the verification and control conditions, p = .82.

#### Pro-outgroup donation

An ANOVA on pro-outgroup donation yielded a significant effect of the experimental condition, F(2, 117) = 3.16, p < .05, indicating that participants in the enhancement condition donated less credit towards outgroup members than participants in the verification and control conditions, ps < .05. No difference was found between participants in the verification and control conditions, p = .59.

	Enhancement		Verification		Control	
Measures	Mean	SD	Mean	SD	Mean	SD
Competence of the evaluators	4.00 <sup>b</sup>	1.06	4.52 <sup>a</sup>	.81	4.58 <sup>a</sup>	.69
Outgroup evaluation	59.62 <sup>b</sup>	13.81	67.03 <sup>a</sup>	12.98	66.41 <sup>a</sup>	10.91
Pro-outgroup donation	30.29 <sup>b</sup>	21.00	38.46 <sup>a</sup>	18.44	40.64 <sup>a</sup>	16.39
Perceived verification	3.24 <sup>b</sup>	.85	3.75 <sup>a</sup>	.95	3.74 <sup>a</sup>	.79

Table 3.1. Outcome measures as a function of feedback.

Note: Cells with superscripts within files differ significantly from each other (p < .05).

#### Conclusion

Results of Study 1 suggest that verification of ingroup identity can reduce prejudice towards lower status groups (immigrants) and increase pro-group behavior as compared with enhancement of ingroup identity. Participants whose ingroup identity was verified evaluated outgroup members in a more positive light and donated more credits to them than participants whose ingroup identity was enhanced. Additionally, participants perceived verifying evaluators as more competent than enhancing evaluators replicating previous results (Gómez et al., 2009). As in previous research (Gómez et al., 2011a, study 10), verification and control conditions did not differ, indicating that people expect outgroup members to verify their ingroup identity.

Study 1 shows, for the first time, that verification of ingroup identities can exert a positive influence on intergroup relations as compared with enhancement of ingroup identities. Chapter 2 indicated that meta-stereotype activation fosters willingness to interact with outgroup members through an increase in verification of ingroup identity. Now, it is clear that verification of ingroup identity leads not only to better intentions, but also to real pro-group behavior and more positive evaluations of outgroup members.

These results seem to contradict findings from Fein and Spencer (1997) in the individual level. They showed that individuals who received negative feedback about themselves evaluated a member of a stereotyped group more negatively than participants who received an enhancing feedback. The apparent incongruence may be solved considering that the feedback provided in Study 1 was referred to negative, but more importantly, characteristics defining the group according to each participant. However, in the Fein and Spencer's study, participants could have rejected that feedback not because it was negative, but because it was inconsistent with their self-view and, in turn, self-threatening.

At the group level, threat has been associated with intergroup emotions. Rydell et al., (2008) showed that intergroup anger, as individual anger (Bodenhausen, Shepard, & Kramer, 1994), reduced the extent to which participants systematically processed a subsequently presented persuasive message. Thus, in the face of threat, people could be guided by their affective system to confront immediately a threat through a superficial analysis of the stimuli (Swann et al., 1987). As people are urged to respond to the threat without assessing the verificality of the information, the result would be a preference for enhancement over verification of negative aspects of their group identity.

To test this assumption, Study 2 made symbolic threat salient. Both symbolic and realistic threat (see Stephan & Stephan, 2000) are associated with more negative attitudes towards outgroup members (for a meta-analysis see Riek, Mania, & Gaertner, 2006). However, some works (Kinder & Sears, 1981; Velasco González, Verkuyten, Weesie, & Poppe, 2008) have shown that symbolic threat is more predictive of negative intergroup orientations than realistic threat. This reason led us to make symbolic threat salient and measure realistic threat.

#### Study 2:

# Does intergroup threat determine the preference for self-enhancement over self-verification?

This study was designed to test whether making intergroup threat salient can reverse the pattern found in Study 1. We predict that, when intergroup threat is salient, verification of ingroup identity will lead participants to reduce pro-outgroup donation and evaluate outgroup members more negatively as compared with enhancement of ingroup identity.

#### Method

#### **Participants**

Fifty four undergraduate students from UNED (45 women and 9 men, mean age = 34.33, SD = 9.72) participated in this study. They completed the questionnaire individually on the web.

#### Procedure

The procedure basically replicated that of Study 1. During the first wave participants were asked to write a list of five negative characteristics of the ingroup (Spaniards). Examples of such traits listed by participants are: "Fun-loving", "Prejudiced", and "Envious". Then, as in Study 1, they were asked to evaluate those traits in terms of valence,  $\alpha = .77$ , certainty,  $\alpha = .81$ , and self-descriptiveness,  $\alpha = .70$ . Participants considered the valence of traits to be negative as compared to the mid-point of the scale (0), M = -1.76, SD = 1.01, t (53) = -12.84, p < .001. Participants reported to be certain about those traits as compared to the mid-point of the scale (0), M = 1.53, SD = .90, t (53) = 12.39, p < .001. The traits used to describe the ingroup were not self-descriptive as compared to the mid-point of the scale (0), M = -1.27, t (53) = -4.79, p < .001.

During the second wave participants received the same information as in Study 1. *Participants in the verification condition* learned that four of the five characteristics they had written during the first wave agreed with the characteristics that immigrants used to describe ingroup members. *Participants in the enhancement condition* learned that four of the five characteristics they had written during the first wave were exactly

the opposite (and, in turn, positive) to those characteristics that immigrants used to describe ingroup members. After reading this report, participants in the verification and enhancement conditions were asked to complete the rest of the questionnaire. *Participants in the control condition* learnt that, before receiving their customized report, they should proceed to the rest of the questionnaire.

After this, to make intergroup threat salient, all participants were asked to complete a *Symbolic Threat* scale adapted from Stephan, Ybarra, and Bachman (1999), consisting of 7 items ranging from 0 ("strongly disagree") to 6 ("strongly agree"),  $\alpha = .72$ . Examples of those items are: "Immigration is undermining Spanish culture" or "The values and beliefs of immigrants regarding moral and religious issues are not compatible with the beliefs and values of most Spaniards". An ANOVA on symbolic threat showed no difference as a function of the verification condition, p = .15.

Finally, participants completed the rest of the questionnaire, which contained the dependent variables (perceived competence of the evaluators, outgroup evaluation, prooutgroup donation, and realistic threat) and a manipulation check on perceived selfenhancement.

Perceived competence of the evaluators ( $\alpha = .88$ ) and Outgroup evaluation ( $\alpha = .93$ ) were measured with the same scales as in Study 1.

As participants in Study 2 did not receive course credit for participating, we included a new behavioral measure. Participants learned that the Ministry of Education provided the research project with five euros for each participant that he/she can choose to donate for social purposes. *Pro-outgroup donation* was measured by asking participants how many euros (with a maximum of five) they were willing to donate to programs which help immigrants.

*Realistic Threat* was assessed with a 7-item scale (adapted from Stephan et al., 1999) ranging from 0 ("strongly disagree") to 6 ("strongly agree"),  $\alpha = .79$ . Examples of such items are: "Immigrants get more from this country than they contribute" or "Immigration has increased the tax burden on Spaniards".

Finally, *Perceived enhancement of ingroup identity* was measured by using a 2item scale: "I think that immigrants see the members of my country in a positive way" and "I think that immigrants see the members of my country more positively than we see ourselves", r(54) = .68, p < .01. An ANOVA on the manipulation check yielded a significant effect of condition, F(2, 51) = 6.70, p < .01, indicating that participants in the enhancement condition perceived more enhancement than participants in the verification and control conditions, ps < .01 (see Table 3.2 in the results section). There was no difference between participants in the verification and control conditions, p = .42.

When all questions had been completed, participants were debriefed, thanked, and dismissed.

#### Results

Table 3.2 contains the means and standard deviation of all our outcome measures.

#### *Perceived competence of the evaluators*

The ANOVA on the perceived competence of the evaluators yielded a significant effect of the experimental condition, F(2, 51) = 4.61, p < .05, indicating that participants in the enhancement condition perceived more competence in evaluators than participants in the verification and control conditions, ps < .05. There was no difference between participants in the control and verification conditions, p = .28.

#### Outgroup evaluation

The ANOVA on outgroup evaluation yielded a significant effect of the experimental condition, F(2, 51) = 4.10, p < .05, indicating that participants in the enhancement condition evaluated outgroup members more positively than participants in the verification and control conditions, ps < .05. There was no difference between participants in the control and verification conditions, p = .94.

#### *Pro-outgroup donation*

The ANOVA on pro-outgroup donation yielded a significant effect of the experimental condition, F(2, 51) = 3.99, p < .05, indicating that participants in the enhancement condition donated more money than participants in the verification and control conditions, ps < .05. There was no difference between participants in the control and verification conditions, p = .51.

#### Realistic threat

The ANOVA on realistic threat yielded a significant effect of the experimental condition, F(2, 51) = 4.08, p < .05, indicating that participants in the enhancement

condition perceived less threat than participants in the verification condition, p < .01. Participants in the control condition only marginally differed from participants in the verification condition, p = .06, and did not differed from the enhancement condition, p = .33.

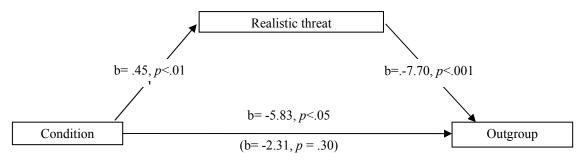
	Verification manipulation					
	Enhancement		Verification		Control	
Measures	Mean	SD	Mean	SD	Mean	SD
Competence of the evaluators	4.67 <sup>a</sup>	.88	3.72 <sup>b</sup>	.96	4.05 <sup>b</sup>	.90
Outgroup evaluation	73.75 <sup>a</sup>	10.81	61.85 <sup>b</sup>	16.14	62.17 <sup>b</sup>	13.52
Pro-outgroup donation	2.25 <sup>a</sup>	.88	1.31 <sup>b</sup>	1.02	1.52 <sup>b</sup>	1.11
Realistic threat	1.47 <sup>b</sup>	.97	2.47 <sup>a</sup>	1.22	1.81 <sup>b</sup>	.91
Perceived enhancement	4.28 <sup>a</sup>	1.18	2.86 <sup>b</sup>	1.30	3.17 <sup>b</sup>	1.05

Table 3.2. Outcome measures as a function of feedback.

Note: Cells with superscripts within files differ significantly from each other (p < .05).

# Realistic threat as a mediator of the effect of the experimental condition on outgroup evaluation

To test whether the effect of the experimental manipulation on outgroup evaluation was mediated by realistic threat, we conducted a bootstrapping test (n boots = 5,000) using the SPSS macro provided by Preacher and Hayes (2008). The results of the analysis (see Figure 3.1) indicated that realistic threat mediated the effect of the manipulation on outgroup evaluation (the confidence interval of the bootstrapping at the 95% confidence interval did not include zero, and the effect of the manipulation was no longer significant when the mediator was included in the equation).



Total: 95% CI = -7.0468 to -1.0273, boots = 5000

Figure 3.1. Realistic threat as a mediator of the effect of condition on outgroup evaluation

#### Conclusion

Results of Study 2 indicated that, in threatening circumstances, participants showed more negative intergroup orientations when they received verifying feedback than when they received enhancing feedback. In particular, participants whose negative group identities were verified reduced pro-outgroup donation and worsen the evaluation of outgroup members as compared with participants whose group identities were enhanced. As expected, when symbolic threat was salient, the pattern of results of Study 1 clearly reversed.

The effect of the feedback about ingroup identity on outgroup evaluation was mediated by realistic threat. Participants in the verification condition perceived more realistic threat than participants in the enhancement condition and, in turn, they reported a more negative image of outgroup members.

The perceived competence of the evaluators also showed the opposite tendency as compared to Study 1. In Study 2, participants attributed the most competence to evaluators who enhanced their group identity as compared with evaluators who verified it. Thus, under conditions of threat, participants see an enhancing feedback of ingroup identity as more appropriate than a verifying feedback.

As in Study 1, participants in the control condition did not differ from participants in the verification condition, indicating that people expect others to confirm their selfviews.

#### **General discussion**

Overall, this set of studies extends previous research on self-evaluative motives in three ways. First, it constitutes a pioneering attempt to comparatively test the effect of verification and enhancement of ingroup identity motives on intergroup relations. Research exploring the role of enhancement on prejudice (Branscombe & Wann, 1994; Fein & Spencer, 1997) has ignored verification. On the contrary, previous works on verification of ingroup identity (Gómez et al., 2009) had simultaneously studied both verification and enhancement, but its effects on intergroup relations remained unexplored.

Second, these studies partially confirm conclusions from the enhancement perspective on prejudice, but they also call for more attention to verification in this arena. According to previous research, people react to negative, threatening feedback by derogating outgroup members (see Branscombe & Wann, 1994; Fein & Spencer, 1997). Results of Study 2 are in line with these findings. When symbolic threat was salient, participants receiving confirmation of negative characteristics reported more negative evaluations and, more importantly, less pro-outgroup behavior than participants receiving disconfirming, but enhancing information.

