

I will help you because we are similar: Quality of contact mediates the effect of perceived similarity on facilitative behaviour towards immigrants

Lucía López-Rodríguez¹, Isabel Cuadrado², and Marisol Navas²

¹Department of Social and Organizational Psychology, Universidad Nacional de Educación a Distancia, Madrid, Spain

²Department of Psychology, University of Almería, Almería, Spain

This research aimed to analyse interpersonal behaviour towards immigrants by exploring related psychosocial variables such as intergroup similarity and quality of intergroup contact. A new interpersonal behavioural tendencies scale was developed. In Study 1, Spanish participants reported their willingness to take different actions towards a Moroccan (i.e. a devalued target, $n = 132$) or an Ecuadorian (i.e. a valued target, $n = 138$), perceived intergroup similarity and quality of intergroup contact. Multigroup confirmatory factor analysis identified the expected dimensions: active facilitation (AF), passive facilitation (PF), passive harm (PH) and active harm (AH). Participants reported less similarity, less pleasant contact, less AF and less PF, and more PH with respect to Moroccans relative to Ecuadorians. Quality of contact mediated the effect of perceived similarity on interpersonal behaviour (especially facilitative behaviour) towards immigrants. Study 2 ($N = 134$) confirmed that this mediation effect also applied to Romanian immigrants, and tested a serial mediation pathway, in which perceived similarity affected symbolic threat, which in turn affected quality of contact, which finally affected behaviour. Changing perceived intergroup similarity might be a way of improving the quality of contact with minority groups, and this would be expected to increase pro-social behaviour towards such groups.

Keywords: Interpersonal behavioural tendencies; Intergroup contact; Intergroup similarity.

Our world becomes more culturally diverse every day. Undoubtedly, this diversity brings enormous richness, but its impact on intercultural relations is double-edged and, sometimes, intergroup relations are not easy. Intergroup contact—especially under certain conditions—is an essential means of improving such relationships (Allport, 1954; Pettigrew, Tropp, Wagner, & Christ, 2011). We investigated the proposition that greater perceptions of intergroup similarity might be associated with better quality of contact with minority groups which, in turn, might be associated with higher pro-social behaviour towards them. We also attempted to explore the role of symbolic threat in this process and developed a new scale for evaluating majority behavioural tendencies towards immigrants.

Previous research has not usually considered the specificity of interpersonal behaviours. This research analyses the role of variables traditionally related to

intergroup relations on specific behavioural tendencies, which differ in valence and intensity.

Perceived intergroup similarity: Good or bad for intergroup relations?

The extent to which an outgroup is perceived as similar or dissimilar to the ingroup is an important predictor of intergroup attitudes. Existing evidence on the relationship between perceived intergroup similarity and positive intergroup attitudes is contradictory (for reviews see Jetten, Spears, & Postmes, 2004; Lopes, Vala, & Judd, 2012).

There continues to be considerable debate about whether intergroup similarity has a positive or negative impact on intergroup relations. It can be inferred from social identity theory (Tajfel & Turner, 1979) that any threat to group distinctiveness will generate

Correspondence should be addressed to Lucía López Rodríguez, Department of Social and Organizational Psychology, Universidad Nacional de Educación a Distancia, C/Juan del Rosal 10, 28040 Madrid, Spain. (E-mail: lucialopezrod@gmail.com).

This research was supported by FPU Grant AP2009-4881 and Grant PSI2011-22731 from the Spanish Ministry of Economy and Competitiveness.

negative attitudes, and hence that intergroup similarity will have a negative effect on intergroup relations. Self-categorisation theory (Turner, Hogg, Oakes, Reicher, & Wetherell, 1987) and intergroup threat theory (ITT; Stephan, Renfro, Esses, Stephan, & Martin, 2005), on the other hand, posits that the dissimilarity is associated with negative attitudes to outgroups. According to ITT perceived intergroup differences in values, traditions, culture or beliefs represent a potential threat to the world view of group members. This *symbolic threat* usually leads to negative attitudes towards immigrants. The proponents of ITT argued that perceived dissimilarity is especially problematic for intergroup relationships because such perceived group differences are usually exaggerated and do not reflect reality (Stephan et al., 2005). It follows from this that reducing perceived dissimilarity (e.g. by focussing on shared beliefs and values) should be a particularly effective method of decreasing symbolic threats, and thus improving relations between hosts and immigrants.

Several potential moderators of the relationship between intergroup similarity and intergroup attitudes have been proposed in an attempt to reconcile the apparently contradictory findings of the different theories. The evidence is particularly convincing with respect to *group identification* (e.g. Jetten, Spears, & Manstead, 2001; Jetten et al., 2004) and *goal interdependence* (e.g. Brown, 1984). It follows that the relationship between similarity and intergroup attitudes can be moderated by identification or goal interdependence, depending on whether intergroup similarity is defined in symbolic or instrumental terms (Lopes, 2010).

