

Are Inter-Minority Contacts Guided by the Same Mechanisms as Minority– Majority Contacts? A Comparative Study of Two Types of Inter-Ethnic Ties in the Netherlands

Judith Koops Netherlands Interdisciplinary Demographic Institute (NIDI)

Borja Martinovic Utrecht University

Jeroen Weesie Utrecht University

> Research on inter-ethnic contacts in European countries has mainly focused on the interaction between ethnic minorities and the native majority. Our contribution is to examine inter-minority contacts and compare them to minority-majority contacts. Drawing on a theory of preferences, opportunities, and third parties, we expected some determinants of contacts with natives to relate similarly and others differently to inter-minority contacts. Using data on four non-Western minorities in the Netherlands, we found that education, Dutch language proficiency, and outgroup size are positively associated with both inter-minority and minority-majority contacts. Further, occupational status relates positively to contacts with natives and negatively to contacts with other minorities, whereas ingroup identification is positively associated with inter-minority contacts and negatively with contacts with natives. These diverging findings underline the importance of studying interaction between minorities as a separate phenomenon.

INTRODUCTION

Inter-ethnic contacts are an important indicator of cohesion in multiethnic societies. Studies have shown that contacts between ethnic groups can

@ 2016 by the Center for Migration Studies of New York. All rights reserved. DOI: 10.1111/imre.12247

reduce prejudice and improve intergroup relations (Pettigrew and Tropp 2006; Brown et al. 2007; Al Ramiah and Hewstone 2013). In Western European countries, most of the attention has been paid to the amount of contact minority members¹ have with the members of the dominant native group, which is often seen as an important aspect of the social integration of these minorities (e.g., Esser 1986; Vervoort and Dagevos 2011), and even a possible pathway to economic prosperity (Lancee 2010; Kanas et al. 2012). Other scholars take a broad approach by studying inter-ethnic contacts of people from different racial and ethnic backgrounds, without differentiating between contact with the dominant group (whites) and other racial groups (e.g., Muttarak 2014).

However, the percentage of minorities in Western European cities can be substantial and many neighborhoods consist of minorities with different (predominantly non-Western) ethnic backgrounds (Musterd 2005). Therefore, social cohesion in European societies depends not only on how well minority and majority members get along, but also on the interaction between different minority groups (Hindriks, Verkuyten, and Coenders 2014). Yet, research on inter-minority contacts is scarce and the existing studies have mainly been conducted in North America, and particularly in the school environment (e.g., Quillian and Campbell 2003; Kao and Joyner 2004; Kobayashi 2006; Mouw and Entwisle 2006). There are only two European studies that have made a first step toward understanding differences in inter-minority contacts. One of them investigated the role of attitudes, such as ingroup favoritism and acculturation preferences, in Germany (Brüß 2005), whereas the other one focused specifically on the role of context as captured by the ethnic composition of neighborhoods in the Netherlands (Vervoort, Flap, and Dagevos 2011).

In the current study, we examine contacts in leisure time between adults of non-Western background in the Netherlands. Our first aim is to explain differences in inter-minority contacts more systematically by combining individual-level and contextual-level determinants. Vervoort, Flap, and Dagevos (2011) only theorized about the influence of the ethnic composition of the neighborhood on the contact ethnic minorities have with other ethnic minorities. Our study thus builds on their findings by theorizing and hypothesizing about the role of individual characteristics, while also taking into account the importance of the ethnic composition of the locality. In this way

¹The term "minorities" refers in this paper to people belonging to non-Western ethnic groups living in the Netherlands. "Majority" and "natives" stand for ethnic Dutch.

we can identify additional predictors of inter-minority contacts, thereby providing a more comprehensive understanding of why some minority members have more inter-minority contacts than others. We will derive our hypotheses from the theory of preferences, opportunities, and third parties (Kalmijn 1998) that has been extensively used in similar studies on minorities' contacts with the majority (e.g., Martinovic, van Tubergen, and Maas 2009; 2011; Vervoort 2012). By including opportunities and the restriction by third parties, we extend the study of Brüß (2005) that only zoomed in on preferences.

Second, our study has a comparative aim, as we will examine similarities and differences between the determinants of inter-minority contacts and contacts with the majority. While we argue that preferences, opportunities, and third parties are the mechanisms that also underlie inter-minority contacts, we will show that these mechanisms can sometimes produce contrasting predictions for the two types of inter-ethnic contacts in question. It should be noted, however, that these contrasting predictions are based on theorizing about contacts between, on the one hand, two non-Western minorities and, on the other hand, a non-Western minority and a Western native majority. Such contrasting predictions would not necessarily apply if the minorities in question were, for instance, Western Europeans or Americans of European descent, and thus economically and culturally more similar to natives.