Third, Study 1 showed, in contrast, that when intergroup threat was not explicit, people reacted to enhancing feedback of ingroup identity more negatively than to verifying feedback, even though this feedback referred to negative characteristics of their group and was provided by outgroup members. Participants who obtained feedback consistent with the image they had about their group made more positive evaluations and higher donations to the outgroup than participants who obtained inconsistent feedback. These results question the general assumption that enhancement overrides verification (Sedikides, 1993) and require rethinking the study of the evaluation motives in terms of the hegemony of one over another.

These apparently contradicting results of Study 1 and 2 could be reconciled by the proposal of Shrauger (1975) who stated that affective responses are guided by self-enhancement motives whereas cognitive responses are driven by self-consistency motives. When intergroup threat was made salient, an affective processing of the feedback presumably drove participants. As Swann et al. (1987) proposed, the affective system enables individuals to quickly confront an immediate threat with no analysis of the subjective veridicality of stimuli. In non-threatening circumstances, as in Study 1, individuals can dissect the information in order to decide whether it is consistent or not with their self-views without the urgency imposed by the affective system. A cognitive

processing could lead individuals to prefer consistent information to preserve a sense of coherence and make accurate predictions.

#### Limitations and future research

These studies open a new venue of research for verification in the intergroup field. According to these results, verification of ingroup identity could reduce prejudice towards members of lower status groups when the circumstances are not threatening. Nonetheless, more research is needed. For instance, the level of group identification may moderate the effect of enhancement and verification on intergroup orientations. Gómez et al. (2009) demonstrated that people prefer to interact with outgroup members who verify negative characteristics of their group over those who enhance them, and this tendency was stronger among participants highly invested in their group identification interacts with reduced collective self-esteem to increase outgroup derogation in threatening situations. These findings suggest that the patterns found in Study 1 and 2 could be intensified in high-identified group members as compared to low identified group members.

According to our results, symbolic threat is a key variable determining whether group members prefer enhancement or verification of their group identities. It could be argued that merely including a scale of threat does not generate threat in participants. Results indicated that the manipulation was effective, since the pattern of results of Study 1 was completely reversed in Study 2. A more explicit manipulation could have produced rejection in low prejudiced people who would polarize their responses. Now that many public speeches rail against the negative consequences of immigration, intergroup threat may be latent in the minds of individuals and a subtle reference is likely to activate it.

Critics could also point out that the feedback came from immigrant students, so that participants could have recategorized them in a common category of students, and in turn, considering them as ingroup members. Other possibility is that participants could have considered immigrant students as not prototypical members of their group. Results of the two studies can discard these alternative explanations, as the perception of the evaluators (immigrant students) was in line with the perception of the outgroup as a whole (immigrants in general). It could be argued that our experimental manipulation was not successful, as participants in the control and verification conditions did not differ. However, we think this coincidence is not due to a failure in the feedback, but to the expectancy of being verified. Gómez et al. (2011a, Study 10) reported that participants in the control condition reacted in the same way as participants in the verification condition, and in opposition to participants in the enhancement condition. Support for this phenomena come from Ichiyama (1993) who obtained ample evidence supporting that self-images influence how people perceive that they are regarded by others.

#### Conclusions

Two studies explored the usefulness of verification and enhancement motives at the intergroup level to promote intergroup relations. Results showed that verification of ingroup identity may exert a positive influence on the intergroup realm. Verification of ingroup identity increased pro-outgroup donation and improved the evaluation of outgroup members in non-threatening circumstances. In contrast, when symbolic threat was salient, results confirmed previous research indicating that enhancement of ingroup identity improves outgroup evaluations, but also, as this studies shows, increases prooutgroup donation. According to these results, future avenues of research should focus on the interplay between the diverse motives behind behavior, rather than in the prevalence of one motive over the other in all contexts.

### **CHAPTER 4**

## When self-verification and verification of ingroup identity are the same: Identity Fusion

Study 1: Method Results Conclusion Study 2: Method Results Conclusion Study 3: Method Results Additional analyses for Studies 1, 2, and 3 Conclusion Study 4: Method Results Conclusion General discussion Limitations and future research Conclusions

#### **CHAPTER 4**

### When self-verification and verification of ingroup identity are the same: Identity Fusion

#### Introduction

So far, we have focused on the consequences of verification of ingroup identity for intergroup relations. Nonetheless, this proposal draws on a solid line of research, Self-Verification Theory (Swann, 1983, 2011), functioning on an interpersonal level. Recent developments of this theory proposed that, motivated by self-verification strivings, some individuals retain a strong sense of personal agency when they encounter group situations (Swann et al., 2009). These individuals do not become depersonalized when they are in a group, as follows from the Social Identity Theory perspective (Tajfel & Turner, 1979). Such individuals perceive their personal and social selves as interchangeable, such that a threat aimed at the self is capable of invigorating pro-group activity to the same extent as a threat aimed at the group. For these individuals, whose personal and group identities are fused, threatening the self is functionally equivalent to threatening the group, therefore, identify fusion constitutes the confluence point between ingroup and personal identity verification.

Identity fusion deserves particular attention since it constitutes a predictor of extreme behavior on behalf of a group (Swann et al., 2009). Extreme pro-group behavior may be considered a social problem when misguided, as in the case of hooliganism or terrorism, or a benefit when directed to altruistic motivations, as in the case of volunteers in emergency situations. Identity fusion seems to be a stronger predictor of extreme pro-group behavior than identification (Gómez et al., 2011a; Gómez, Morales, Hart, Vázquez, & Swann, 2011b; Swann et al., 2009, Swann, Gómez, Dovidio, Hart, & Jetten, 2010a; Swann, Gómez, Huici, Morales, & Hixon, 2010b). Therefore, strategies aimed at the reduction of extreme behavior should take identity fusion into account. Previous research has considered identity fusion as a predictor, but to the best of our knowledge, there have been no attempts to act on it. In this set of studies we investigate for the first time the stability of identity fusion with the national group by means of three different manipulations aimed at personal characteristics, perception of invulnerability, and commitment to the group.

#### The nature of identity fusion

Cross-cultural psychology has attracted attention to the extent to which individuals define themselves in terms of their relationships with others and with social groups (Brewer & Gardner, 1996). Within a given culture, its members typically construct the self as individuated (e.g. Western cultures) or interpersonal (e.g. East Asian cultures) (see Markus & Kitayama, 1991). Nonetheless, the same individual may possess both of these different self-construals, which will be activated as a function of the context.

Identity fusion is linked to a relational orientation with the group, whereas identification with a group is related to a collective orientation to the group (Gómez et al., 2011a). The tendency to have a relational orientation makes highly fused people to perceive the group as a "family" consisting of members interconnected by a common bond instead of an abstract social category. This familial attachment engenders two key sentiments that constitute the crucial elements of identity fusion: a sense of connectedness and a perception of reciprocal strength (Gómez et al., 2011a). The sense of connectedness leads fused individuals to believe that they and other group members are functionally equivalent. The perception of reciprocal strength makes fused individuals believe that they will do anything for other group members and that other group members will behave in the same way.

As a result, fused people may display a powerful tendency to engage in extraordinary actions on behalf of the group when required. As previous research has shown, in comparison to non-fused individuals, fused individuals are more prone to fight and die for the group (Gómez et al., 2011a, 2011b; Swann et al., 2009, 2010a, 2010b), to self-sacrifice in moral dilemmas (Gómez et al., 2011a; Swann et al., 2010a), to donate money to fellow ingroup members in need (Gómez et al., 2011b; Swann et al., 2010b), and to increase extreme and helping pro-group behavior when ostracized (Gómez et al., 2011b).

The effect of identity fusion on extreme pro-group behavior has proven to be mediated by two underlying mechanisms: agency and invulnerability (Gómez et al., 2011a). The sense of connectedness and reciprocal strength may encourage people to put their personal agency in the service of the group. Framed in the tradition of self-verification theory's assumption of a highly agentic personal self (e.g., Swann, 1983),

the identity fusion perspective assumes that the self of highly fused people remains salient in intergroup situations. They do not become depersonalized as social Identity Theory (Tajfel & Turner, 1979) would suggest, but they retain a strong personal self as well as associated feelings of personal agency subordinated to the group's welfare.

Fused individuals are also imbued with a high perception of invulnerability, which can explain to some extent why they are especially willing to endorse extreme behaviors that most others would refuse to undertake. In fact, perceptions of invulnerability have been frequently associated with the propensity to perform dangerous behavior (see e.g., Abel & Brunton, 2005; Arnett, 1992). As fused individuals believe that they and fellow group members synergistically strengthen one another (Gómez et al., 2011a), they may conclude that they are more invulnerable than others. Hence, the perception of reciprocal strength derived from fusion may stimulate the sense of invulnerability and, in turn, motivate extreme pro-group behavior.

The relationship between identity verification and identity fusion

Self-verification theory (Swann, 1983, 2011) posits that once identity is formed, people strive to maintain it as it serves important functions: it helps to make predictions about their environment, it guides behavior, and it provides individuals with a sense of a coherent and predictable world. The desire to validate the self-views is so powerful that it sometimes overrides the tendency to seek positive evaluations of oneself (Jones, 1973), and it also leads individuals to interact with partners who confirm their self-concepts (Swann et al., 1992a) and to abandon those partners who do not see them as they see themselves (Cast & Burke, 2002). Furthermore, when discrepant feedback challenges positive or negative personal identities, people engage in compensatory activity by increasing their efforts to obtain self-verifying evaluations (e.g. Swann & Read, 1981b; Swann, Wenzlaff, & Tafarodi, 1992d).

Such compensatory activities are particularly interesting in the case of fused people. For fused people the barrier between the self and the group is blurred, therefore, their personal and social identities reinforce, rather than compete with, one another (Swann et al., 2009). As fused people perceive their personal and social identities as functionally equivalent, they should react to challenges to one class of self-view by striving to reaffirm the other class of self-view. In this vein, Swann et al. (2009) demonstrated that challenging negative personal identities by providing discrepant

feedback led fused participants to increase their willingness to perform extreme behavior on behalf of the group. Additionally, results supported the hypothesis of functional equivalence between personal and social identity in fused people. Activating the personal identity of fused participants increased their willingness to fight and die for the group to the same extent that activating their social identity did.

So far, several studies (Gómez et al., 2011a; Swann et al., 2009) have documented the link between a challenge to personal self-views and increased pro-group behavior in fused people. However, to the best of our knowledge, no investigation to date has tested whether threatening personal or social identities may increase fusion with a group. If fusion is a reliable predictor of extreme behavior on behalf of the group, it could be fruitful to know whether it is susceptible to change as a result of: 1) identity manipulations or 2) contextual factors. The stability of identity fusion constitutes a relevant research question that remains unexplored and that we address in the present investigation.

Previous research (Swann et al., 2009) has demonstrated that fusion is not a personality trait, but an affiliative state toward a specific group. Thus, being fused with any given group does not imply being fused with other groups. Fusion is a form of alignment with a certain group, therefore, it depends on the context in which the individual is present. For instance, Gómez et al. (2011a) found differences in the percentage of fused individuals in Spain (around 30%) and in the United States (around 20%) by using a pictorial and dichotomous scale (see Gómez et al., 2011a; Swann et al., 2009).

Even though fusion is not a trait, it should be at least somewhat stable insofar as it is associated with feelings of oneness and shared essence with a group (Swann et al., 2010b). In fact, previous research has demonstrated that fusion is a good predictor of extreme behavior on behalf of the group six months after it was measured (Gómez et al., 2011a). As fused individuals perceive a synergy between them and the group, we would expect them to remain fused even in the face of danger or difficulties.

#### Overview of package 3

This set of studies was designed to evaluate the stability of fusion with the national group (Spain) when the personal self is threatened (Studies 1-3) or when there is a high-impact social event (Study 4). With that purpose in mind, we measured fusion

at *Time 1* and at *Time 2* in each study. We tested three different strategies to challenge the individual self: a) the disconfirmation of negative personal traits by ingroup or outgroup members (Study 1); b) questioning participant's sense of invulnerability (Study 2), and c) questioning participants' commitment to their group (Study 3). We hypothesize that threats directed to the personal self will not be sufficiently powerful to modify fusion levels.

Even though we expect fusion to remain stable against experimental manipulations, previous research has demonstrated that it is affected by the context (Gómez et al., 2011a). Fusion level varies from one country to another but, it also changes from time to time in the same country. In the first study published about fusion in Spain (Swann et al., 2009), the rate of fusion with the country was 40.5%, whereas in the last published study (Gómez et al., 2011b) this rate dropped to 27.9%. Probably, the economic crisis has been undermining levels of fusion. As contextual factors can reduce levels of fusion, we predict that high impact events could also intensify fusion.

To gain further understanding of the influence of contextual variables on fusion, we included a last study (Study 4), which was conducted in two phases with two groups. The first group completed the second phase just before the FIFA World Cup took place, whereas the second group participated just after the end of this championship. In a context of prolonged economic and social crisis, the World Cup won by the ingroup (Spain) represented a fulfilled dream and a success shared by millions of citizens.