Relationships between majority and minority groups are complex and influenced by both instrumental and symbolic issues. In multicultural contexts, there is some evidence that similarity is positively associated with intergroup attitudes. Osbeck, Moghaddam, and Perreault (1997) examined the relationship between perceived similarity and social distance for minority and majority groups. Their findings supported the similarity-attraction hypothesis (Grant, 1993); perceived similarity to an ethnic outgroup was positively associated with willingness to associate with that outgroup, regardless of its status. Another study reported that perceived similarity to immigrants predicted positive assessment of contact at different levels (Morera et al., 2004).

Taken together, these findings support the idea that a greater perceived similarity with immigrants (irrespective if they are considered devalued or valued outgroups) may lead to a better quality of contact with them.

Intergroup contact may influence behavioural tendencies

The contact hypothesis (Allport, 1954) posits that interactions between members of conflicting groups, especially

under certain conditions (e.g. equal status, common goals), can promote positive attitudes and reduce intergroup hostility (Pettigrew et al., 2011). There is even some evidence that contact can increase pro-social intergroup behaviour (Koschate, Oethinger, Kuchenbrandt, & van Dick, 2012; Tausch & Hewstone, 2010).

Whilst some studies suggest that quality and quantity of contact are equally important (e.g. Brown, Vivian, & Hewstone, 1999), others suggest that quality of contact is more relevant (e.g. Eller & Abrams, 2004). Binder et al. (2009) found that whilst both quality and quantity of contact with outgroup friends were associated with a gradual reduction in prejudice, quality of contact appeared to be more important (e.g. there was no effect of quantity when the analysis controlled for variance in quality).

Despite the vast body of research on how intergroup contact influences intergroup attitudes, there are still gaps in our understanding of this relationship. This research investigated how well quality of contact predicted various dimensions of interpersonal behaviour towards devalued and valued immigrants. We also explored how quality of contact mediated the effect of perceived similarity on interpersonal behaviour.

Distinguishing between valence and intensity in the study of behaviour

Interpersonal behaviour between different group members has not been properly explored so far. In order to improve traditional views of intergroup bias as univalent antipathy (see Cuddy, Fiske, & Glick, 2007), we considered the valence (facilitative; harmful) and intensity (active; passive) of behaviour separately. Cuddy et al. (2007) explicitly identified four specific behaviours: active facilitation (acting for), passive facilitation (acting with), passive harm (acting without) and active harm (acting against). We used this approach to design a new interpersonal behavioural tendencies scale, developing items from Cuddy et al.'s (2007) conceptual framework and representing the respondent's perspective rather than the societal perspective, which was measured by Cuddy et al. (2007).

Overview

We carried out two studies to address the questions set out above.

Study 1 aimed to validate the four types of behaviour on which the new behavioural scale was based. We expected that they could be used to analyse behavioural tendencies towards different immigrant targets (valued or devalued) (Hypothesis 1; H_1). Evaluation of Spaniards (the majority group) by a minority group was used to provide further validation of the behavioural typology. For the purposes of this research, Moroccans and

Ecuadorians were considered as devalued and valued targets, respectively. As previous research had demonstrated, Spaniards had a more negative image of Moroccans (López-Rodríguez, Cuadrado, & Navas, 2013) and perceived them as a greater threat than Ecuadorians (Navas, Cuadrado, & López-Rodríguez, 2012). We predicted that majority group members would perceive themselves as less similar to, and inform less pleasant contact with Moroccans than Ecuadorians, as well as reporting less facilitative behaviour and more harmful behaviour towards Moroccans (Hypothesis 2; H_2).

Study 1 also explored how quality of contact mediated the relationship between perceived similarity and interpersonal behavioural tendencies. In this vein, we hypothesised that perceived similarity would be positively associated with quality of contact with immigrants (Hypothesis 3; H_3). We also hypothesised that quality of contact would be positively associated with facilitative behaviour and negatively associated with harmful behaviour towards immigrants (Hypothesis 4; H_4). Finally, we predicted that perceived similarity would be indirectly associated with interpersonal behavioural tendencies through its effect on quality of contact (Hypothesis 5; H_5). We expected these predictions to be confirmed regardless of the immigrant target assessed (valued vs. devalued).

Study 2 was intended to replicate the mediation of the relationship between perceived similarity and behaviour by quality of contact with a different target, Romanian immigrants, the largest immigrant group in Spain (INE, 2015). Spaniards' attitudes towards Romanians are somewhat in the middle between attitudes towards Moroccans and Ecuadorians (López-Rodríguez et al., 2013; Navas et al., 2012). This study tested a serial mediation model, where perceived similarity indirectly affects behavioural tendencies through both symbolic threat and quality of contact, with symbolic threat affecting quality of contact (Hypothesis 6; H_6).