Data from a Dutch survey titled Life Situation of Urban Ethnic Minorities (LAS) will be used to test the hypotheses. This dataset contains information on people belonging to the four biggest non-Western ethnic minorities — Turks, Moroccans, Surinamese, and Antilleans — living in 50 municipalities in the Netherlands. People belonging to these groups tend to have a lower socioeconomic position than the dominant Dutch group (Huijnk, Mérove, and Dagevos 2014). Furthermore, they usually find themselves in a more difficult economic situation than, for instance, German, British, or American immigrants, as indicated by higher unemployment rates (Van Tubergen, Maas, and Flap 2004) and lower occupational status (Van Tubergen 2006).

THEORY OF PREFERENCES, OPPORTUNITIES AND THIRD PARTIES

The theory of preferences, opportunities, and third parties (Kalmijn 1998) assumes that social contacts can be explained by three different mechanisms:

the *preference* for a certain other, the *opportunity* to meet someone, and the approval or disapproval by relevant *third parties*.

People are believed to interact mostly with those whom they like the best (McPherson, Smith-Lovin, and Cook 2001), and these preferred others are often individuals who are similar to them in terms of origin, customs, and values, because cultural similarity creates mutual understanding (Kalmijn 1998; Smith, McPherson, and Smith-Lovin 2014). Preference for a specific type of friends and acquaintances, however, has to be paired with the opportunity to meet these preferred individuals (Blau 1977). The daily environment thus shapes one's opportunities for co-ethnic and inter-ethnic interaction. The size of the ethnic groups in the area where one lives (Semyonov and Glikman 2009) and the percentage of ingroup and outgroup members on the work floor (Roth et al. 2012) are examples of characteristics influencing people's opportunity for social interactions with preferred others. In addition, relevant third parties (e.g., family or ethnic community) can play a role in the formation of inter-ethnic contacts (Munniksma et al. 2012; Carol 2014). Third parties are believed to exert their influence in two ways: by sanctioning undesirable behavior if they disapprove of inter-ethnic contacts, and by spreading group norms which ingroup members can internalize (Kalmijn 1998). Third parties can thus either limit one's opportunity for inter-ethnic contacts through sanctions or shape one's preferences through the processes of identification.

Using a combination of arguments about preferences, opportunities, and third parties, we hypothesize about several individual and contextual characteristics that might explain differences in inter-minority contacts. These characteristics — outgroup size in the area, occupational status, educational level, and destination-language proficiency — have already been identified as relevant determinants of minorities' contacts with the majority, not only in cross-sectional studies (Vervoort 2012; Martinovic 2013) but also longitudinally (Martinovic, van Tubergen, and Maas 2009, 2011). We will thus use contacts with the majority as a reference against which we will hypothesize about the differential (or similar) role of these individual and contextual determinants in the formation of inter-minority contacts. In addition, to capture the role of the third parties better we will include ingroup identification — which has been overlooked in previous studies — as an additional potentially relevant determinant of both types of inter-ethnic contacts.

HYPOTHESES

Outgroup Size

People often have (casual) social interactions in the area where they live. The ethnic composition of the neighborhood or town provides residents with the *opportunity* to meet others of specific ethnic backgrounds (Blau 1977). If the outgroup size in the neighborhood or town is large, one has much opportunity to establish inter-ethnic contacts. Research has shown that the percentage of native Dutch in the area is positively related to the amount of contact minority members have with the Dutch majority (Martinovic, van Tubergen, and Maas 2009; Vervoort 2012). Following the same theoretical argument, the size of other minorities might be an important determinant of inter-minority contacts. The only study that looked at this (Vervoort, Flap, and Dagevos 2011) did not find a positive association between percentage of non-Western minorities and inter-minority contact, but they used a measure that confounded co-ethnics with other non-Westerners by focusing on non-Western minorities as a whole. In fact, in a subsequent analysis they showed that the relative size of the ingroup even related negatively to inter-minority contacts. Therefore, we use a measure of percentage of non-Western minorities in which the ingroup has been left out, and hypothesize that a higher percentage of members of other minorities in the living area is associated with more contacts with these minorities $(H1_{min})$.² We expect this relationship to be similar in strength to the one between percentage of natives and contacts with natives (H1_{comp}).

Occupational Status

The work floor is another potential platform for interactions. Research has shown that an ethnically diverse workplace increases the chance of having inter-ethnic friendships and contacts outside the work environment (Kokkonen, Esaiasson, and Gilljam 2015; Martinovic, van Tubergen, and Maas 2015). This can be explained by the similarity between conditions in the workplace and characteristics deemed important for inter-ethnic contact, such as intimacy, having common goals, and receiving support

²Hypotheses with a subscript $_{min}$ refer to inter-minority contacts, with a subscript $_{maj}$ to contacts with majority, and with a subscript $_{comp}$ to the comparison between the determinants of inter-minority and minority-majority contacts.

from institutions (Allport 1954; Kokkonen, Esaiasson, and Gilljam 2015). Therefore, a diverse work floor is a very suitable context for meeting people with other ethnic backgrounds, which then spills over into having more inter-ethnic ties in one's free time.