All studies included a measure of group identification (Mael & Asforth, 1992) as featured in Social Identity Theory (Tajfel & Turner, 1979) and frequently used in research about fusion (see Gómez et al., 2011a, 2011b; Swann et al., 2009, 2010a, 2010b). Even though identity fusion is related to group identification, they are conceptually and empirically distinct constructs as several studies have demonstrated (Gómez et al., 2011a, 2011b; Swann et al., 2009, 2010a, 2010b). Group identification is related to a collective orientation towards the group and implies the perception of group members as categorically undifferentiated and interchangeable (Turner, Hogg, Oakes, Reicher, & Wetherell, 1987). In contrast, identity fusion is associated with a relational orientation towards the group, which is conceived of as "family" (Brewer & Gardner, 1996) consisting of unique and irreplaceable members. Highly identified individuals may act together with other group members on behalf of their group or against other outgroups, but they do not have the initiative to act in isolation, especially if the action

required is extreme (Swann et al., 2010a). Fused individuals, on the contrary, retain a strong sense of individual agency subordinated to the group. In fact, identification has proven to be a weaker predictor of endorsement of extreme pro-group activity as compared to identity fusion (Gómez et al., 2011a, 2011b; Swann et al., 2009, 2010a, 2010b). We expect to find further support for the superiority of fusion over group identification regarding predictive power of extreme behavior.

#### Study 1:

#### Does a challenge to the self-view increase fusion?

In Study 1 we addressed the stability of fusion through an experiment conducted in two waves. The goal was to test whether challenging participants' self-views influenced the level of identity fusion. To that end, in the first wave, we measured fusion and identification with Spain as the focal group. In the second wave, we challenged participants' self-views and measured fusion and identification again to check whether our manipulation affected levels of fusion. We included two possible sources of challenge: ingroup or outgroup members. Thus, the design is a factorial 3 (feedback: challenge vs. control vs. verification) x 2 (source of the feedback: ingroup vs. outgroup), with fusion and identification as continuous measures. We predict that fusion levels will remain unchanged to manipulations.

#### Method

#### **Participants**

One hundred and ninety three Spanish high school students (93 girls and 100 boys, mean age = 15.32, SD = .96) completed this research with the consent of their school and parents.

#### Procedure

The procedure was similar to that of Gómez et al. (2011a, Study 10). The experiment was conducted in two waves separated by two days. During the first wave, participants were provided with a brief description of the investigation and completed the verbal *fusion* scale recently created by Gómez et al. (2011a) and an *identification* scale (adapted from Mael & Asforth, 1992), considering Spain as the focal group and both ranging from 0 ("strongly disagree") to 6 ("strongly agree"). The verbal fusion

scale assessed endorsement of items such as: "I am one with my country" and "I make my country strong",  $\alpha = .90$ . The identification scale included six items such as "If a story in the media criticized my country, I would feel embarrassed" and "I am very interested in what citizens of other countries think about my country",  $\alpha = .89$ .

Then, participants were asked to list three negative traits about themselves and write a brief paragraph describing behaviors that exemplified each trait that they had listed without naming it. Two manipulation checks indicated that participants regarded the traits they listed as negative as compared with the midpoint of a scale ranging from - 3 ("very negative") to +3 ("very positive"), M = -1.08, SD = 1.01, t (192) = -14.95, p < .001, and that they were certain about the traits as compared with the midpoint of a scale ranging from -3 ("completely uncertain") to +3 ("completely certain"), M = 1.42, SD = .99, t (192) = 19.95, p < .001.

During the second wave, participants learned that a group of trained students from UNED (the "evaluators") had read their self-descriptive paragraph and generated a list of three traits that seemed to describe the participant according to the information provided by himself/herself. *Participants in the ingroup condition* were told that that the evaluators were ingroup members (Spaniards). *Participants in the outgroup condition* learned that the evaluators were outgroup members (immigrants). Regarding the challenge manipulation, *participants in the verification condition* were told that the evaluators had correctly identified the three negative traits listed by the participant. *Participants in the challenge condition* learned that the evaluator had not correctly identified any of the three negative traits listed by the participant. Finally, they completed a final questionnaire. *Participants in the control condition* were told that they would receive the feedback from the evaluators after completing this final questionnaire.

This questionnaire contained the dependent variables (fusion and identification at *T2*, and perceived competence of the evaluators) and a manipulation check on perceived verification. In each case, participants responded on a 7-point scale ranging from 0 ("strongly disagree") to 6 ("strongly agree").

During Wave 2, participants completed the same measures of *identity fusion* ( $\alpha = .92$ ) and *identification* ( $\alpha = .90$ ) again as in Wave 1.

Perceived competence of the evaluators was measured by a 7-item scale adapted from Gómez et al. (2009). Participants had to evaluate to what extent they consider the evaluators as "Competent," "Intelligent," "Credible," "Realistic," "Convincing," "Sincere," and "Reliable" on a scale ranging from 0 ("strongly disagree") to 6 ("strongly agree"),  $\alpha = .92$ .

Finally, we included a *manipulation check of the perceived verification* which was assessed by a 3-items scale adapted from Gómez et al. (2011a) with items such as: "The evaluators of my questionnaire have treated me in such a way that they have made me feel understood" and "The evaluators of my questionnaire understand me",  $\alpha = .87$ . To assess the effectiveness of the challenge manipulation, we conducted a multiple regression analysis. We regressed the challenge manipulation (two dummy-coded variables were created with the control condition as the reference group: dummy code 1 compared the verification condition with the control condition, whereas dummy code 2 compared the challenge condition with the control condition), the source of feedback (effect coding, -1, 1), verbal fusion and identification at T1 (centered), and all two-way, three-way and four-way interactions on perception of verification. The effect of dummy code 2 was significant,  $\beta = -.23$ , t (169) = -2.48, p < .05, indicating that participants in the challenge condition, M = 1.72, SD = 1.30, felt less verified than did participants in the control condition and verification conditions, M = 2.80, SD = 1.36, and M = 3.23, SD = 1.53 respectively, both ps < .001. No other main or interactive effects were significant, ps > .10.

#### Results

#### Relationships among variables

Table 4.1 displays the results of correlation analysis among the variables at T1 and T2. At both times, correlation between fusion and identification was high. Nevertheless, despite this sizeable correlation, in all regression analyses the variance inflation factor (VIF) was always lower than 10 (VIFs < 8.92), ruling out concerns regarding multicollinearity (see also Gómez et al., 2011a).

Measure	Fusion <i>T1</i>	Identification T1	Fusion T2	Identification T2
Fusion <i>T1</i>		.70**	.78**	.65**
Identification T1			.69**	.76**
Fusion <i>T2</i>				.78**
Identification T2				

Table 4.1. Correlations among variables at T1 and at T2

\*\* *p* < .01

Regression analyses

To determine whether fusion and identification at T1, the challenge manipulation and the source of the feedback interactively predicted our outcome variables (fusion and identification at T2, and perceived competence of the evaluators) we conducted three multiple regression analysis. The predictors for the regression analysis on fusion and identification at T2 were the challenge manipulation (dummy code 1 and dummy code 2), the source of feedback (effect coding, -1, 1), verbal fusion and identification at T1(centered), and all two-way, three-way and four-way interactions. The regression analysis on perceived competence of the evaluators will be explained later.

#### Fusion

The regression analysis on fusion at T2 yielded a main effect of fusion at T1,  $\beta =$  .70, t(169) = 5.35, p < .001, indicating that the higher the level of fusion at T1, the higher was the level of fusion at T2. There was a marginally significant effect of identification at T1, p = .07. No other effect reached significance, ps > .13. Fusion at T1 was the stronger predictor of fusion at T2, therefore, the key prediction was confirmed: fusion remained unchanged to challenges to the personal identity.

#### Identification

The regression analysis on identification at *T2* yielded a significant main effect of identification at *T1*,  $\beta = .58$ , t(169) = 4.38, p < .001, indicating that the higher the level of identification at *T1*, the higher was the level of identification at *T2*. We also obtained a weaker effect of fusion at *T1*,  $\beta = .35$ , t(169) = 2.52, p < .05, indicating that the higher the level of fusion at *T1*, the higher was the level of identification at *T2*. No other effect

reached significance, ps > .15. Identification and fusion at *T1* predicted identification at *T2*. Identification remained unchanged to challenges to the personal identity.

#### Perceived competence of the evaluators

The failure of our experimental manipulation to intensify fusion on fused participants could be attributed to a lack of confidence in the evaluators. To discard this explanation we conducted a multiple regression analysis on the perceived competence of the evaluators without considering the control condition in which this measure was absent because these participants did not receive feedback from the evaluators. We conducted a multiple regression analysis on the perceived competence of the evaluators is predictors: fusion at *T1*, identification at *T1*, the challenge manipulation (effect coding, -1, 1) and the source of feedback (effect coding, -1, 1). We only obtained a main effect of the challenge manipulation,  $\beta = .26$ , t (115) = 2.63, p < .001, indicating that participants in the challenge condition perceived the evaluators as less competent than participants in the verification condition, M = 3.14, SD = 1.21 vs. M = 3.97, SD = 1.14, p < .001. No other effect was significant, ps > .15. As previous research (Gómez et al., 2009, 2011a) indicates, participants perceive verifying evaluators as more competent than disconfirming evaluators.

#### Conclusion

As expected, Study 1 showed that fusion remained unchanged to challenges to self-views, independently of the source of feedback. Participants who received disconfirming feedback regarding personal attributes expressed similar levels of fusion and identification at both times of the study, regardless of whether that feedback came from ingroup or outgroup members. Identification with the group did not change either as a consequence of this manipulation.

Given that this study constitutes the first attempt to empirically test the stability of identity fusion, we must be cautious when making hasty conclusions. To collect converging evidence for the stability of fusion, it is necessary to use other kinds of threats. To that end, in the next studies we manipulated the feeling of invulnerability (Study 2) and the degree of commitment to the group (Study 3).

#### Study 2:

#### Does questioning perception of invulnerability affect identity fusion?

As aforementioned, fused individuals are characterized by a high perception of invulnerability, engendered by the belief that they and fellow group members synergistically strengthen one another (Gómez et al., 2011a). This perception of reciprocal strength could lead fused people to see themselves as more invulnerable as compared to others who are not confident that their fellow group members will act on their behalf. Thus, questioning perception of invulnerability could be interpreted by fused participants as a threat to their self-concept, whereas reinforcing such perception should be understood as a verification of their self-concept.

Study 2 was designed to test whether manipulating the perception of invulnerability influences the subsequent level of identity fusion. The study was conducted in two waves. In the first wave, participants completed measures of identity fusion, identification and invulnerability. They learned that their responses would be analyzed by a group of teachers from UNED. In the second wave they received a report with the teachers' conclusions as a means to manipulate their sense of invulnerability. Finally, we measured fusion and identification again. We predict that fusion will remain stable as in Study 1.

#### Method

#### **Participants**

One hundred and eleven Spanish high school students (50 girls and 61 boys, mean age = 15.52, SD = 1.10) completed this research with the consent of their school and parents.

#### Procedure

The experiment was conducted in two waves separated by two days. During the first wave, participants were provided with a brief description of the investigation and completed the verbal *fusion* scale (Gómez et al., 2011a),  $\alpha = .89$ , and the *identification* scale (adapted from Mael & Asforth, 1992),  $\alpha = .87$ , considering Spain as the focal group.

*Perception of invulnerability* was measured by a 6-item scale (Gómez et al., 2011a) ranging from 0 ("strongly disagree") to 6 ("strongly agree"),  $\alpha = .89$ . This scale

assessed endorsement of items such as: "Anything could damage me or my group" and "I am less vulnerable than most people from my group."

During the second wave, participants learned that a group of teachers from UNED (the "evaluators") had analyzed their questionnaires and compared their scores with the rest of the participants in the study. *Participants in the low invulnerability condition* learned that, according to that comparison, they felt more vulnerable and with a higher probability of being hurt than the rest of participants in the study. *Participants in the high invulnerability condition* learned that, they felt less vulnerable and with a lower probability of being hurt than the rest of participants in the study. Then, they proceeded to the final questionnaire. *Participants in the control condition* were told that they would receive feedback after completing the rest of the questionnaire. This questionnaire contained the dependent variables (fusion and identification) and a manipulation check on the feedback given by the evaluators.

During the second wave, participants completed the measures of *identity fusion* ( $\alpha$  = .93) and *identification* ( $\alpha$  = .90).

The *manipulation check on feedback*, ( $\alpha = .85$ ) consisted of three thermometers with two poles ("Strong-Weak", "Invincible-Fragile", "Invulnerable-Vulnerable") in which participants should put themselves based on the information provided by the evaluators. Participants in the control condition responded hypothetically on the basis of their expectations about the feedback.

To assess the effectiveness of the experimental manipulation, we conducted an ANOVA on the manipulation check. The effect of the experimental condition was significant, F(2, 108) = 8.81, p < 0.001, indicating that participants in the low invulnerability condition believed that the evaluators perceived them as less invulnerable than participants in the high invulnerability condition, M = 43.89, SD = 15.30 vs. M = 58.00, SD = 15.13 respectively, p < .001. Participants in the control condition, M = 50.85, SD = 11.82, significantly differed from the other two conditions, ps < .001.

#### Results

Relationships among variables

Table 4.2 displays the results of correlation analysis among the variables at *T1* and *T2*. At both times, correlation between fusion and identification was high. Nevertheless,

despite this sizeable correlation, in all regression analyses the variance inflation factor (VIF) was always lower than 10 (FIVs < 5.55), ruling out concerns regarding multicollinearity (see also Gómez et al., 2011a).