STUDY 1

Method

Participants

Two hundred and seventy Spanish people volunteered to participate in this study.¹ There were two groups: the MT (Moroccan Target) group ($n = 132$; 56.1% women; $M_{Age} = 40.66$ years, $SD = 17.06$) assessed Moroccan immigrants (devalued target) and the ET (Ecuadorian Target) group ($n = 138$; 51.8% women; $M_{Age} = 38.57$ years, $SD = 17.29$) assessed Ecuadorian

immigrants (valued target). Participants were recruited using convenience sampling, to comply with a requirement that the sample should be representative of the population in terms of sex and cover a range of ages. The proportions of each group in the various age categories were as follows, 18-35 years: MT = 42%, ET = 42.3%; 36-55 years: MT = 35.9%, ET = 37.2%; 56 years or older: MT = 22.1%, ET = 20.4%. There was no difference between ET and MT in age, $t(266) = .99$, $p = .32$; or sex, $\chi^2(1) = .49$, $p = .49$.

Measures

Perceived intergroup similarity. An eight-item scale (Rojas, Sayans-Jiménez, & Navas, 2012) was used to investigate the similarity of the target groups (Moroccan or Ecuadorian immigrants) to the majority group (Spaniards) with respect to different life areas: political, social well-being (education, health and social services), work, economic, social, family, religion and values. Responses were given on a Likert scale ranging from 1 (*very different*) to 5 (*very similar*). Scores for each life area were averaged; higher values indicated greater perceived intergroup similarity. Reliability indices for the scale were adequate for both groups: $\alpha_{MT} = .81$; $\alpha_{ET} = .76$.

Quality of contact. Participants responded to a single question about how they thought their contact with Moroccan/Ecuadorian immigrants had been using a Likert scale ranging from 1 (*very unpleasant*) to 5 (*very pleasant*).

Interpersonal behavioural tendencies. We designed a scale (see Figure 1) to assess interpersonal behaviour on the basis of Cuddy et al.'s (2007) behavioural typology. Participants indicated their willingness to behave in certain ways towards a member of the target group using a Likert scale ranging from 1 (*not at all*) to 5 (*very much*). A previous 17-item version of the scale was used in an earlier study in which Ecuadorians ($n = 65$; 64.6% women; $M_{Age} = 34.46$ years, $SD = 11.27$) evaluated Romanians. Exploratory factor analysis and reliability analyses showed that the items adequately captured variability in the four types of behaviour explored. Owing to empirical and theoretical reasons, five items from the original scale were omitted in the version used in this study.

Procedure

The previous measures were included in a more extensive questionnaire that was administered by the

¹The original sample comprised 279 participants (around 80% general population, the remainder university students), but nine participants whose responses to some questionnaire items (those used to estimate AH) were extreme outliers (more than 4SD from the mean) were omitted from subsequent analyses.

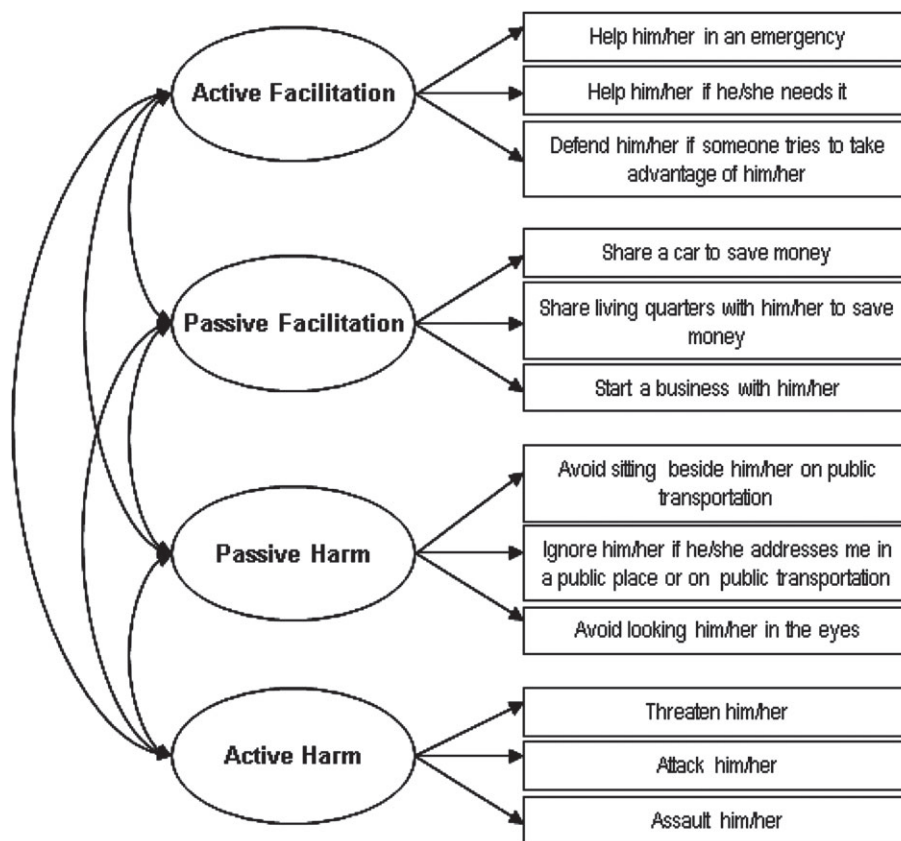


Figure 1. Hypothesised model of interpersonal behavioural tendencies with four latent factors.

investigators and trained assistants. Participants were asked to express their personal opinion “regarding different aspects of the immigrant population living in their area.” No financial compensation was offered. Following an intergroup design, participants responded to one of the two types of questionnaire (about Moroccan or Ecuadorian immigrants), which were identical, except for the immigrant target.