In the Netherlands, Dutch natives in general occupy higher-level jobs than minorities (Huijnk, Mérove, and Dagevos 2014). It has therefore been argued that minority members with a higher occupational status have more *opportunities* to meet natives. Research on minority–majority contacts has accordingly shown that minority members in higher occupational positions indeed have more contacts with the Dutch majority group (Martinovic 2013). From this reasoning about meeting opportunities, it follows that in the Netherlands there are also fewer people from other non-Western minorities occupying high-level positions, so the opportunity to meet them is lower for minority members with a high occupational status. We hypothesize that the higher the occupational status of minority members, the fewer contacts they have with members of other minority groups (H2_{min}). Occupational status is thus expected to be positively related to contacts with the majority but negatively to contacts with other minorities (H2_{comp}).

Educational Level

Education also matters for inter-ethnic contacts, and possibly for two reasons. First, educational level is believed to influence an individual's *preference* for inter-ethnic contacts. Higher educated people attribute less importance to ascribed categories, such as ethnicity, when choosing their friends, and are more open to establishing inter-ethnic ties (Kalmijn 1998). This should hold equally for contacts with natives and with other minorities. Secondly, educational level might influence the *opportunity* to get in contact with outgroup members. In the Netherlands, majority members are more represented in higher educational levels (Gijsberts and Dagevos 2009). Therefore, higher compared to lower educated minority members have had more opportunities to meet the Dutch, but fewer opportunities to meet people from other minority groups.

Martinovic, van Tubergen, and Maas (2009, 2015) found that a higher degree of education of minority members was related to more contacts with the majority, and this is in line with both the preference and opportunity arguments. However, for inter-minority contacts, preferences and opportunities seem to work in opposite directions, and depending on which mechanism is stronger, two hypotheses can be formulated. If the preference mechanism is more important, higher educated minority members are expected to have *more* contacts with members of other minority groups (H3a_{min}), and if the opportunity mechanism prevails, they should have *fewer* inter-minority contacts (H3b_{min}). While opportunity for interminority contacts might be lower at higher levels of education, individuals who have not followed any education in the host country have, irrespective of their level of education, had no opportunity at all to establish contacts during school with other minorities that live in the host country. This means that the negative association between educational level and inter-minority contacts can potentially only be found for people who have obtained some education in the host country. We will take this into account in our analysis.

Thus, for contacts with natives a positive relation can be expected with educational level based on both mechanisms, and for inter-minority contacts the two mechanisms produce contrasting predictions. Assuming that preferences and opportunities play an equal role in determining the two kinds of inter-ethnic contacts, we expect educational level to be more positively associated with contacts with majority than with inter-minority contacts (H3_{comp}).

Dutch Language Proficiency

The possibility to communicate effectively with each other is a prerequisite for social interaction. Therefore, for ethnic minorities proficiency in the language of the host nation creates the *opportunity* to socially interact with the majority. Studies have repeatedly shown that destination-language proficiency is an important predictor of minorities' contacts with the native majority (Martinovic, van Tubergen, and Maas 2009; 2011; Vervoort 2012). Building on this, we argue that Dutch language proficiency also increases the opportunity for inter-minority contacts. Minority groups living in the Netherlands do not share the same language and have to rely on a common second language to communicate with each other. Although in general people in the Netherlands tend to speak English well (Special Eurobarometer 2006), this is usually not the language of choice for minority members as they are often lower educated and occupy lower occupational functions for which English proficiency is not required. Research focusing the use of street language, which is highly popular among minority youth living in the big cities in the west of the Netherlands, shows that although the users often borrow words from English and minority languages, the base of the language is Dutch (Schoonen and Appel 2005; Nortier and Dorleijn 2008). We therefore expect that the higher the Dutch language proficiency of minority members, the more inter-minority contacts they will have $(H4_{min})$.

While destination-language proficiency probably matters for both types of inter-ethnic contacts, it might be more important in predicting minority-majority contacts than inter-minority contacts. This is because destination-language proficiency might be related to minorities' *preference* for inter-ethnic contacts. Language is part of a culture, and learning the language of the host nation might decrease the cultural distance with the native population (Kalmijn and van Tubergen 2006). However, it is less likely that the Dutch language will bring one equally close to the cultural background of other minority groups in the Netherlands. Therefore, we expect the positive association between language and inter-ethnic contacts to be stronger for minority-majority contacts than for inter-minority contacts (H4_{comp}).