Measure	Fusion <i>T1</i>	Identification T1	Fusion <i>T2</i>	Identification T2
Fusion <i>T1</i>		.63**	.83**	.61**
Identification T1			.61**	.87**
Fusion <i>T2</i>				.74**
Identification T2				

Table 4.2. Correlations among variables at T1 and T2

\*\* *p* < .01

To determine the effect of our experimental manipulation on outcome measures at T2 (fusion and identification), we conducted two multiple regression analysis considering as predictors the experimental condition (two dummy-coded variables were created with the control condition as the reference group: dummy code 1 compared the low invulnerability condition with the control condition, whereas dummy code 2 compared the high invulnerability condition with the control condition), verbal fusion and identification at T1 (centered), and all two-way and three-way interactions.

#### Fusion

The regression analysis on fusion at T2 yielded a main effect of fusion at T1,  $\beta = .82$ , t (99) = 7.01, p < .001, indicating that the higher the level of fusion at T1, the higher was the level of fusion at T2. No other main or interactive effect was significant, ps > .11. As expected, fusion at T1 was the single predictor of fusion at T2.

#### Identification

The regression analysis on identification at T2 yielded a main effect of identification at T1,  $\beta = .77$ , t (99) = 6.73, p < .001, indicating that the higher the level of identification at T1, the higher was the level of identification at T2. No other main or interactive effect was significant, ps > .31. Identification at T1 was the single predictor of identification at T2.

#### Conclusion

As far as identity fusion is concerned, results of Study 2 provide convergent support for the assumption that fusion is impervious to threats aimed at the personal self. Manipulating the sense of invulnerability failed to alter the level if identity fusion, as the single predictor of fusion at T2 was fusion at T1. Identification also remained constant.

Even though fusion is resistant to threats to the personal self, previous studies (Gómez et al., 2011a; Swann et al., 2009) demonstrated that fused people increase their willingness to fight and die for their group when their self-views are challenged. Furthermore, this effect is independent of whether the source of feedback is the ingroup or the outgroup (Swann et al., 2009). Thus, fusion seems to be stable, but its consequences could change as a consequence of manipulations aimed at the self. To test this possibility, Study 3 measures fusion as well as willingness to fight and die.

This modification in the design fulfills two purposes. First, if the consequences of fusion are modified despite fusion is not, we could argue that the manipulation was effective. Second, it makes it possible to check the stability of fusion against diverse threats, at the same time as the variability of its consequences. Previous studies demonstrated that challenging the personal or the social self of fused individuals triggered compensatory reactions (Gómez et al., 2011a, 2011b; Swann et al., 2009, 2010b), but fusion was never considered both as the independent and the dependent variable.

#### Study 3:

### Meta-stereotypes strike back: Does a the manipulation of one's commitment to the group affect fusion and willingness to fight and die for the group differently as a function of the source of feedback?

Study 3 will dispense other kind of manipulation aimed at the personal self by providing an evaluation of one's commitment to the group. Event though we expect modifications in willingness to fight and die for the group as a result of this manipulation, fusion should remain stable against it as in Studies 1 and 2.

Fused people are characterized by a strong belief that they are more committed and more willing to take extraordinary actions for the sake of their group than the rest of group members. Presumably, to tell high fused people that they are more devoted to their group than most group members is not threatening, but verifying. Therefore, we should not expect changes in their willingness to fight and die for the group. In contrast, to tell low fused people that they are more devoted to their group than most group members should be threatening as this feedback does not match with their self-concept. In turn, they should engage in compensatory reactions to restore their self-concept, by reducing their willingness to fight and die for their group. However, these predictions could change if the feedback comes from outgroup members.

To test this hypothesis we conducted an experiment with two groups, Spaniards and immigrants, manipulating participant's commitment to the group. In the first phase, participants completed measures of fusion and identification with their country. This information would supposedly be evaluated by a group of Spanish teachers from the Psychology Faculty of UNED. In the second wave, participants received feedback about their degree of commitment to their group. For immigrant students the evaluators were outgroup members, whereas for Spanish students the evaluators were ingroup members. The design was a factorial 2 (source of feedback: ingroup vs. outgroup) x 2 (commitment condition: control vs. high commitment), with identification and fusion as continuous measures.

#### Method

#### **Participants**

One hundred and twenty two high school students (62 girls and 60 boys, mean age = 15.70, SD = 1.10) completed this research with the consent of their school and parents.

#### Procedure

The experiment was conducted in two waves separated by two days. During the first wave, participants were provided with a brief description of the investigation and completed the verbal *fusion* scale (Gómez et al., 2011a),  $\alpha = .92$ , and the *identification* scale (adapted from Mael & Asforth, 1992),  $\alpha = .85$ , considering Spain as the focal group.

During the second wave, participants learned that a group of Spanish teachers from UNED (the "evaluators") had analyzed their questionnaires and compared their responses with the rest of the participants of their same nationality in the study. Thus, *participants in the outgroup condition* were immigrants, whereas *participants in the ingroup condition* were Spaniards. *Participants in the high commitment condition* learned that, they were more committed to the group and more willing to perform progroup activity than the majority of participants of the study. Then, they proceed to the rest of the questionnaire. *Participants in the control condition* were told that they would receive feedback after completing the rest of the questionnaire.

The final questionnaire contained the dependent variables (fusion, identification and willingness to fight and die for the group) and the manipulation check about the feedback.

Participants completed the same measures of *identity fusion*,  $\alpha = .95$ , and *identification*,  $\alpha = .91$ , as in wave 1.

*Willingness to fight and die for the group* was assessed by a 8-item scale (adapted from Swann et al., 2009) ranging from 0 ("strongly disagree") to 6 ("strongly agree"),  $\alpha$  = .96. This scale contained items such as "I would fight someone insulting or making fun of my country as a whole" and "I would sacrifice my life if it saved another member from my country".

Finally, to determine the effectiveness of our experimental manipulation, we used a 2-item scale, r(121) = .68, p < .01: "Teachers of UNED have told me that I am slightly committed to my country", "Teachers from UNED think that I would do less for my country than other group members would do". For the control condition we formulate these items hypothetically, i.e.: "I think that teachers from UNED will tell me that I am slightly committed to my country". A 2x2 ANOVA on the manipulation check only yielded a significant effect of the commitment condition,  $F(1, 117) = 37.52 \ p < .001$ , indicating that participants in the commitment condition expressed less agreement with the items of the manipulation check than participants in the control condition, M = 1.30, SD = 1.60 vs. M = 3.22, SD = 1.50 respectively, t(119) = 6.79, p < .001. No other effect was significant, ps > .32.

#### Results

Relationships among variables

Table 4.3 displays the results of correlation analysis among the variables at T1 and T2. At both times, correlation between fusion and identification was high. Nevertheless, despite this sizeable correlation, in all regression analyses the variance inflation factor (VIF) was always lower than 10 (FIVs < 4.78), ruling out concerns regarding multicollinearity (see also Gómez et al., 2011a).

Measure	Fusion <i>T1</i>	Identification T1	Fusion <i>T2</i>	Identification T2	Fight die T2
Fusion <i>T1</i>		.72**	.77**	.65**	.70**
Identification T1			.62**	.76**	.50**
Fusion <i>T2</i>				.83**	.82**
Identification T2					.68**
Fight/Die T2					

Table 4.3. Correlations among variables at *T1* and at *T2*.

\*\* *p* < .01

**Regression analyses** 

To determine the effect of our experimental manipulation on outcome variables (fusion, identification and willingness to fight and die for the group at T2), we conducted several multiple regression analyses considering as predictors the commitment condition (-1, 1), the source of feedback (-1, 1), verbal fusion and identification at T1 (centered), and all two-way, three-way and four way interactions.

#### Fusion

The regression analysis on fusion at T2 only yielded a main effect of fusion at T1,  $\beta = .53$ , t (106) = 5.59, p < .001, indicating that the higher the level of fusion at T1, the higher was the level of fusion at T2. Fusion at T1 was the only predictor of fusion at T2. This main effect was not qualified by any higher order interaction, p = .14.

#### Identification

The regression analysis on identification at T2 only yielded a main effect of identification at T1,  $\beta = .56$ , t (106) = 5.54, p < .001, indicating that the higher the level of identification at T1, the higher was the level of identification at T2. Identification at

*T1* was the only predictor of identification at *T2*. This main effect was not qualified by any higher order interaction, p = .10.

#### Fight/die

The regression analysis on willingness to fight and die for the group yielded a significant effect of the triple interaction between fusion at *T1*, commitment condition and source of feedback,  $\beta = .24$ , t (106) = 2.70, p < .01. Further analyses traced the triple interaction to a tendency for the interaction between fusion and commitment feedback to take different forms among participants who received feedback from ingroup versus outgroup members.

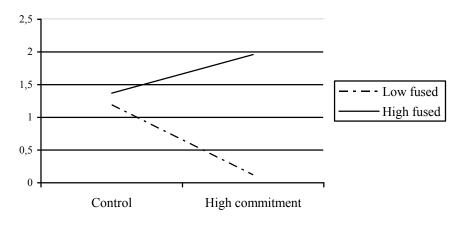
The interaction between commitment condition and fusion was significant among Spaniards, who received feedback from ingroup members,  $\beta = .35$ , t(72) = 3.32, p < .001. Low fused participants were less willing to fight and die for their group in the high commitment condition than in the control condition, M = .22, SD = .36 vs. M = .77, SD = 1.07 respectively, t(40) = 2.31, p < .05. However, high fused participants did not differ as a function of the commitment condition, p = .17 (See Figure 4.1).

The interaction between commitment condition and fusion was also significant among immigrants, who received feedback from outgroup members,  $\beta = -.24$ , t (42) = -2.23, p < .05. Low fused participants were more willing to fight and die for their group in the high commitment than in the control condition, M = 1.94, SD = .99 vs. M = 1.06, SD = .96 respectively, t (22) = -2.18, p < .05. However, high fused participants were less willing to fight and die for their group in the high commitment than in the control condition, M = 3.29, SD = .41 vs. M = 4.18, SD = 1.03 respectively, t (20) = 2.57, p <.05 (See Figure 4.1).

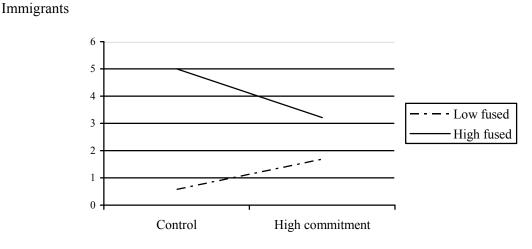
This triple interaction effect was not qualified by any higher order interaction, p = .93.

We also obtained a main effect of fusion,  $\beta = .49$ , t (106) = 5.46, p < .001, indicating that the higher the level of fusion at *T1*, the higher was the level of fight and die at *T2*. There was also a main effect of the source of feedback,  $\beta = -.34$ , t (106) = -4.78, p < .001, indicating that immigrants expressed more willingness to fight and die for their group than Spaniards, M = 2.55, SD = 1.53 vs. M = .84, SD = 1.07 respectively, t (120) = 7.25, p < .001.





Values for high and low fusion were  $\pm 1$  SD from the mean (M = 1.83, SD = 1.31).



Values for high and low fusion were  $\pm 1$  SD from the mean (M = 3.03, SD = 1.41).

Figure 4.1. Willingness to fight and die for the group as a function of fusion at *T1*, the commitment condition and the source of feedback.

#### Additional analyses for Studies 1, 2, and 3

To obtain further support for the stability of fusion, we conducted a meta-analysis on Studies 1, 2, and 3, with the aim of exploring the correlations between fusion at T1and fusion at T2. To that end, we divided the total sample of Spanish participants in three tertiles (low fused, medium fused, and high fused) according to their level of fusion at T1. Then, we compared the correlation coefficients of T1 and T2. We conducted the same analysis with identification at T1 and T2. Table 4.4 contains the correlations coefficients for each tertile for fusion and identification.

	FUS	ION	IDENTIFICATION		
Tertile	r	n	r	n	
Tertile 1	.29 <sup>b</sup>	121	.46	122	
Tertile 2	.40 <sup>b</sup>	139	.31	136	
Tertile 3	.62ª	119	.46	121	

Table 4.4. Comparison of correlation coefficients for fusion and identification

Results indicated that the correlation between fusion at T1 and fusion at T2 was significantly higher for the third tertile (high fused participants) than for the second tertile (medium fused), Z = 2.38, p < .05, and first tertile (low fused participants), Z =3.26, p < .01. There was no difference between Tertile 1 and Tertile 2, Z = 0.99, p = .32. These results suggest that high fused participants remained fused from T1 to T2, to a greater extent than medium and low fused participants. Thus, once that a person is highly fused, he/she is extremely likely to continue being fused in the future.

Regarding identification, no difference was found among the three tertiles. The stability of identification was similar among high, medium and low identified participants ps > .16.

#### Conclusion

Study 3 yielded interesting and enriching results. In line with previous findings, the stability of fusion is evident once again regardless of the manipulation of information regarding one's commitment to the group and the source of that feedback. These manipulations, however, did provoke diverse reactions as a function of previous levels of fusion. Low fused Spaniards engaged in compensatory reactions to restore their threatened self-concept, when they were told by fellow ingroup members that they were more devoted to the group than the majority. In contrast, among immigrants who received this same information from outgroup members the pattern of results was reversed. Low fused participants expressed more willingness to fight and die for their group, whereas high fused participants reduced their willingness to fight and die for their group as compared to a control condition.