Results

Interpersonal behavioural tendencies

To test H1, we carried out confirmatory factor analysis (CFA) using the EQS 6.2 program.² We tested the configural equivalence of the model (Byrne, 2008) across both targets.³

As a preliminary to the assessment of the configural equivalence of the model, we carried out separate

analyses to establish well-fitting baseline models for both groups (see Figure 1). We defined a model including 12 behaviours, each loading on only one latent factor. The four latent factors—active facilitation (AF), passive facilitation (PF), passive harm (PH) and active harm (AH)—were allowed to covary.

The hypothesised four-factor model had an acceptable fit to the data: MT, S-B $\chi^2(48, 130) = 82.31, p = .002$; CFI = .923; SRMR = .065; RMSEA = .074; ET, S-B $\chi^2(48, 125) = 59.11, p = .13$; CFI = .960; SRMR = .073; RMSEA = .043. All items were significantly represented ($p < .001$) by their respective latent constructs in both groups. Once separate analyses had established a well-fitting baseline model for both groups they were combined and the multigroup model was tested. As we were interested in configural equivalence, no equality constraints were imposed. The multigroup model fit the data reasonably well, S-B $\chi^2(96, 255) = 138.18$,

²Because the data for both groups showed substantial multivariate kurtosis (Mardia’s normalised coefficients of 40.54 for MT group and 94.60 for ET group), we report the Satorra–Bentler scaled chi-square statistic, a correction for χ^2 when distributional assumptions are violated (Byrne, 2008). The following criteria were used as indications of good fit: SRMR (Standardised Root Mean square Residual; value ranges from 0 to 1.00) $< .08$ (Hu & Bentler, 1999); CFI (Comparative Fit Index; based on the S-B χ^2 statistic; value ranges from 0 to 1.00) $\geq .92$ (Byrne, 2008); and a robust version of RMSEA (Root Mean Square Error of Approximation) $< .08$ (RMSEA $\geq .08$ but $< .10$ indicates mediocre fit) (MacCallum, Browne, & Sugawara, 1996).

³Some participants (two in the MT group and 13 in the ET group) were omitted from these analyses due to missing data.

$p = .003$; CFI = .937; SRMR = .069; RMSEA = .059, thus confirming H_1 .

Reliability statistics (Cronbach's alpha) for the behavioural dimensions were adequate except in the case of PH in the MT group: AF ($\alpha_{MT} = .79$; $\alpha_{ET} = .67$), PF ($\alpha_{MT} = .83$; $\alpha_{ET} = .84$), PH ($\alpha_{MT} = .57$; $\alpha_{ET} = .70$) and AH ($\alpha_{MT} = .94$; $\alpha_{ET} = .98$). There were correlations between most types of behaviour in both groups (all $ps < .05$): AF and PF ($r_{MT} = .56$; $r_{ET} = .49$); PH and AH ($r_{MT} = .29$; $r_{ET} = .38$); AF and PH ($r_{MT} = -.60$; $r_{ET} = -.46$); AF and AH ($r_{MT} = -.22$; $r_{ET} = -.31$); PF and PH ($r_{MT} = -.43$; $r_{ET} = -.32$). PF was not correlated with AH.

A more parsimonious model with only two factors (facilitation and harm behaviour) proved a poor fit to the data for both MT group, S-B $\chi^2(53, 130) = 200.41$, $p < .001$; SRMR = .175; CFI = .669; RMSEA = .147; and ET group, S-B $\chi^2(53, 125) = 129.36$, $p < .001$; SRMR = .160; CFI = .723; RMSEA = .108. These results provide confirmation of the validity of the four-factor model based on the behavioural typology proposed by Cuddy et al. (2007).

Additional confirmation. To confirm the validity of the behavioural typology and their relationships to other variables, we carried out CFA on evaluations of Spaniards by a group of Moroccans ($n = 103$; 69.6% men; $M_{Age} = 31.19$ years, $SD = 11.69$). The four-factor model fit the data well: S-B $\chi^2(48, 103) = 66.15$, $p = .042$; CFI = .948; SRMR = .073; RMSEA = .063. Relationships between the four dimensions of behaviour and other psychosocial variables, such as perceived competition with the ingroup (e.g. special breaks, resource conflict, power trade-off; Fiske, Cuddy, Glick, & Xu, 2002) and quality of contact were in accordance with literature. AF and PF were negatively related to intergroup competition, $r = -.37$, and $r = -.30$, respectively, but positively related to quality of contact, $r = .57$ and $r = .58$, respectively. The opposite pattern of associations was observed for PH and AH, which were positively related to intergroup competition, $r = .36$, and $r = .30$, respectively; but negatively related to quality of contact, $r = -.32$, and $r = -.32$ (all $ps < .01$). These results indicate that these behavioural dimensions are theoretically coherent and generalise across evaluator and target groups.