Ingroup Identification

To protect the traditions, values and belief systems of the ethnic group, and thereby safeguard its internal cohesion and homogeneity, the ethnic community can discourage contacts with cultural others (Kalmijn 1998; Kreager 2008; Munniksma et al. 2012). It is however likely that not all minority members are equally sensitive to the norms of this *third party*. Individuals belonging to the ethnic community but not identifying with it might not be influenced by potential discouragements and sanctions and are less likely to internalize the norms of the ingroup. In contrast, individuals who identify strongly with and give great importance to their ethnic community are likely to avoid inter-ethnic contacts, partly because they have internalized their ingroup's norms, and partly because they would not want to jeopardize their relationships with co-ethnics. The role of ingroup identification has been overlooked in previous research on both types of inter-ethnic contacts studied here. On the basis of theoretical arguments, we hypothesize that ingroup identification is negatively related to both inter-minority contacts (H5min) and contacts with the majority (H5_{mai}). However, as the highly liberal and secular Dutch culture is probably more distant in terms of certain values and norms than other non-Western cultures, co-ethnics might discourage their ingroup members'

contacts with the Dutch more than with other non-Western minorities. Thus, ingroup identification is expected to be more strongly negatively related to contacts with natives than to contacts with other non-Western minorities ($H5_{comp}$).

DATA AND METHOD

Sample

The hypotheses will be tested using the Life Situation of Urban Ethnic Minorities (LAS) dataset. These data were collected by the Netherlands Institute for Social Research (SCP) in 2004/2005 among participants of Dutch, Turkish, Moroccan, Antillean, and Surinamese backgrounds, aged 15-65. As the survey was distributed in the 50 biggest municipalities in the Netherlands, smaller towns and villages were not included, so the data are primarily representative of the urban population. Stratified sampling (random sampling per ethnic group) was used to select participants. Interviewers collected the data by questioning the participants in their homes, while they were assisted by a computer. This approach is also known as a computer-assisted personal interview (CAPI). For this paper, only the information on minority participants³ was analyzed. In total 3,454 non-Western subjects took part in the survey. Due to missing values for occupational status, education, and ingroup identification (less than 2.5% each), the sample size used in our study is 3,273 (868 Moroccans, 917 Turks, 778 Antilleans, and 710 Surinamese). The response rate ranged from 38 percent for Surinamese to 51 percent for Turkish participants, but these relatively low rates are common for research conducted in the Netherlands (Stoop 2005). Not wanting to participate and not being at home were the most important reasons for nonresponse. Next to Dutch language, the questionnaire was also available in Turkish and Arabic so that Turkish and Moroccan participants who did not speak Dutch well could be included in the study. According to the Yearly Integration Report (Dagevos and Gijsberts 2007), 23 percent of Turks and 15 percent of Moroccans report having problems with spoken Dutch. As the same applies to only 1 and 3 percent of Surinamese and Antilleans, it was not necessary to provide questionnaires in other languages for these two groups.

³Participants were considered to be ethnic minority members if they were born outside of the Netherlands or if they were born in the Netherlands and at least one of their parents was born in Turkey, Morocco, Suriname, or the Dutch Antilles.

Measurement

The dependent variables *inter-minority contacts* and *minority-majority contacts* were measured with two similar questions: how often participants interact in their free time with people belonging to other minority groups⁴ and how often they interact with native Dutch. The response categories were: never, sometimes, and often.

Percentage of non-Western minorities and percentage of majority members in the municipality in 2004 were obtained from Statistics Netherlands (CBS 2012). The former will be used as a contextual-level predictor in the model for inter-minority contacts and the latter for minority-majority contacts. Note that the former variable was computed by excluding the ingroup. For instance, for Turks in Amsterdam, the percentage of minorities referred to Moroccans, Surinamese, and Antilleans in Amsterdam. The values thus differed for the four ethnic groups within a municipality. This means that there were fewer higher-level units in the model for minority-majority contacts $(N = 48)^5$ than in the model for inter-minority contact (N = 126, as for most municipalities we have dataon more than one but not necessarily all four groups).⁶

As to the individual-level predictors, *occupational status* was a categorical variable differentiating between elementary, low, middle, and high status. Unemployed people form a separate category, and those who are for another reason not working (e.g., students, housewives) fall into category "other."

Educational level was measured by the highest completed degree. If the participants were still enrolled at the moment of the data collection,

⁴The question about inter-minority contacts referred to contacts with "allochtone" Dutch. While "allochtoon" stands for non-ethnic Dutch and formally includes people from other Western countries, in the public discourse this term is usually used to indicate non-Western minorities. Importantly, the question on inter-minority contacts only referred to contact with minorities with other ethnic backgrounds than one's own. For example, for a respondent with a Turkish background the question was asked as follows: "So far we have talked about Turkish and (white) Dutch friends and acquaintances. Next to this, do you also hang out with people from other 'allochtone' groups in your free time, such as Moroccans, Antilleans, and Surinamese?"

⁵While the total number of sampled municipalities was 50, minority participants were sampled in 48 of these municipalities.

⁶This is not problematic for model estimation in a technical sense. However, due to a wider distribution of higher-level units for inter-minority contacts, the association with outgroup size might be detected more easily than that for contacts with natives.

the level of their current education was taken. In this way a continuous variable was created ranging from 0 (no education) to 7 (university level). Furthermore, *education in the host country* was included to distinguish between participants who only got educated abroad (0) and those who obtained at least some education in the Netherlands (1).