Results found in Spanish participants confirmed previous results indicating that people reacted to a threat to their self-concept by engaging in compensatory activities to restore their sense of prediction and control (Gómez et al., 2009; Swann, 2011a). Conceivably, as low fused individuals perceived themselves as less devoted to their group than the majority, they should have felt threatened when were told the opposite by ingroup members. Thus, they reacted to this disconfirming feedback by reducing their willingness to fight and die for their group even more.

In contrast, results found in immigrant participants could be explained based on meta-stereotypes, rather than a challenge to the self-concept. For immigrant students, Spaniards are not only outgroup members, but also members of a high status majority. Low power groups are more inclined than high power groups to activate and apply meta-stereotypes (Lammers et al., 2008). As mentioned in Chapter 2, Vorauer (2006) stated that low status groups' members attach greater pragmatic importance to the opinion of higher status groups' than on the contrary, insofar as the high status group posses the control over resources and is considered to be more competent to provide valid evaluations. This assumption could explain why low fused immigrants increased their willingness to fight and die for their country. Their change presumably reflects a desire to align with the opinion of members of the high status majority. On the contrary, high fused participants could have interpreted the feedback as a punishment from the majority group. The majority group could see members of low status group who are too devoted to their group as subversive. To counteract that interpretation and seem more cooperative and conforming with the statu quo, they reduced their willingness to fight and die for the group.

In sum, these results extend previous research (Gómez et al., 2011a, 2011b; Swann et al., 2009, 2010a, 2010b) about the consequences of identity fusion, but they also give further support for the stability of fusion against experimental manipulations. Three different manipulations were ineffective for modifying levels of fusion. However, these results also evidence the influence of the context on fusion. Levels of fusion as well as willingness to fight and die for the group were higher among immigrants as compared with Spaniards. To examine in detail the influence of contextual factors, we conducted the last study of this thesis, in which we explore the consequences of a big impact event on fusion with the country and other related variables. In particular, we assessed the stability of fusion to the FIFA World Cup 2010. According to a survey conducted in March-April of 2010 (before the World Cup) by the Centre for Sociological Research (Centro de Investigaciones Sociológicas [CIS], 2010a), a 85.1% of the respondents said they felt very or quite proud when a Spanish athlete or team performed well in a championship. Given that football is the favorite sport of Spanish society (Centro de Investigaciones Sociológicas [CIS], 2007), the FIFA World Cup was likely to influence the attachment of the individual to the national group.

# Study 4: The World Cup Study: May fusion change as a result of contextual factors?

Studies 1, 2, and 3 support the stability of fusion against three different manipulations directed to the self. However, as mentioned in the introduction, rates of fusion with Spain assessed by the pictorial measure (Swann et al., 2009) have remarkably dropped from the first published study to the last one (see Gómez et al., 2011b; Swann et al., 2009), conceivably because of the economic crisis affecting Spain since 2008. This finding led us to think that identity fusion is subject to change as a result of contextual forces. To examine this question we conducted a research in the context of the FIFA World Cup 2010, in which the Spanish football was the champion.

Study 4 was designed to test whether fusion and other related variables (agency, invulnerability and willingness to fight and die for the group) may be sensitive to social events as this. We also included identification, which remained unchanged to our experimental manipulations. The study was conducted in two waves with a minimum separation of six months. In the first wave participants completed a questionnaire including all the measures just mentioned. After six months and just before the World Cup, we sent an email to half of the participants inviting them to collaborate in the second wave of the study. After the World Cup, the other half of the participants received a similar email.

As fusion has followed a downward trend according to the percentage of the first (Swann et al., 2009) and last study (Gómez et al., 2011b) about fusion, respondents who participated immediately before the World Cup will show lower scores in the second wave than in the first wave. In contrast, stimulated by the success in the World Cup,

respondents who participated immediately after this event should increase their level of fusion in wave 2 as compared with Wave 1.

#### Method

#### **Participants**

One thousand eight hundred and ninety seven (1359 women and 538 men, mean age = 31.52, SD = 9.43) psychology students at the Universidad Nacional de Educación a Distancia (UNED), participated in the first wave, and 525 (385 women and 140 men, mean age = 32.34, SD = 9.04) psychology students participated in the second wave which took place six months later. A MANOVA across the set of measures at T1 (fusion, identification, agency, invulnerability and willingness to fight and die for the group) considering as condition the participation in Wave 1 or the two waves, yielded no significant multivariate effect, ps > .12. There was no difference between participants who dropped out of the study after wave 1 and participants who completed the two waves.

Three reasons explain this high attrition: a) not all participants indicated their email in wave 1, b) participation in wave 1 was rewarded with course credit, whereas participation in the second wave was completely voluntary, c) students were in their holiday period during the course of the wave 2.

#### Procedure

The questionnaires at both waves were identical and completed on an individual basis and online. Following completion of the longitudinal study, participants were debriefed and thanked.

During the first wave, participants were provided with a brief description of the investigation and completed the verbal *fusion* scale (Gómez et al., 2011a),  $\alpha = .82$ , and the *identification* scale (adapted from Mael & Asforth, 1992),  $\alpha = .86$ , considering Spain as the focal group.

As possible mediators, we included agency and invulnerability as proposed by Gómez et al. (2011a). *Invulnerability* was measured by the scale (Gómez et al., 2011a),  $\alpha = .80$ , already used in Study 2. *Agency* was measured by a 5-item scale (Gómez et al., 2011a) ranging from 0 ("strongly disagree") to 6 ("strongly agree"). Examples of such

items are: "I am able to control what my group does," and "I am able to control what my group does in the same way that I control what I do,"  $\alpha = .70$ .

*Willingness to fight and die for the group* was measured with the same scale (Swann et al., 2009) used in Study 3,  $\alpha = .80$ .

Six months later, we contacted participants again to ask them to complete the second wave of the studies. The questionnaire was identical to the questionnaire of Wave 1. *Participants in the Pre-championship condition* completed the second wave during the month preceding the World Cup,  $\alpha s > .73$ . *Participants in the Post-championship condition* completed the second wave during the week following the event,  $\alpha s > .80$ . From now on, to simplify the description of the results, we will refer to the Pre-championship and Post-championship conditions as Pre and Post conditions respectively.

# Results

# **Analytical strategy**

In a first section of preliminary analyses we will employ multivariate methods to test whether the longitudinal and cross-sectional effects were significant. Additionally, we will show interrelationships among variables at both times.

In a second section, result will be analysed cross-sectionally. We will conduct two sets of cross-sectional analyses, one for TI (n = 1897) and another for T2 (n = 525), to examine the effects of our predictor variables (fusion and identification) on the outcome variables (agency, invulnerability and willingness to fight and die for the group). Additionally, in both sets of analyses (at TI and at T2) we will test the mediational model proposed by Gómez et al. (2011a) to determine whether the effect of fusion on fight/die is mediated by agency and invulnerability as previous findings indicates. To that end, we will use a bootstrapping test provided by Preacher and Hayes (2008).

In the third and final section, result will be analysed longitudinally. We will conduct five longitudinal analyses (n = 525), to examine the effects of our predictor variables (fusion and identification at *T1*, condition and interactions) on the outcome variables (fusion, identification, agency, invulnerability, and willingness to fight and die for the group at *T2*). Additionally, we will test the mediational model proposed by Gómez et al. (2011a) to test whether the effect of the interaction between fusion at *T1* 

and condition on fight/die at T2 is mediated by agency and invulnerability at T2 as previous findings indicates.

A MANOVA across the set of measures at T1 showed no differences as a function of condition at T1, ps > .20. Thus, following results cannot be attributed to previous differences between participants in the Pre and Post conditions.

# **Preliminary analysis**

#### Changes of Means over Time

To check whether variables changed from T1 to T2 as a function of condition we conducted a repeated-measures MANOVA. This analysis revealed that scores changed significantly over time, F(4, 523) = 8.29, p < .001. Table 4.5 contains the means and standard deviations at T1 and at T2 as a function of condition. Right column shows the mean difference from T1 to T2 for each condition, and whether that difference is significant. Participants who responded before the World Cup showed lower levels in fusion, identification and invulnerability at T2 as compared with T1. Participants who responded after the World Cup showed higher levels in fusion, agency and fight/die at T2 as compared with T1, however, identification did not change.

		WAVE 1		WA	VE 2	
	CONDITION	Mean	SD	Mean	SD	MEAN DIF.
FUSION	Pre (n=378)	1.91	.98	1.79	1.00	12**
	Post (n=147)	1.89	.94	2.13	1.14	.24***
IDENTIFICATION	Pre (n=378)	2.87	1.21	2.63	1.22	23***
	Post (n=147)	2.97	1.13	2.92	1.34	05
AGENCY	Pre (n=378)	.85	.79	.85	.82	.01
	Post (n=147)	.93	.82	1.11	.89	.18**
INVULNERABILITY	Pre (n=378)	2.05	.82	1.91	.83	13***
	Post (n=147)	2.11	.85	2.10	1.00	01
FIGHT DIE	Pre (n=378)	1.01	.85	1.03	.81	.02
	Post (n=147)	1.12	.79	1.28	.93	.16*

Table 4.5. Changes of Means from *T1* to *T2* as a function of condition.

*Note*: p < .05, p < .01, p < .001.

A MANOVA across the set of measures at T2 yielded a significant effect for every measure as a function of condition, ps < .05, indicating that participants who responded after the World Cup showed higher levels of fusion, identification, agency, invulnerability and fight/die than participants who responded before, ps < .05.

Interrelationships among variables

Table 4.6 displays the results of correlation analysis among the variables at T1 and T2. At both times, fusion and identification are positively correlated with agency, invulnerability, and fight/die.

Measure	1.	2.	3.	4.	5.
1. Fusion		.56**	.36**	.35**	.39**
2. Identification	.68**		.27**	.23**	.29**
3. Agency	.46**	.40**		.29**	.32**
4. Invulnerability	.42**	.34**	.38**		.28**
5. Fight/Die	.46**	.45**	.43**	.32**	

Table 4.6. Interrelationships of Variables at T1 (above the diagonal) and T2 (below the diagonal)

\*\* *p* < .01

# **Cross-sectional analyses**

# Wave 1

We conducted several regression analyses to test whether fusion and identification affected our mediators (agency and invulnerability) and outcome variable (willingness to fight and die for the group). The predictors were fusion and identification (both centered), and the 2-way interaction.

# Agency

The regression analysis on agency yielded a significant main effect of fusion,  $\beta = .37$ , t(1893) = 13.96, p < .001, indicating that the higher the level of fusion, the higher was the level of agency. We also obtained a weaker effect of identification,  $\beta = .08$ , t (1893) = 3.09, p < .01, indicating that the higher the level of identification, the higher

was the level of agency. The interactive effect was not significant, p = .34. Thus fusion was the strongest predictor of agency at *T1*.

# Invulnerability

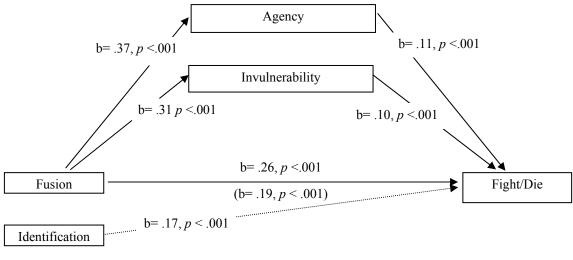
The regression analysis on invulnerability showed a significant main effect of fusion,  $\beta = .32$ , t(1893) = 11.81, p < .001, indicating that the higher the level of fusion, the higher was the level of invulnerability. We also obtained a weaker effect of identification,  $\beta = .08$ , t(1893) = 2.88, p < .01, indicating that the higher the level of identification, the higher was the level of invulnerability. The interactive effect was not significant, p = .42. Thus, fusion was the strongest predictor of invulnerability at *T1*.

# Fight/Die

The regression analysis on fight/die yielded a significant main effect of fusion,  $\beta = .27$ , t(1893) = 10.21, p < .001, indicating that the higher the level of fusion, the higher was the level of willingness to fight and die for the group. We also obtained a weaker effect of identification,  $\beta = .22$ , t(1893) = 8.50, p < .001, indicating that the higher the level of identification, the higher was the level of willingness to fight and die for the group. The interactive effect between fusion and identification,  $\beta = .09$ , t(1893) = 4.45, p < .001, was significant, indicating that in high fused participants,  $\beta = .29$ , t(904) = 9.03, p < .001, identification was a better predictor for willingness to fight and die than in low fused participants,  $\beta = .21$ , t(989) = 6.71, p < .001.

#### Cross-sectional mediational analysis at T1

Fusion seemed to be a better predictor than identification for the mediators and also for the outcome variables. Therefore, we conducted a bootstrapping test (n boots = 5,000) using the SPSS macro provided by Preacher and Hayes (2008) to test whether the effect of fusion on fight/die was mediated by agency and invulnerability as previous findings indicates (Gómez et al., 2011a). We controlled for the main effect of identification by including it as a covariate. The results of the analysis (see Figure 4.2) indicated that feelings of agency and invulnerability partially mediated the effect of fusion on endorsement of extreme behavior for the group (none of the confidence intervals of the bootstrapping at the 95% confidence interval for each of the potential mediators included zero, but the effect of fusion remained significant when the mediators were included in the equation).