Differences in attitudes to valued and devalued immigrant groups

A MANOVA⁴ with immigrant target as IV confirmed H_2 , as participants were more negatively disposed towards Moroccans than Ecuadorians. Participants perceived Moroccans as less similar to their ingroup

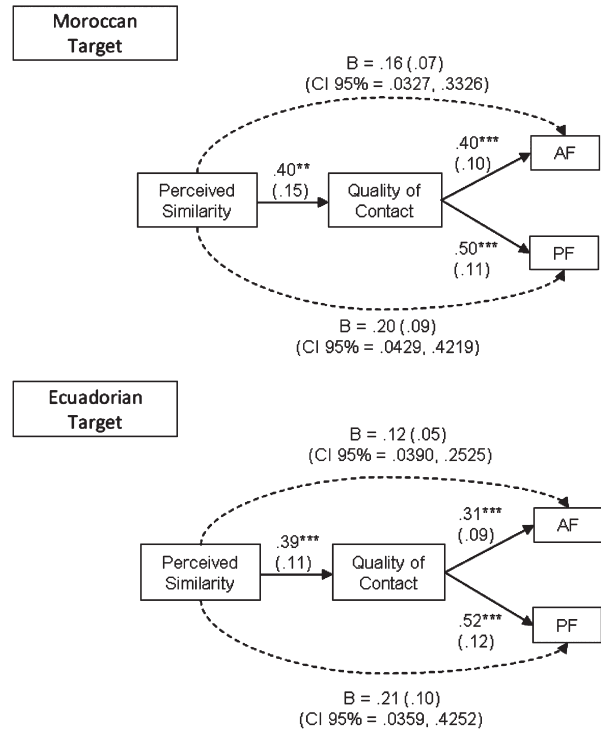


Figure 2. Simple mediations (Study 1). ** $p \leq .01$. *** $p \leq .001$.

($M = 1.81$, $SD = .49$) than Ecuadorians ($M = 2.65$, $SD = .60$), $F(1, 233) = 134.62$, $p < .001$, $\eta^2_p = .37$. They reported that contact with Moroccans was less pleasant ($M = 3.02$, $SD = .80$) than with Ecuadorians ($M = 3.32$, $SD = .74$), $F(1, 233) = 8.98$, $p = .003$, $\eta^2_p = .04$. They were also marginally less disposed to AF towards Moroccans ($M = 3.85$, $SD = .87$) than Ecuadorians ($M = 4.04$, $SD = .73$), $F(1, 233) = 3.55$, $p = .061$, $\eta^2_p = .02$, and were less disposed to PF towards Moroccans ($M = 2.26$, $SD = 1.11$) than Ecuadorians ($M = 2.70$, $SD = 1.08$), $F(1, 233) = 9.41$, $p = .002$, $\eta^2_p = .04$. Participants were also more disposed to PH towards Moroccans ($M = 1.61$, $SD = .72$) than Ecuadorians ($M = 1.41$, $SD = .67$), $F(1, 233) = 4.94$, $p = .027$, $\eta^2_p = .02$. There was no difference in the AH that the two target groups attracted, $F(1, 233) = 1.28$, $p = .26$.

Mediation analyses

In the next step, we assessed whether quality of contact (M) mediated the association between perceived similarity (X) and behaviour (Y). To do this, we tested several mediation models with the macro PROCESS using 5000 bootstrap samples (Hayes, 2013).

As shown in Figure 2, perceived similarity was positively related to the majority group's evaluation of quality of contact with Moroccans ($R^2 = .06$) and Ecuadorians

⁴Seven participants still had AH score more than 4SD from the mean in the AH dimension and were therefore omitted from these analyses.

TABLE 1
Model summary information for mediations (Study 1)

	Y_1 (AF)	Y_2 (PF)	Y_3 (PH)	Y_4 (AH)
MT				
<i>B</i>	.40*** (.10)	.50*** (.11)	-.40*** (.08)	-.04 (.02)
<i>c total effects</i>	.01 (.16)	.92*** (.19)	-.01 (.14)	.04 (.04)
<i>c' direct effects</i>	-.15 (.16)	.72*** (.18)	.16 (.13)	.05 (.04)
	$R^2 = .13$	$R^2 = .29$	$R^2 = .19$	$R^2 = .03$
ET				
<i>B</i>	.31** (.09)	.52*** (.12)	-.13 (.09)	.01 (.02)
<i>c total effects</i>	.20 (.11)	.68*** (.15)	-.35*** (.10)	-.02 (.02)
<i>c' direct effects</i>	.08 (.11)	.47** (.15)	-.30** (.11)	-.02 (.03)
	$R^2 = .11$	$R^2 = .25$	$R^2 = .11$	$R^2 = .01$

B = Effect of *M* (quality of contact) on *Y* controlling for *X* (perceived similarity).