Dutch language skills were measured by taking together the questions "While reading papers, letters or advertisements, do you encounter (1) often, (2) sometimes, or (3) never difficulties with reading the Dutch language?" and "When having a conversation in Dutch, do you have (1) often, (2) sometimes, or (3) never difficulty with the Dutch language?" (Cronbach's alpha = 0.83). The combined variable based on a sum score ranged from two to six. Participants who scored 6, indicating they never encountered problems while reading and having a conversation in Dutch, were taken together in the category "never having language problems." Those who scored 2 or 3 were categorized as "often having language problems" and the rest was assigned to the category "sometimes having language problems."

Ingroup identification was measured with a question about whether one identified more with the ethnic ingroup or with the Dutch. The answer scale, which included the following answer options: 1 (totally own group), 2 (mostly own group), 3 (equally own group and Dutch), 4 (mostly Dutch) and 5 (totally Dutch), was reversed and ranged from 0 to 4, to give a meaning to the zero. The variable was normally distributed and was used as a continuous predictor.

We controlled for *age*, *gender* (0 = male, 1 = female), *ethnicity* (categorical) and *migration generation* (0 = first, 1 = second). An overview of the descriptive statistics can be found in Table 1.

Analytic Strategy

As the dependent variables are measured on an ordinal scale, we fitted *multilevel multivariate ordinal probit* models in Mplus (version 7). To be able to compare effects across the two ordinal dependent variables, which is crucial for testing our comparative hypotheses, we consider effects at the latent level associated with the observed dependent variables. Such a comparison is only meaningful if the underlying scales of the two latent responses are the same. The "standardized residuals" parametrization of such models in Mplus (as well as other software, e.g., Stata) does not allow for a simple comparison of coefficients across outcomes (see Allison

	Proportion	Mean	SD	Range
Dependent variables				
Inter-minority contacts				
Never	0.50			0/1
Sometimes	0.32			0/1
Often	0.18			0/1
Minority-majority contacts				
Never	0.23			0/1
Sometimes	0.35			0/1
Often	0.42			0/1
Independent variables				
% Of non-Western minorities ^a		12.07	6.29	3.61-32.67
% Of majority members		75.87	7.12	51.72-86.08
Occupational status				
Elementary	0.09			0/1
Low	0.17			0/1
Middle	0.14			0/1
High	0.06			0/1
Unemployed	0.13			0/1
Other	0.41			0/1
Educational level		2.97	2.02	0-7
Education in the host country	0.65			0/1
Dutch language skills				
Often problems	0.15			0/1
Sometimes problems	0.27			0/1
Never problems	0.58			0/1
Ingroup identification		2.24	1.10	0-4
Control variables				
Ethnicity				
Moroccan	0.26			0/1
Turkish	0.28			0/1
Antillean	0.24			0/1
Surinamese	0.22			0/1
Second generation migrant	0.23			0/1
Female	0.54			0/1
Age		34.88	12.87	15-65

TABLE 1PROPORTION, MEAN, STANDARD DEVIATION (SD) AND RANGE OF THE DEPENDENT, INDEPENDENT, AND
CONTROL VARIABLES (N = 3,273)

Note: ^aFor Moroccans the mean (SD) = 11.59 (6.14), for Turks = 10.65 (6.51), for Antilleans = 13.58 (6.76), and for Surinamese = 12.57 (5.32).

1999 for a related discussion). As the two dependent variables are measured by very similar questions using common answering categories, we assumed *measurement invariance* of the latent response variables, and hence equality of the measurement thresholds. Then, the differences in the means, the ratio of the standard deviations of the regression residuals, and the difference in the regression coefficients across responses are statistically identified, and can be compared. Note that with three-category ordinal variables, and hence two cross-outcome constraints on the thresh-

	Inter-minority contacts (%)			Minority-majority contacts (%)		
	Never	Sometimes	Often	Never	Sometimes	Often
Moroccans	50.1	32.0	17.9	27.8	39.2	33.1
Turks	58.1	31.6	10.3	30.2	42.5	27.3
Antilleans	41.6	32.9	25.5	14.1	29.6	56.3
Surinamese	46.9	34.4	18.7	15.5	27.9	56.6

TABLE 2FREQUENCY OF INTER-MINORITY AND MINORITY-MAJORITY CONTACTS PER ETHNIC GROUP (N = 3,273)

olds, the assumption of measurement invariance is not testable; the model is "just identified." If our response variables had had more than 3 categories, we would have been able to test for measurement invariance. Indeed, for some models, Mplus allows specifications in which the scale is allowed to vary across outcomes, while keeping the measurement thresholds constant across outcomes. Unfortunately, this does not seem to be supported for multilevel models in the version of Mplus that we used (version 7.3). Thus, we fitted the model without imposing invariance constraints — and hence incomparable coefficients across outcomes — and subsequently rescaled the coefficient estimates for majority contact to impose measurement invariance, treating minority contact as a reference, with a rescale factor defined as the ratio of the difference in thresholds of minority contact and majority contact.⁷ As a sensitivity analysis, we also fitted multilevel multivariate *linear* regression models, using maximumlikelihood estimator with robust standard errors (MLR).