Total: 95% CI = .0503 to .0961, boots = 5000Agency: 95% CI = .0223 to .0586, boots = 5000Invulnerability: 95% CI = .0186 to .0479, boots = 5000

Figure 4.2. Cross-sectional mediational analysis at T1

# Wave 2

In wave 2, we conducted several regression analyses to test whether fusion, identification and condition influenced our outcome variables: agency, invulnerability, and fight/die. The predictors were fusion and identification (both centered), condition (effect coded, -1 for pre-championship, and 1 for post-championship) and the 2-way and 3-way interactions as predictors.

# Agency

The regression analysis onto agency yielded a significant effect of the interaction between fusion and condition,  $\beta = .13$ , t (517) = 2.09, p < .05, indicating that high fused participants showed more agency in the Post condition than in the Pre condition, M = 1.56, SD = .86 vs. M = 1.11, SD = .90 respectively, t (248) = -3.87, p < .001. No difference was found between condition in low fused participants, p = .12.

We also obtained a significant main effect of fusion,  $\beta = .38$ , t (517) = 6.02, p < .001, indicating that the higher the level of fusion, the higher was the level of agency. The effect of identification was significant, but weaker,  $\beta = .16$ , t (517) = 2.58, p < .05, indicating the higher the level of identification, the higher was the level of agency. No other effect was significant, ps > .10.

#### Invulnerability

The regression analysis onto invulnerability yielded a significant effect of the interaction between fusion and condition,  $\beta = .21$ , t (517) = 3.36, p < .001, indicating that high fused participants showed more invulnerability in the Post condition than in the Pre condition, M = 2.52, SD = .95 vs. M = 2.15, SD = .90 respectively, t (248) = -3.04, p < .01. No difference was found between conditions in low fused participants, p = .11.

Additionally, we obtained a main effect of fusion,  $\beta = .43$ , t (517) = 6.72, p < .001, indicating that the higher the level of fusion, the higher was the level of invulnerability. No other effect was significant, ps > .11.

# Fight/Die

The regression analysis yielded the expected interactive effect of fusion by condition,  $\beta = .14$ , t (517) = 2.27, p < .05, indicating that high fused participants showed more willingness to fight and die for their group in the Post condition than in the Pre condition, M = 1.66, SD = .96 vs. M = 1.35, SD = .88 respectively, t (248) = -2.56, p < .05. No difference was found between conditions in low fused participants, p = .82.

There were a significant main effect of fusion,  $\beta = .33$ , t (517) = 5.30, p < .001, indicating that the higher the level of fusion, the higher was the level of fight/die. The effect of identification was lower, but weaker,  $\beta = .21$ , t (517) = 3.48, p < .01, indicating that the higher the level of identification, the higher was the level of fight/die. No other effect was significant, ps > .09.

## Cross-sectional mediational analysis at T2

To test whether the interactive effect between fusion and condition on fight/die was mediated by agency and invulnerability, we conducted a bootstrapping test (n boots = 5,000) using the SPSS macro provided by Preacher and Hayes (2008). We controlled for the main effect of condition, fusion, and identification by including them as covariates. The results of the analysis (see Figure 4.3) indicated that feelings of agency and invulnerability mediated the effect of the fusion by condition interaction on endorsement of extreme behavior for the group (none of the confidence intervals of the bootstrapping at the 95% confidence interval for each of the potential mediators included zero, and the effect of fusion by condition was no longer significant when the mediators were included in the equation).

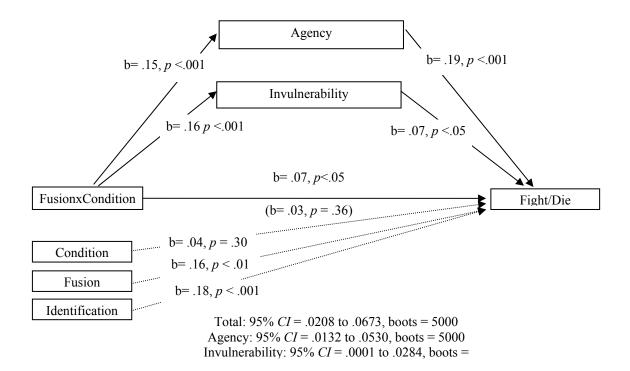


Figure 4.3. Cross-sectional mediational analysis at T2.

## Longitudinal analysis

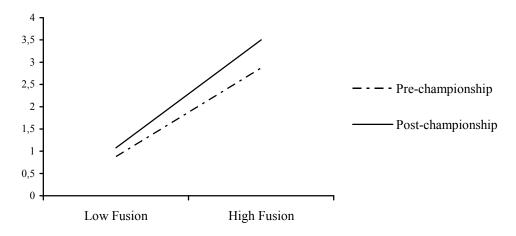
To examine whether fusion and identification at T1, condition, and whether their interactions affected our outcome variables at T2 (fusion, identification, agency, invulnerability, and willingness to fight and die for the group), we conducted several regression analysis. The predictors were: fusion and identification at T1 (both centered), condition (effect coded), and the 2-way and 3-way interactions.

# Fusion

The regression analysis on fusion at T2 yielded a significant interactive effect between fusion and condition,  $\beta = .09$ , t (517) = 2.11, p < .05. High fused participants at T1 showed higher levels of fusion at T2 in the Post condition than in the Pre condition, M = 2.85, SD = .99 vs. M = 2.36, SD = .89 respectively, t (235) = -3.62, p < .001. Low fused participants at T1 also showed higher levels of fusion at T2 in the Post condition than in the Pre condition, M = 1.60, SD = .95 vs. M = 1.30, SD = .81 respectively, t (286) = -2.70, p < .01. As can be seen in Figure 4.4, the difference between conditions was higher for high fused participants at T1.

We also obtained a main effect of fusion at TI,  $\beta = .63$ , t (517) = 14.15, p < .001, indicating that the higher the level of fusion at TI, the higher was the level of fusion at

*T2.* The effect of condition was significant,  $\beta = .13$ , t (517) = 3.62, p < .001, indicating that participants in the Post condition showed higher levels of fusion at *T2* than participants in the Pre condition, M = 2.13, SD = 1.14 vs. M = 1.79, SD = 1.00 respectively, t (523) = -3.41, p < .001. The main effect of identification was also significant,  $\beta = .13$ , t (517) = 3.03, p < .01, indicating that the higher was the level of identification at *T1*, the higher was the level of fusion at *T2*. No other effect was significant, ps > .42.



Values for high and low fusion were  $\pm 1$  SD from the mean (M = 1.90, SD = .97)

Figure 4.4. Fusion at T2

# Identification

The regression analysis onto identification at T2 yielded a significant interactive effect between identification and condition,  $\beta = -.09$ , t (517) = -1.99, p < .05. Low identified participants at T1 showed higher levels of identification at T2 in the Post condition than in the Pre condition, M = 2.21, SD = 1.14 vs. M = 1.92, SD = .94 respectively, t (250) = -2.05, p < .05. No difference was found in high identified participants, p = .34.

We also obtained a main effect of identification at TI,  $\beta = .48$ , t (517) = 10.43, p < .001, indicating that the higher the level of identification at TI, the higher was the level of identification at T2. There was a weaker effect of fusion at T1,  $\beta = .25$ , t (517) = 5.51, p < .001, indicating that the higher the level of fusion at T1, the higher was the level of identification at T2. We obtained a main effect of condition,  $\beta = .10$ , t (517) = 2.54, p < .05, indicating that participants in the Post condition showed higher identification than participants in the Pre condition, M = 2.95, SD = 1.34 vs. M = 2.63, SD = 1.22

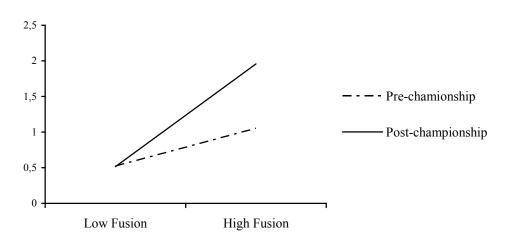
respectively, t (523) = -2.32, p < .05. The effect of the interaction fusion by condition was marginally significant,  $\beta = .08$ , t (517) = 1.85, p = .07. High fused participants at *T1* showed higher levels of identification at *T2* in the Post condition than in the Pre condition, M = 3.50, SD = 1.11 vs. M = 3.16, SD = 1.17 respectively, t (235) = -2.02, p < .05. Low fused participants at *T1* also showed higher levels of identification at *T2* in the Post condition than in the Pre condition, M = 2.48, SD = 1.33 vs. M = 2.19, SD =1.09 respectively, t (286) = -1.93, p = .05.

No other effect was significant, ps > .54.

#### Agency

The regression analysis onto agency yielded an interactive effect between fusion and condition,  $\beta = .19$ , t (517) = 3.39, p < .001. High fused participants at *T1* showed higher levels of agency at *T2* in the Post condition than in the Pre condition, M = 1.48, SD = .98 vs. M = 1.02, SD = .81 respectively, t (235) = -3.65, p < .001 (see Figure 4.5). No difference was found in low fused participants, p = .24.

We also obtained a main effect of fusion,  $\beta = .38$ , t (517) = 6.67, p < .001, indicating that the higher the level of fusion at *T1*, the higher was the level of agency at *T2*. The effect of condition was significant,  $\beta = .10$ , t (517) = 2.08, p < .05, indicating that participants in the Post condition showed higher agency than participants in the Pre condition, M = 1.11, SD = .89 vs. M = .86, SD = .82 respectively, t (523) = -3.12, p < .01. No other effect was significant, ps > .10.



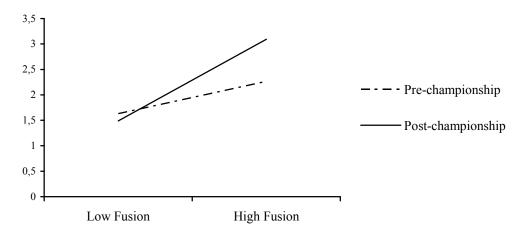
Values for high and low fusion were  $\pm 1$  SD from the mean (M = 1.90, SD = .97).

Figure 4.5. Agency at T2

#### Invulnerability

The regression analysis onto invulnerability yielded an interactive effect between fusion and condition,  $\beta = .12$ , t (517) = 2.06, p < .05. High fused participants at *T1* showed higher levels of invulnerability at *T2* in the Post condition than in the Pre condition, M = 2.52, SD = 1.07 vs. M = 2.12, SD = .83 respectively, t (235) = -3.02, p < .01 (see Figure 4.6). No difference was found in low fused participants, p = .60.

We also obtained a main effect of fusion,  $\beta = .34$ , t (517) = 5.91, p < .001, indicating that the higher the level of fusion at *T1*, the higher was the level of invulnerability at *T2*. No other effect was significant, ps > .11.



Values for high and low fusion were  $\pm 1$  SD from the mean (M = 1.90, SD = .97).

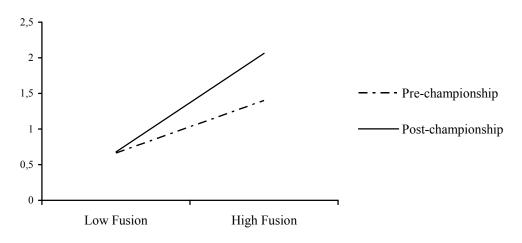
Figure 4.6. Invulnerability at T2

#### *Fight/Die*

The regression analysis onto fight/die yielded an interactive effect between fusion and condition,  $\beta = .16$ , t (517) = 2.81, p < .01. High fused participants at *T1* showed higher levels of willingness to fight and die for their group at *T2* in the Post condition than in the Pre condition, M = 1.71 SD = .98 vs. M = 1.29, SD = .86 respectively, t (235)= -3.21, p < .01 (see Figure 4.7). No difference was found in low fused participants, p = .14.

We also obtained a main effect of fusion,  $\beta = .35$ , t (517) = 6.28, p < .001, indicating that the higher the level of fusion at *T1*, the higher was the level of fight/die at *T2*. There was a significant main effect of Identification,  $\beta = .15$ , t (517) = 2.61, p < .01, indicating that the higher the level of identification at *T1*, the higher was the level

of fight/die at *T2*. Finally, we obtained a main effect of condition,  $\beta = .13$ , t (517) = 2.83, p < .01, indicating that participants in the Post condition showed higher willingness to fight and die for their group than participants in the Pre condition, M = 1.28, SD = .94 vs. M = 1.03, SD = .81 respectively, t (523) = -2.96, p < .01. No other effect was significant, ps > .30.

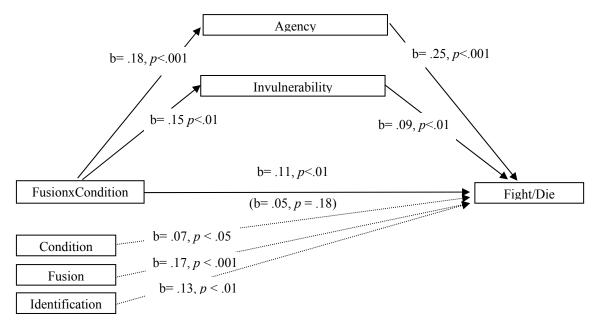


Values for high and low fusion were  $\pm 1$  SD from the mean (M = 1.90, SD = .97).