** $p \leq .01$. *** $p \leq .001$.

($R^2 = .10$), confirming H_3 . In turn, quality of contact with immigrants was positively related to AF and PF towards them, confirming H_4 (see Figure 2 and Table 1). It was also confirmed that quality of contact mediated these associations (H_5). As can be seen in Figure 2, the indirect effects of perceived similarity on facilitative behaviour were positive and statistically significant (none of the bootstrap confidence intervals included zero).

Alternative mediation analyses revealed that there was no indirect effect of quality of contact (via similarity) on AF towards Moroccans or Ecuadorians. Although there was evidence of an indirect effect of quality of contact on PF, this was weaker than the previous mediation effect in the case of both target groups: Moroccans, $B = .11$ (.06), CI 95% = .0158, .2637; Ecuadorians, $B = .12$ (.05), CI 95% = .0435, .2646.

The pattern of associations relevant to harmful behaviours differed according to the target. No indirect effects of perceived similarity through quality of contact were found on AH towards Moroccans, $B = -.02$ (.02), CI 95% = -.0679, .0041 or Ecuadorians, $B = .01$ (.01), CI 95% = -.0023, .0258. These findings are probably due to a floor effect (very low AH scores with respect to both target groups). There were, however, important differences with respect to PH. In the case of the MT group, perceived intergroup similarity was indirectly and negatively related to PH through quality of contact, $B = -.16$ (.07), CI 95% = -.3127, -.0285, whilst there was no indirect effect of quality of contact through similarity on PH. Exactly, the opposite pattern was observed in the case of the ET group: there was no indirect effect of perceived similarity (via quality of contact) on PH, $B = -.05$ (.04), CI 95% = -.1626, .0044, but there was an indirect effect of quality of contact (via perceived similarity) on PH, $B = -.08$ (.04), CI 95% = -.1945, -.0186.

To summarise, Study 1 validated the behavioural typology underlying the new behavioural tendencies

scale (H_1) and demonstrated that the devalued target was evaluated more negatively than the valued target (H_2). It also provided support for the hypothesis that greater perceived intergroup similarity is associated with better quality of contact with minority groups (H_3) which, in turn, is associated with higher pro-social behaviour towards them (H_4). It also confirmed that these relationships were mediated by quality of contact (H_5).

In order to consolidate these findings, we aim at replicating the mediation effect with a different outgroup and exploring the mediation role of symbolic threat in this process.

STUDY 2

After confirming that perceived similarity had an indirect effect on behaviour via its influence on quality of contact, we investigated the role of symbolic threat in this process. ITT posits that perceived intergroup differences represent a symbolic threat and may therefore have a detrimental effect on intergroup attitudes. We tested a serial multiple mediator model with two mediators (symbolic threat, M_1 ; quality of contact, M_2).

Method

Participants

A sample of 134 Spanish people (50% women; $M_{Age} = 39.48$ years, $SD = 17.50$) assessed Romanian immigrants, the most sizeable immigrant group in Spain.

Measures

Perceived similarity ($\alpha = .87$), quality of contact and behavioural tendencies (AF, $\alpha = .77$; PF, $\alpha = .82$; PH, $\alpha = .65$; AH, $\alpha = .93$) were measured as in Study 1.

Symbolic threat was measured using four-item scale (Navas et al., 2012). Participants were asked to what extent they feel that the educational values, family values, religious beliefs and traditions of Spanish culture were threatened by those of the target group, that is Romanian immigrants ($\alpha = .88$). Responses were given on a Likert scale ranging from 1 (*not at all*) to 5 (*very much*).

Results

We tested a serial multiple mediator model with two mediators using PROCESS. We modelled a process in which perceived similarity (X) affected symbolic threat (M_1), which in turn affected quality of contact (M_2) with