RESULTS

Table 2 shows that on average minority members have more contacts with the majority than with people from other minority groups. Although this is true for all four minority groups, differences exist between them, as indicated by significant chi-square tests (majority contact: $\chi^2(6) = 247.57$, p < 0.001; minority contact: $\chi^2(6) = 80.99$, p < 0.001). Antilleans and Surinamese, compared to Moroccans and Turks, have more contacts with the majority. The picture for inter-minority contacts differs in that Moroccans and Surinamese seem to have a comparable amount of contact with other minorities, while especially Antillean participants have more contact. Again, Turks score the lowest on inter-minority contacts.⁸

⁷Mplus syntax is available from the authors upon request.

⁸These group differences were further confirmed in ANOVAs with Tukey B post hoc tests, treating the two types of contact as continuous variables.

We predicted inter-minority contacts and contacts with the majority simultaneously, using the same set of determinants. The coefficients for each dependent variable are presented in Table 3. Model 1 displays the results of the ordinal regression analysis, separately for inter-minority and minority-majority contacts, while Model 2 shows the findings from the linear regression (sensitivity analysis). Below we discuss our hypotheses referring to the findings of the ordinal models, and only when the linear model yielded different conclusions do we mention the findings from both types of analysis. To test our expectations about differences in the strength of predictions for inter-minority and minority-majority contacts, we rely on Wald tests that compare the coefficients for the independent variables on the two dependent variables using the formula $a_1-a_2 = 0$, where a₁ is the coefficient for an independent variable that is related to inter-minority contacts and a2 the coefficient for the same independent variable in relation to minority-majority contacts. If the score differs significantly from zero, the variable is more strongly related to one type of contacts than to the other.

Looking first at our contextual-level predictor (Table 3, Model 1, first column), we found that a higher percentage of non-Western minority members living in one's municipality was related to more inter-minority contacts, in accordance with hypothesis 1_{min} . Percentage of majority members in the municipality was also related to more contact with the majority (Model 1, second column). Our first comparative hypothesis (H1_{comp}) about ethnic concentration of the respective outgroup in the municipality being equally strongly related to inter-minority and minority-majority contacts was, however, rejected. Percentage of natives was significantly more strongly associated with contacts with natives than that percentage of non-Western minorities was associated with inter-minority contacts (Wald statistic = -0.009, SE = 0.004, p(1-sided) < 0.05).

As to the individual-level predictors, minority members with an elementary occupational status do not differ significantly in the level of inter-minority contact compared to minorities with other occupational statuses. When we re-estimate the model taking high, instead of elementary, occupational status as the reference category (results not shown), we find that minority members with a middle occupational status have more inter-minority contacts than those with a high occupational status (B = 0.198, SE = 0.114, p(1-sided) < 0.05). Even though high occupational status did not differ significantly from low status, the comparison between middle and high status is in line with hypothesis 2_{\min} , where we