Figure 4.7. Willingness to fight and die for the group at T2

# Longitudinal mediational analysis

To test whether the effect of the interaction between fusion at T1 and condition on fight/die at T2 was mediated by agency and invulnerability at T2, we conducted a bootstrapping test (n boots = 5,000) using the SPSS macro provided by Preacher and Hayes (2008). We controlled for the main effect of condition, and fusion and identification at T1 by including them as covariates. The results of the analysis (see Figure 4.8) indicated that feelings of agency and invulnerability at T2 mediated the effect of the interaction fusion by condition on endorsement of extreme behavior for the group at T2 (none of the confidence intervals of the bootstrapping at the 95% confidence interval for each of the potential mediators included zero, and the effect of fusion by condition was no longer significant when the mediators were included in the equation).



Total: 95% CI = .0321 to .0898, boots = 5000Agency: 95% CI = .0229 to .0722, boots = 5000Invulnerability: 95% CI = .0036 to .0318, boots = 5000

Figure 4.8. Longitudinal mediation.

#### Conclusion

Study 4 suggests that levels of identity fusion may be modified as a consequence of external factors such as relevant sporting events. Individuals who participated after the World Cup showed higher levels of fusion as compared to individuals who participated before this championship and as compared to themselves six months before. More importantly, this difference was bigger in highly fused participants, who reacted to the victory in the World Cup by strengthening their bonds with their group. Additionally we detected a downward trend in fusion from T1 to T2 that was evident in the pre-championship condition, probably reflecting the impact of the economic crisis.

Hand in hand with fusion, feelings of personal agency, sense of invulnerability, and willingness to fight and die for the group increased for high fused participants who responded after the World Cup as compared to those who participated before. In contrast, low fused participants who responded after the World Cup were not affected by this sporting success, in that they showed similar levels of agency, invulnerability and fight/die as participants who responded before the World Cup.

Additionally, we replicated the mediational model proposed by Gómez et al. (2011a) both, cross-sectionally and longitudinally. Feelings of agency and invulnerability mediated the effect of fusion on willingness to fight and die for the

group at T1. At T2, feelings of agency and invulnerability mediated the interactive effect of fusion and condition on willingness to fight and die for the group. The longitudinal mediation showed that feelings of agency and invulnerability mediated the interactive effect of fusion at T1 and condition on willingness to fight and die for the group at T2.

In support of previous literature on fusion (Gómez et al, 2011a, 2011b; Swann et al, 2009, 2010a, 2010b), identity fusion turned out to be a stronger predictor for endorsement of extreme behavior on behalf of the group than identification. Identification with the group decreased from T1 to T2 in participants who responded before the World Cup and was maintained in participants who responded after this event. Unlike identity fusion, identification did not moderate the effect of the World Cup on the willingness to fight and die for the group.

# **General discussion**

Results of these four studies enrich previous literature on identity fusion (Gómez et al., 2011a, 2011b; Swann et al., 2009, 2010a, 2010b). Overall, this set of studies shows that identity fusion, as expected, remained unchanged against experimental manipulations which focused on the personal self (Studies 1, 2 and 3). Nonetheless, the willingness to perform extreme behavior for the group did change as a consequence of a personal threat. The results of three experiments support the notion that identity fusion is stable to a great extent, but its consequences are likely to be modified. Considering that fusion is related to extreme behavior on behalf of the group (see also Gómez et al., 2011a, 2011b; Swann et al., 2009, 2010a, 2010b) the certainty that its effects can be manipulated is not a trivial finding. Study 3 shows that questioning the degree of devotion of ingroup members may help bolster or reduce pro-group activity depending on the source of the feedback.

Even though fusion resists change to experimental manipulations, Study 4 indicates that external factors such as an athletic event may have an effect on fusion and, in turn, on its consequences. After the victory in the World Cup achieved by the Spanish football team, high fused individuals strengthened their attachment with their country even more, whereas low fused individuals remained impervious to this effect. Positive events of national interest presumably made fused people reinforce their

affiliation and involvement in the group, but did not lead low fused to become fused with their country.

These results also suggest that fusion is subject to change not only in response to high-impact events, but also in response to the subtle influences of the context. Participants who completed Wave 2 before the World Cup showed lower levels of fusion than in Wave 1. The cause of this downward trend is not clear, however, it is possible that the social, economic and politic crisis prevailing in Spain since 2008 had been undermining fusion with the country.

In addition to these valuable findings, Study 4 is particularly important since it is developed in a natural environment. The differential between the two conditions of the study was not artificially created by the research team, but naturally occurring. This characteristic multiplies the external validity of the results and makes it possible to begin to understand the dynamics of fusion outside the laboratory.

As in previous studies (Gómez et al., 2011a, 2011b; Swann et al., 2009, 2010a, 2010b), fusion exceeds identification in predictive power regarding extreme behavior on behalf of the group. For instance, in Study 4, results for the effects of identification could have been different with other kind of outcome variables, such as proclaiming one's affiliation or exhibiting group symbols. In this vein, the Basking-in-reflected-glory phenomenon (Cialdini et al., 1976), which is likely to appear in the athletic arena, describes the tendency to publicly proclaim a connection with another person or group who has been successful. Identification has proven to moderate this effect, such that high identified individuals are more prone than low identified individuals to succumb to this tendency (Wann & Branscombe, 1990).

# Limitations and future lines of research

In Studies 1 to 3 identity fusion remained stable against three different experimental manipulations aimed at the personal self. Even though, converging results from three studies appear to be remarkably robust evidence in favor of the stability of fusion, it could be argued that these manipulations were ineffective because they gravitated exclusively around the individual self. Future research should attempt to alter fusion by threatening the whole group to check whether fusion changes as a consequence. Highly fused individuals should react to personal threats in the same way as to group threats (see Gómez et al., 2009), that is, they should remain impassive

against experimental manipulations. However, low fused individuals who see their personal and social self as relatively independent entities could react differently depending on the identity that is threatened.

Another alternative for modifying fusion could be ostracizing the individual from the group. In this vein, Gómez et al. (2011b) showed that fused individuals reacted to social ostracism, based on positive (being too intelligent) or negative reasons (being from a disliked nationality), by intensifying their tendency to endorse extreme progroup actions, refusing to leave the group and donating more money to ingroup members.

Even though, fusion was impassive against experimental manipulations, it was permeable to contextual factors. A high-impact, positive event, reinforced fusion among those who were already fused, but it had no influence on low fused individuals. Perhaps, low fused individuals cannot become fused as a result of a group success, but they could move away from the group due to a group failing.

Negative events could lead low fused individuals to disengage even more from the group, but should not affect high fused members. Research on identification may shed light on this question. Doosje, Spears, and Ellemers (2002) studied how ingroup identification develops with changes. They found that high identifiers stuck with their group regardless of whether there is a change for better or for worse, however, low identifiers only displayed in-group identification when the status position of their group improved. As fused people are more devoted to the group than merely identified people, we expect them to remain loyal to the group even in the face of danger or problematic situations.

## Conclusions

Across four studies, we showed that identity fusion is impervious to experimental manipulations directed at the personal self, but context-sensitive. When the group achieved a long-desired goal, high fused individuals increased fusion with their group and willingness to fight and die for the group, whereas low fused individuals were unmoved by this event. Once again, fusion surpassed identification regarding the prediction of extreme behaviour on behalf of the group. More importantly, agency and invulnerability mediated the effect of fusion on willingness to perform pro-group activities cross-sectionally, but also longitudinally.

# CHAPTER 5

# **General discussion**

- 1. To be or to appear to be: verification and enhancement
- 2. Verification and intergroup relations
- 3. Verification and meta-stereotypes
- 4. Self-verification and identity fusion
- 5. Limitations and future research
- 6. Conclusions

#### **CHAPTER 5**

#### **General discussion**

#### 1. To be or to appear to be: verification and enhancement

Throughout these chapters, we tried to relate two separate lines of research: intergroup relations and identity verification. Literature on intergroup relations has been conspicuously dominated by the Social Identity Theory (Tajfel & Turner, 1979). According to this approach, group members are motivated to achieve and maintain a positive social identity (Hogg, 2006). To that end, they engage in social comparison with other relevant groups along several evaluative dimensions. In this process, group members often display ingroup favoritism and, if the result of the comparison is perceived as threatening for the group's value or distinctiveness, they may even opt for outgroup derogation (Branscombe et al., 1999a).

At the individual level of analysis, self-enhancement advocates also claim that people are motivated to take a flattering view of oneself and on aspects related to the self (Sedikides & Gregg, 2008). Two distinct versions of self-enhancement theory, simple and defensive self-enhancement, have emerged (Shrauger, 1975). Simple self-enhancement suggests that all people are equally motivated to self-enhance whereas defensive self-enhancement assumes that people with negative self-views are more motivated than people with positive self-views to self-enhance in a compensatory effort to win the favor of others (Swann et al., 1989). Self-enhancement promotes a high level of positive affect and self-esteem and other short-term psychological benefits (Sedikides, Herbst, Hardin, & Dardis, 2002).

As we have seen, both at the individual and intergroup levels, identity verification competes with enhancement in the explanation of behavior. The most provoking argument of the perspective of identity verification is that people prefer to verify their group and individual self-views rather than self-enhance them, regardless of the valence of those self-views (Gómez et al., 2009; Swann, 1983). Even though at first glance this assumption may be counterintuitive, identity verification provides a coherent self-view which fosters a sense of prediction and control (Swann, 2011).

Enhancement can produce benefits in the short term, but in long term relationships, in which group members or individuals get to know each other, verification seems to be more effective for paving the way for social interactions. Otherwise, misunderstandings could eventually undermine the relationship, as expectations and real behavior hardly match. People try to avoid overly positive evaluators because they could be disappointed when discovering the real self and abandon the relationship. For instance, married people with negative self-views become less intimate with partners who see them in an overly positive, non-verifying manner (Burke & Stets, 1999; De La Ronde & Swann, 1998; Schafer, Wickrama, & Keith, 1996; Swann et al., 1994), and even can seek divorce or separation from them (Cast & Burke, 2002).

The long term factor may be essential for understanding the positive effects of verification on intergroup relations found in our studies. In the first package, when meta-stereotype activation induced verification of ingroup identities, participants increased their desire to interact with members of lower status countries from the European Union. It is important to know that, when the studies were conducted, the membership of the European Union was perceived negatively by only 9.6% of the Spanish population and only 14.5% believed that the situation of the country would be better outside the European Union (CIS, 2010b). Therefore, we can assume that the Spanish population was interested in maintaining this relationship in the future. In package 2, verification of ingroup identity in non-threatening conditions improved the evaluation and behavior towards immigrants. In this case, the connection between ingroup and outgroup members is more intimate than in package 1, as they inhabit the same territory and share obligations and rights.

When individuals hold the expectation of being called on to explain, justify, and defend their self-evaluations to others, they reduce self-enhancement strivings (Sedikides et al., 2002). In the juncture of interdependent intergroup relations on which we focused, the ingroup presumably foresees that their real characteristics will be revealed to the outgroup sooner or later. Therefore, verification appears to be effective to prevent misunderstandings and promote intergroup relations on a realistic basis.

Apart from the kind of relationship involved, the distinction between affective and cognitive routes seemed to be important to explain the interplay of enhancement and verification in package 2. A recent meta-analysis by Kwang and Swann (2010) confirmed earlier evidence (Shrauger, 1975; Swann et al., 1987) that self-enhancement strivings shape affective reactions whereas self-verification strivings influence cognitive responses. In package 2, the salience of symbolic threat led participants to evaluate and

behave more positively with outgroup members when these outgroup members viewed ingroup members in a flattering manner. This preference for enhancement was presumably driven by affective reactions. On the contrary, in non-threatening conditions, participants preferred verification, probably reflecting a cognitive reasoning.

In addition to intergroup threat, other variables have been identified as moderators of the appearance of one motive or another. In particular, when a negative evaluation might signal disinterest in maintaining the relationship, self-enhancement strivings trump self-verification. Nonetheless, when rejection risk is low, self-verification strivings are stronger predictors of feedback seeking and relationship quality (Kwang & Swann, 2010).

Alongside with other studies, results of package 2 question the assumption that self-enhancement motives override the desire for self-verification (Sedikides, 1993; Sedikides, & Gregg, 2008). The complexity of social behavior cannot be readily captured by any single motive as verification or enhancement. Exploring the sophisticated interplay between multiple motives should be the goal of researchers in the field, beyond vain attempts of demonstrating the hegemony of one single motive. This work takes a further step in this direction. Furthermore, it represents the first test of the impact of verification on prejudice and behavior towards outgroup members as discussed in the next section.

# 2. Verification and intergroup relations

Previous research in the field of self-enhancement evidenced that individuals are less likely to evaluate a member of a stereotyped group negatively if their self-images have been previously bolstered, whereas they are more likely to evaluate that person stereotypically if their self-images have been threatened by negative feedback (Fein & Spencer, 1997). As most people in many different societies hold positive self-views (Diener & Diener, 1995), positive feedback could be interpreted as enhancing but also as verifying feedback. In fact, participants in the Fein and Spencer's (1997) experiment reported levels of self-esteem above the theoretical midpoint of the scale. Therefore, results could be reflecting both verification and enhancement strivings.

Package 2 tested the assumption that verification of ingroup identity may also play an important role on intergroup relations reducing prejudice towards outgroup members. In non-threatening conditions, participants who received verifying feedback from outgroup members reacted more positively towards them than participants who were provided with enhancing feedback. Results of package 1 offer converging evidence on the positive effect of verification of ingroup identity on intergroup relations. These studies indicate that when the meta-stereotype activation increased confirmation of group identities, willingness to engage in continued contact with members of lower status groups was also bolstered. On the contrary, when metastereotypes decreased the perception of group identities, participants showed lower desire for interaction.