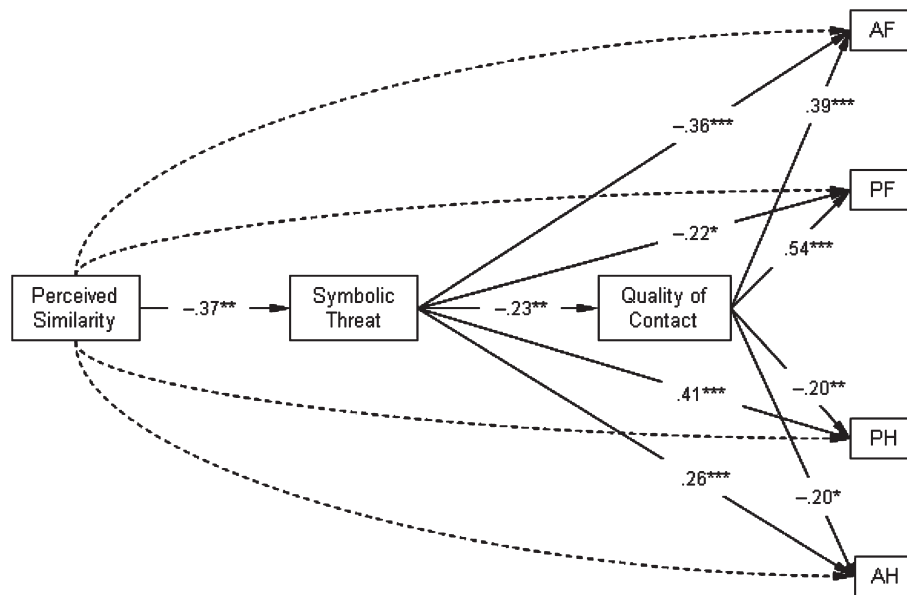


Figure 3. Serial mediation (Study 2). * $p \leq .05$. ** $p \leq .01$. *** $p \leq .001$.

behaviours (Y_1, Y_2, Y_3, Y_4) as the outcome variables⁵ (see Figure 3).

Perceived similarity of Romanians to the ingroup was negatively associated with symbolic threat and positively associated with quality of contact. In addition, symbolic threat was negatively associated with quality of contact.

Several indirect effects were identified. First, there was an indirect effect of perceived similarity on behaviour through symbolic threat ($X \rightarrow M_1 \rightarrow Y; a_1b_1$) for all types of behaviour (none of the bootstrap confidence intervals included zero): AF, $B = .13$ (.06), CI 95% = .0413, .2669; PF, $B = .08$ (.05), CI 95% = .0116, .2054; PH, $B = -.15$ (.06), CI 95% = $-.2837, -.0384$; AH, $B = -.09$ (.05), CI 95% = $-.2345, -.0190$.

Replicating the findings in Study 1, there was an indirect effect of perceived similarity on behaviour through quality of contact ($X \rightarrow M_2 \rightarrow Y; a_2b_2$): AF, $B = .14$ (.05), CI 95% = .0634, .2679; PF, $B = .20$ (.06), CI 95% = .0940, .3541; PH, $B = -.07$ (.03), CI 95% = $-.1559, -.0187$; AH, $B = -.07$ (.04), CI 95% = $-.2030, -.0153$.

We also assessed a third indirect effect (H_6), that of perceived similarity on behaviour through symbolic threat and then quality of contact with symbolic threat affecting quality of contact, which then influences behaviour (i.e. $X \rightarrow M_1 \rightarrow M_2 \rightarrow Y; a_1d_{21}b_2$). There were indirect effects via the sequence of two mediators for all types of behaviour: AF, $B = .03$ (.02), CI 95% = .0062, .0884; PF, $B = .04$ (.03), CI 95% = .0094, .1203; PH, $B = -.02$ (.01), CI 95% = $-.0491, -.0025$; AH, $B = -.02$ (.01), CI 95% = $-.0617, -.0023$. These indirect effects indicated that greater perceived similarity was associated with

lower symbolic threat (a_1), which in turn was associated with a better quality of contact (d_{21}); finally, the better quality of contact was associated with higher facilitative behaviour and lower harmful behaviour (b_2 was positive when predicting facilitation and negative when predicting harm, see Table 2).

GENERAL DISCUSSION

The aim of this research was to analyse the interpersonal behavioural tendencies of the majority group towards immigrants, by investigating relationships involving psychosocial variables such as intergroup similarity and quality of intergroup contact.

To achieve these goals, we developed a new interpersonal behavioural tendencies scale. Multigroup CFA (Study 1) validated the behavioural typology (i.e. AF, PF, PH and AH) proposed by Cuddy et al. (2007). A more parsimonious model (two factors: facilitation and harm) proved a poor fit with the data. These findings confirmed the utility of differentiating between the intensity (active; passive) and valence (facilitative; harmful) of interpersonal behaviours directed at minority groups. The four-factor model was shown to hold across different immigrant targets. Additional confirmation was also obtained using a minority group as evaluator. This new interpersonal behavioural scale, which describes relevant behaviours from the respondent's perspective, may prove to be useful in future research. Stereotypes towards immigrants have already been measured with various instruments, but there is no standard, generally recognised instrument for evaluating interpersonal willingness to behave in specific ways towards members of an outgroup.

⁵Some cases were deleted due to missing data.

TABLE 2
Model Summary Information for the Serial Mediation (Study 2)

		M_1		M_2		Y_1 (AF)	Y_2 (PF)	Y_3 (PH)	Y_4 (AH)	
X (PS)	a_1	-.37** (.12)		a_2	.37*** (.10)	c'	-.08 (.11)	.08 (.13)	.01 (.08)	.07 (.09)
M_1 (ST)		—	d_{21}	-.23** (.07)	b_1	-.36*** (.08)	-.22* (.09)	.41*** (.06)	.26*** (.07)	
M_2 (QC)		—		—	b_2	.39*** (.10)	.54*** (.11)	-.20** (.07)	-.20* (.08)	
Constant	i_{M1}	3.05***	i_{M2}	2.64***	i_Y	3.64***	1.04*	1.34***	1.20**	
		$R^2 = .07$		$R^2 = .22$		$R^2 = .30$	$R^2 = .29$	$R^2 = .40$	$R^2 = .20$	

PS = perceived similarity; ST = symbolic threat; QC = quality of contact.
* $p \leq .05$. ** $p \leq .01$. *** $p \leq .001$.