$\begin{tabular}{ c c c c c c c c c c c c c c c c c c c$		Model 1: Multilevel multivariate ordinal probit regression		Model 2: Multilevel multivariate linear regression		
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$		Inter-minority contacts	Minority–majority contacts	Inter-minority contacts	Minority–majority contacts	
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	Threshold 1	0.305 (0.182)	0.594 (0.286)*			
$\begin{array}{llllllllllllllllllllllllllllllllllll$	Threshold 2	1.513 (0.176)***	2.103 (0.299)***			
$\begin{array}{llllllllllllllllllllllllllllllllllll$	Constant			0.522 (0.091)***	0.306 (0.119)*	
	Municipality level					
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	% non-Western	0.009 (0.003)**		0.005 (0.002)**		
% majority members $0.022 (0.004)^{**}$ $0.010 (0.001)^{***}$ Individual levelOccupational status (ref. = elementary) Low $0.021 (0.112)$ $0.115 (0.117) 0.000 (0.055) 0.066 (0.054)$ Middle $0.076 (0.113)$ $0.248 (0.130)^* 0.039 (0.056) 0.119 (0.059)^*$ High $-0.122 (0.139)$ $0.298 (0.160)^* -0.077 (0.072) 0.121 (0.067)^*$ Unemployed $0.008 (0.111) 0.037 (0.109) -0.006 (0.055) 0.035 (0.051)$ Other $-0.005 (0.101) 0.025 (0.117) 0.007 (0.047) 0.026 (0.053)$ Educational $0.069 (0.013)^{***} 0.127 (0.018)^{***} 0.036 (0.007)^{***} 0.058 (0.008)^{***}$ levelEducation host $0.377 (0.104)^{***} 0.323 (0.074)^{***} 0.186 (0.053)^{***} 0.161 (0.034)^{***}$ countryDutch language skills (ref. = often) Sometimes $0.104 (0.105) 0.088 (0.071) 0.038 (0.046) 0.060 (0.034)^{*}$ Never $0.219 (0.111)^{*} 0.361 (0.086)^{***} 0.098 (0.052)^{*} 0.203 (0.041)^{***}$	minorities					
$\begin{array}{llllllllllllllllllllllllllllllllllll$	% majority		0.022 (0.004)**		0.010 (0.001)***	
Individual level Occupational status (ref. = elementary) Low 0.021 (0.112) 0.115 (0.117) 0.000 (0.055) 0.066 (0.054) Middle 0.076 (0.113) 0.248 (0.130)* 0.039 (0.056) 0.119 (0.059)* High -0.122 (0.139) 0.298 (0.160)* -0.077 (0.072) 0.121 (0.067)* Unemployed 0.008 (0.111) 0.037 (0.109) -0.006 (0.055) 0.035 (0.051) Other -0.005 (0.101) 0.025 (0.117) 0.007 (0.047) 0.026 (0.053) Educational 0.069 (0.013)*** 0.127 (0.018)*** 0.036 (0.007)*** 0.058 (0.008)*** level Education host 0.377 (0.104)*** 0.323 (0.074)*** 0.186 (0.053)*** 0.161 (0.034)*** country Dutch language skills (ref. = often) Sometimes 0.104 (0.105) 0.088 (0.071) 0.038 (0.046) 0.060 (0.034)* problems Never 0.219 (0.111)* 0.361 (0.086)*** 0.098 (0.052)* 0.203 (0.041)***	members					
$\begin{array}{llllllllllllllllllllllllllllllllllll$	Individual level					
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	Occupational status	s (ref. = elementary)				
$\begin{array}{cccccccccccccccccccccccccccccccccccc$	Low	0.021 (0.112)	0.115 (0.117)	0.000 (0.055)	0.066 (0.054)	
High $-0.122 (0.139)$ $0.298 (0.160)^*$ $-0.077 (0.072)$ $0.121 (0.067)^*$ Unemployed $0.008 (0.111)$ $0.037 (0.109)$ $-0.006 (0.055)$ $0.035 (0.051)$ Other $-0.005 (0.101)$ $0.025 (0.117)$ $0.007 (0.047)$ $0.026 (0.053)$ Educational $0.069 (0.013)^{***}$ $0.127 (0.018)^{***}$ $0.036 (0.007)^{***}$ $0.058 (0.008)^{***}$ level $0.377 (0.104)^{***}$ $0.323 (0.074)^{***}$ $0.186 (0.053)^{***}$ $0.161 (0.034)^{***}$ Country $0.088 (0.071)$ $0.038 (0.046)$ $0.060 (0.034)^{*}$ Putch language skills (ref. = often) $0.088 (0.071)$ $0.038 (0.046)$ $0.060 (0.034)^{*}$ Problems </td <td>Middle</td> <td>0.076 (0.113)</td> <td>0.248 (0.130)*</td> <td>0.039 (0.056)</td> <td>0.119 (0.059)*</td>	Middle	0.076 (0.113)	0.248 (0.130)*	0.039 (0.056)	0.119 (0.059)*	
$\begin{array}{cccccccccccccccccccccccccccccccccccc$	High	-0.122 (0.139)	0.298 (0.160)*	-0.077 (0.072)	0.121 (0.067)*	
$\begin{array}{cccccccccccccccccccccccccccccccccccc$	Unemployed	0.008 (0.111)	0.037 (0.109)	-0.006 (0.055)	0.035 (0.051)	