More importantly, the positive effect of verification of ingroup identity found in package 2 was not restricted to evaluation of outgroup members, because it also increased real pro-outgroup behavior. Participants who received consistent information regarding their group identity donated more course credit to other immigrant students than participants who received enhancing feedback. Therefore, evaluative and behavioral measures agree in indicating that intergroup interactions can benefit from verification.

These results open the door to a new way of improving intergroup relations. Apart from verification of ingroup identity, other strategies for prejudice reduction as recategorization have focused on social identity, and more specifically, on social categorization. Recategorization has proven to be an effective strategy to foster intergroup friendship (Gaertner et al., 2000). Nonetheless, creating a superordinate identity is not always possible or effective. Sometimes, subordinate categorizations are so established and resistant that recategorization cannot take place (Hewstone, 1996). Additionally, if recategorization threatens ingroup distinctiveness, a perverse effect of bias amplification can occur (Deschamps & Brown, 1983).

Verification of ingroup identity does not require a modification or creation of a new identity, but rather serves to validate a stable image of one's group. Besides, far from threatening the perception of distinctiveness, the verification process implies the recognition and validation of group characteristics. These two strengths put verification in a privileged situation to smooth intergroup relations. Obviously, its potential should be multiplied if verification is applied in conjunction with other strategies to promote intergroup harmony. Verification of ingroup identity could act jointly with recategorization to create a superordinate identity which does not threaten the distinctiveness of subgroup categories. The mutual intergroup differentiation model (Hewstone & Brown, 1986) is based on the assumption that emphasizing the mutual distinctiveness between two groups in a context of cooperative interdependence can lead to more positive intergroup attitudes. Verification of ingroup identity could help to demonstrate that the ingroup recognizes the identity of the outgroup and vice versa. Mutual differentiation reduces threats to group distinctiveness, which facilitates the development of an inclusive representation of the groups (Gaertner et al., 2000). Thus, mutual differentiation can facilitate the integration of these two processes.

Verification of ingroup identity could also intensify the willingness to engage in intergroup contact. As package 1 suggests, participants who perceived verification of their group identities as a result of meta-stereotype activation, increased their desire to interact with members of lower status groups. These results were particularly interesting since they were obtained when lower status outgroups were considered. One of the limitations of the intergroup contact strategy lies in the resistance of high prejudiced people to enter into mixed interactions (Pettigrew, 1998). On the other hand, low prejudiced people usually hold especially negative beliefs about how the ingroup might be perceived by members of lower status outgroups (Vorauer et al., 1998). Fear of appearing prejudiced can lead members of the high status groups to experience anxiety (Devine, Evett, & Vasquez-Suson, 1996; Plant, 2004) and avoid interactions. Verification of ingroup identity could help break down initial barriers for intergroup contact.

Once established, intergroup contact may require identity verification to prosper, particularly, if the intergroup conflict is identity based. Rothman (1997) has defined identity-based conflicts as struggles rooted in the underlying human needs and values that constitute people's social identities. When group identities are threatened or frustrated, intractable conflict is almost inevitable. Therefore, if ingroup members start to believe that outgroup members validate their group identity, this may then be a step forward for conflict resolution.

Nevertheless, verification of ingroup identity is not the panacea for all intergroup problems. Package 2 showed that under conditions of threat, verification of negative

aspects of the ingroup identity by outgroup members generates more negative evaluations and behavior towards the source of the information (Fein & Spencer, 1997). Even though we did not test the effect of verification of positive aspects of the group identity under threat, we presume that such negative effect would not appear with positive characteristics. In the first phase of intergroup contact, it might be useful to confirm only positive traits associated with ingroup identity, especially if the outgroup is perceived as threatening by the ingroup.

Verification of ingroup identity can be also problematic in conflicts in which the identity of one group is built on the negation of the identity of the competing group. Bar-Tal (1998, 2007) states that society members involved in intractable conflicts develop various beliefs that facilitate coping with the conflict situation. One of those societal beliefs concerns a flattering image of the group, based on positive traits, values, and behaviors, that are assigned to one's own society in contrast with the adversary. The reconciliation process requires a change of those self-glorifying and self-praising societal beliefs about the ingroup (Bar-Tal, 2000), that could be slowed or impeded by the desire to validate pre-existing, accurate, and central beliefs about the ingroup.

Conservatism associated with verification of ingroup identity could also end up damaging the ingroup, if the ingroup identity is mostly negative. At the individual level, the self-verification process can perpetuate negative self-views and, in turn, lower self-esteem and cause depression (North & Swann, 2009). At the group level, experimental and field studies have shown that members of disadvantaged groups eventually accept unfavorable stereotypes of their own group and hold ambivalent attitudes about their group and favorable attitudes toward advantaged groups (Jost & Burgess, 2000; Jost, Pelham, & Carvallo, 2002; Sniderman & Piazza, 1993). The desire to validate those stable, negative images about the ingroup could hinder the emergence of a consciousness of inequality and foster system justification beliefs (Jost, Banaji, & Nosek, 2004).

Once we have reviewed the lights and shadows associated with verification of ingroup identity, we should analyze how to promote or halt its appearance on the intergroup sphere.

#### **3.** Verification and meta-stereotypes

Package 1 explored one of the antecedents of verification of ingroup identity: meta-stereotypes. Even though, previous research has repeatedly documented the negative effects derived from meta-stereotype activation (Finchilescu, 2010; Kamans et al., 2009; Vorauer et al., 1998), results of three studies showed that meta-stereotypes increased the desire to have intense contact with members of lower status groups. More importantly, the effect of the meta-stereotype on desire for interaction was mediated by verification of ingroup identity.

Meta-stereotypes and identity verification (or disconfirmation) are intimately related. Activating the beliefs of ingroup members about how they are viewed by outgroup members necessarily implies thinking about the ingroup to determine whether the meta-stereotype is fair or not. Problems arise when meta-stereotypes do not match with the self- stereotype and perception of identity verification is reduced, as package 1 indicates. As people generally believe that outgroup members have a negative image of the ingroup (e.g. Kramer & Messick, 1998; Kramer & Wei, 1999), the ground for misunderstandings grows.

Conditions for meta-stereotype activation are quite minimal, requiring only the potential for evaluation. Group members frame ambiguous intergroup interaction in terms of how they themselves are evaluated, and even an imagined interaction with an out-group member is sufficient to activate meta-stereotypes (Vorauer et al., 2000). This low activation threshold makes it difficult to escape the influence of meta-stereotypes and evaluative motives as verification. Therefore, intergroup relations would benefit if we learn to use meta-stereotypes strategically, acknowledging that meta-stereotypes have a contextual component (Gómez, 2002). The content and valence of meta-stereotypes vary as a function of the relations between the groups involved in the interaction. In particular, the relative status of the ingroup as compared with that of the outgroup seems particularly important as package 1 shows.

In the cooperative context studied in package 1, the European Union, the salience of meta-stereotypes increased the desire to interact with members of lower status outgroups. In other contexts, more competitive, meta-stereotypes have proven to exert a negative influence on intergroup relations (Finchilescu, 2010; Kamans et al., 2009; Vorauer et al., 1998), probably because these meta-stereotypes are extremely negative and inconsistent with the image that ingroup members have about themselves. One way to prevent the possible negative effects produced by meta-stereotypes in these conflicting circumstances would be to counteract them by manipulating their accessibility. As the last study of package 1 indicates, even an unfavorable metastereotype could promote desire for interaction with members of lower status outgroups if individuals experience the retrieval of traits as difficult. However, we must also not forget that a positive meta-stereotype could be harmful for intergroup orientations, if many traits are requested.

In any case, it is essential to ensure that the meta-stereotype that is activated fits the perception of ingroup members about the characteristics of their group. Otherwise, the failure to achieve verification of ingroup identity could lead ingroup members to avoid intergroup interactions, as package 1 suggests, or to evaluate outgroup members more negatively and perform less pro-outgroup behavior, as package 2 points out.

As we have shown, verification of ingroup identity significantly affects intergroup relations, however, self-verification also plays a relevant role in the intergroup realm. Individuals who perceive equivalence between their personal and social identity can engage in compensatory reactions when either their personal or social self is threatened (Swann et al., 2009).

#### 4. Self-verification and identity fusion

In Chapter 4, we addressed the intersection between verification of self and ingroup identities, namely identity fusion. Previous research demonstrated that, when fused individuals fail to obtain verification of their self or ingroup identity, they display compensatory reactions which revolve around the group's welfare. These reactions may have considerable implications as they share the characteristic of being extreme (see Gómez et al., 2011a, 2011b; Swann et al., 2009, 2010a, 2010b).

Literature on identity fusion has focused on the consequences of identity fusion, but has ignored the factors that can impact on it. According to our results, identity threat was responsible for increasing willingness to fight and die for the group, but it did not influence the level of identity fusion. Fusion was subject to alterations only by situational forces. The inability to change levels of identity fusion by means of temporary threats to the self does not down play the importance of these findings. Our results suggest that identity fusion is remarkably stable, therefore, rather than trying to modify fusion, we should concentrate our efforts in neutralizing its negative effects and promoting its positive effects on intergroup relations.

These effects are likely to be activated by identity threat as this work and related research pointed out (Gómez et al., 2011a, 2011b; Swann et al., 2009, 2010a, 2010b). Apparently, extreme behavior on behalf of the group should have negative consequences for the outgroup, but before jumping to conclusions, we must consider the role of norms. Jetten et al. (1996) manipulated in-group and out-group norms of discrimination and fairness in a task of allocating rewards. Results demonstrated that allocation strategies were in accord with the in-group norm, such that people were generally fair towards an outgroup if a group norm of fairness had been established. Otherwise they were biased in favor of their ingroup. Tarrant, Dazeley, and Cottom (2009) showed that participants reported stronger empathy and helping intentions towards ingroup than towards outgroup members. However, after the activation of an ingroup norm that prescribed the experience of empathy, participants experienced stronger empathy for outgroup members and expressed more positive emotions towards them. Thus, if ingroup norms are based on egalitarian, cooperative, and altruistic values, the behavior of fused individuals should not imply a threat for the outgroup.

#### 5. Limitations and future research

This thesis explored some of the antecedents (package 1), moderators (package 2) and consequences (packages 2 and 3) of verification of ingroup identity, however, many issues remain unresolved. The first question refers to the interplay between verification of ingroup identity and other strategies to promote intergroup harmony. As research on verification of ingroup identity (Gómez et al., 2009) is scarce, we focused exclusively on this strategy. Future research should determine how verification of ingroup identity can be implemented along with other strategies.

Package 2 showed that intergroup threat moderated the effects of verification of ingroup identity, however, future studies should consider implementing both a threat condition and a non-threat condition to directly compare these two possibilities.

The role of ingroup identification should be also analyzed. Package 1 showed no effect of ingroup identification on verification of ingroup identity, probably due to a ceiling effect. However, Gómez et al. (2009) found that high-identified individuals displayed stronger strivings for self-verification than low-identified participants.

In addition to threat and ingroup identification, other factors could modulate the strength of the group verification motive as can be derived from findings at the individual level. For instance, there is evidence that self-verification occurs when cognitive capacity is high and one is allowed to introspect, whereas self-enhancement tends to override self-verification strivings when cognitive capacity is limited (Hixon & Swann, 1993). On the other hand, self-verification depends on the nature of one's ties to the source of feedback. For instance, the epistemic and pragmatic costs of failing to be verified by a spouse are greater as compared with a dating partner (Swann et al., 1994). Therefore, people seek more verification when they are committed and intimate with the source of feedback.

At the intergroup level, Gómez et al. (2009) found strivings to verify ingroup identity regardless of the source of the feedback, ingroup or outgroup. However, their designs did not comprise these two possibilities (ingroup's vs. outgroup's feedback) simultaneously, and so there is no way of contrasting the effect of both sources. We did not compare these two possibilities either, therefore, the challenge ahead is to determine whether individuals are more interested in having ingroup or outgroup members verify their group identities.

Regarding the consequences of verification of ingroup identity for intergroup relations we included evaluative as well as behavioral measures. Future research should expand the repertoire of responses to verification of ingroup identity including emotions and expectations. For instance, Vorauer et al. (1998) found that activating meta-stereotypes (presumably non-verifying) was associated with negative emotions about intergroup interaction as well as decreases in current self-esteem and self-concept clarity.

# 6. Conclusions

This thesis merges two lines of research separated so far: verification motives and intergroup relations. Across three packages of studies we showed that verification of ingroup identity can benefit intergroup relations, but some precautions must be taken. In the face of threat, individuals preferred flattering rather than verifying evaluations of their group. In non-threatening situations, verification of ingroup identity improved the image of outgroup members and increased pro-outgroup behavior. Verification of ingroup identity can be induced by meta-stereotype activation, as long as the metastereotype comes into alignment with the perception that ingroup members have about themselves. Otherwise, meta-stereotype activation would reduce perceived verification and, in turn, could undermine the desire to engage in intergroup contact. For those individuals, namely fused, who see their personal and social self as a single entity, failure to obtain verification can lead to extreme behavior on behalf of the group. Identity fusion was resistant to manipulations aimed at the self, but was subject to change by the influence of contextual factors.

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