The interpersonal behavioural tendencies scale represents an attempt to address this gap. Even if such scale makes salient intergroup belonging, Cuddy et al. (2007) theoretically establishes a difference between interpersonal, intergroup and institutional levels. People might be more willing to help and more reluctant to harm when thinking about a person versus a group.

Study 1 also revealed that participants were less disposed to AF and PF, and more disposed to PH with respect to Moroccans than Ecuadorians. Majority members also perceived themselves to be less similar to Moroccans and reported that contact with them was less pleasant. These results confirm our predictions and are consistent with previous research showing that different ethnic groups are evaluated differently by the majority group (e.g. Hagendoorn, 1993). It was not surprising that participants reported a less facilitative tendency towards Moroccans, because they have a more negative stereotype of these immigrants (López-Rodríguez et al., 2013) and feel they pose a more realistic and symbolic threat than other immigrant groups (Navas et al., 2012).

Perceived similarity is an especially important determinant of intergroup relations and improving quality of contact is an effective method of reducing prejudice; this was reflected in a mediation model which confirmed that quality of contact mediated the relationship between perceived intergroup similarity and AF and PF towards immigrants. Perception of intergroup similarity was positively associated with quality of intergroup contact, which was positively associated with pro-social behaviour towards minority groups. This finding applied to both immigrant targets.

In this study, perceived similarity was positively associated with intergroup relations, in line with the similarity-attraction hypothesis (Grant, 1993). Perceived similarity was indirectly and positively associated with AF and PF. In summary, as some authors (Allport, 1954; Stephan et al., 2005) have recognised, perceiving greater similarity between oneself and the members of an outgroup may lead to more pro-social behaviour through—in this case—an effect on the quality of one's contacts with members of that group.

It is worth noting that quality of contact is a subjective variable and that assessments of this variable may be

biased. As Binder et al. (2009) asserted, contact can reduce prejudice, but prejudice may also reduce contact. Our findings confirmed that perceived similarity to an outgroup is related to the perceived quality of contact with that outgroup which was, in turn, positively associated with facilitative behaviour towards the outgroup.

The pattern of associations was, however, less clear in the case of harmful behaviour. There was little variability in AH scores in Study 1. Participants rating both outgroups had very low scores for AH; we can infer from this that current social norms relating to the expression of prejudice mean that people are reluctant to behave in an overtly negative way (e.g. make explicit threats) towards a member of an outgroup, even a devalued outgroup. Expression of prejudice and hostility tends to be more subtle and covert (e.g. Pettigrew & Meertens, 1995). The AH dimension was more useful in Study 2, and when Moroccan immigrants evaluated Spaniards. This suggests that AH is especially sensitive to population and context variables, but this does not invalidate the dimension.

Associations involving PH varied according to the immigrant group being assessed. Where the target was devalued perceived intergroup similarity was indirectly and negatively related to PH through quality of contact; however, when the target was valued perceived similarity mediated the effect of quality of contact on PH.

In conclusion, interpersonal facilitative behaviours towards different immigrant groups can be explained by the same processes: they appear to be independent of the valuation of the outgroup. However, the processes underlying PH appear to vary according to the target assessed. One explanation for this is that PH directed against a member of a devalued outgroup depends firstly on a perception of difference, and contact with members of the group is perceived as unpleasant because of this perceived dissimilarity; avoidance is the result of a negative evaluation of contact with the group. In contrast, PH directed against a member of a valued outgroup depends first on unpleasant experience of contact with the group, such experiences lead to a perception of dissimilarity which, in turn, elicits avoidance behaviours. In other words, negative attitudes towards members of valued groups may be based on first-hand experiences (e.g. unpleasant contact), whereas negative attitudes towards devalued

groups may be based on cognitive predispositions (e.g. a perception of dissimilarity). More research is needed to understand the processes underlying harmful behaviour, and uncover new variables which can explain harmful behaviour towards members of different outgroups.

Study 2 confirmed, with respect to a different target group, that quality of contact mediates the relationship between perceived similarity and behaviour and also confirmed a sequence of mediation in which symbolic threat affects quality of contact. From these findings, we might infer that reducing perceived dissimilarity to immigrants would decrease the perceived symbolic threat they pose, leading to better perceptions of quality of contact with them and hence to more pro-social behaviour towards them.

Causal relations between these variables cannot be inferred, so future experimental studies testing such relations are highly recommended to consolidate these findings.

We can draw one conclusion from these results: social interventions should seek to emphasise the similarities between groups, rather than the differences, by increasing the salience of shared values, beliefs and experiences.

Manuscript received January 2015

Revised manuscript accepted August 2015

First published online September 2015

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