Educational 0.069 (0.013)*** 0.127 (0.018)*** 0.036 (0.007)*** 0.058 (0.008)*** level Education host 0.377 (0.104)*** 0.323 (0.074)*** 0.186 (0.053)*** 0.161 (0.034)*** country Dutch language skills (ref. = often) 0.104 (0.105) 0.088 (0.071) 0.038 (0.046) 0.060 (0.034)* problems Never 0.219 (0.111)* 0.361 (0.086)*** 0.098 (0.052)* 0.203 (0.041)***	Other	-0.005 (0.101)	0.025 (0.117)	0.007 (0.047)	0.026 (0.053)	
level Education host 0.377 (0.104)*** 0.323 (0.074)*** 0.186 (0.053)*** 0.161 (0.034)*** country Dutch language skills (ref. = often) Sometimes 0.104 (0.105) 0.088 (0.071) 0.038 (0.046) 0.060 (0.034)* problems Never 0.219 (0.111)* 0.361 (0.086)*** 0.098 (0.052)* 0.203 (0.041)*** problems	Educational	0.069 (0.013)***	0.127 (0.018)***	0.036 (0.007)***	0.058 (0.008)***	
Education host 0.377 (0.104)*** 0.323 (0.074)*** 0.186 (0.053)*** 0.161 (0.034)*** country Dutch language skills (ref. = often) 0.000 (0.034)*** 0.000 (0.034)*** Sometimes 0.104 (0.105) 0.088 (0.071) 0.038 (0.046) 0.060 (0.034)** problems Never 0.219 (0.111)* 0.361 (0.086)*** 0.098 (0.052)* 0.203 (0.041)***	level					
country Dutch language skills (ref. = often) Sometimes 0.104 (0.105) 0.088 (0.071) 0.038 (0.046) 0.060 (0.034)* problems Never 0.219 (0.111)* 0.361 (0.086)*** 0.098 (0.052)* 0.203 (0.041)*** problems	Education host	0.377 (0.104)***	0.323 (0.074)***	0.186 (0.053)***	0.161 (0.034)***	
Dutch language skills (ref. = often) Sometimes $0.104 (0.105)$ problems Never $0.219 (0.111)^*$ $0.361 (0.086)^{***}$ $0.098 (0.052)^*$ $0.203 (0.041)^{***}$	country					
Sometimes 0.104 (0.105) 0.088 (0.0/1) 0.038 (0.046) 0.060 (0.034)* problems Never 0.219 (0.111)* 0.361 (0.086)*** 0.098 (0.052)* 0.203 (0.041)*** problems	Dutch language ski	lls (ref. = often)				
problems Never 0.219 (0.111)* 0.361 (0.086)*** 0.098 (0.052)* 0.203 (0.041)*** problems	Sometimes	0.104 (0.105)	0.088(0.0/1)	0.038 (0.046)	0.060 (0.034)*	
Never 0.219 (0.111)* 0.361 (0.086)*** 0.098 (0.052)* 0.203 (0.041)*** problems	problems	0.010 (0.111)*	0.0(1.(0.00()***	0.000 (0.050)*	0.000 (0.0(1)***	
problems	Never	0.219 (0.111)*	0.361 (0.086)***	0.098 (0.052)*	0.203 (0.041)***	
	problems	0.0(2.(0.027)*	0.005 (0.000)***	0.02/ (0.01/)**	0.10((0.011)***	
Ingroup $0.062 (0.02/)^{*} -0.295 (0.029)^{***} 0.034 (0.014)^{**} -0.126 (0.011)^{***}$	Ingroup	$0.062 (0.02/)^{+}$	-0.295 (0.029)***	$0.034 \ (0.014)^{**}$	$-0.126 (0.011)^{+++}$	
identification	identification					
Control variables $\Gamma_{1} = \Gamma_{1} = \Gamma_$	Control variables $E_{\rm el} = 1$					
Ethnicity (ref. = Moroccan) T_{u-1} (0.001)** 0.187 (0.102) 0.175 (0.042)*** 0.074 (0.040)	Turbick (ref. = M	0.215 (0.001)**	0 107 (0 102)	0 175 (0 0 62)***	0.074 (0.040)	
$\begin{array}{cccccccccccccccccccccccccccccccccccc$	Antilloon	-0.313(0.091)	-0.187(0.103) 0.200(0.110)**	-0.1/3 (0.043)	-0.0/4 (0.040) 0.122 (0.047)**	
Antimezza $0.000 (0.090) = 0.290 (0.116) = 0.072 (0.050) = 0.132 (0.047)$	Surinamaaa	0.090(0.090)	0.290(0.110) 0.290(0.116)*	0.030(0.030)	0.132(0.047) 0.120(0.049)**	
Summaniese $-0.109(0.062)$ $0.269(0.110) -0.079(0.044)$ $0.159(0.046)$ Second $0.170(0.079)*$ $0.353(0.066)*** 0.111(0.06/)* 0.128(0.027)***$	Sacond	-0.109(0.082) 0.170(0.079)*	0.269 (0.110)	-0.073(0.044) 0.111(0.044)*	0.139 (0.046)	
$\begin{array}{cccccccc} \text{second} & 0.1/0 & (0.0/9) & 0.333 & (0.000) & 0.111 & (0.044) & 0.128 & (0.027) \\ \text{generation} & \end{array}$	generation	0.1/0(0.0/9)	0.555 (0.000)	0.111 (0.044)	0.128 (0.027)	
$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	Female	_0.011 (0.050)	_0.216 (0.05/1)***	-0.006(0.024)	_0 104 (0 024)***	
$\begin{array}{cccc} -0.011 & (0.050) & -0.210 & (0.03) \\ \Delta_{ree} & -0.015 & (0.03)^{***} & 0.001 & (0.003) \\ \Delta_{ree} & -0.015 & (0.03)^{***} & 0.001 & (0.003) \\ \end{array}$	Age	-0.011 (0.090)	-0.210(0.0)4) 0.001(0.003)	-0.000(0.024) -0.008(0.002)***	-0.104(0.024) 0.000(0.001)	
Age = -0.017 (0.005) 0.001 (0.005) = 0.008 (0.002) 0.000 (0.001)	Variance	-0.01) (0.003)	0.001 (0.003)	-0.008 (0.002)	0.000 (0.001)	
$ \begin{array}{cccc} v_{\text{attainee}} \\ \text{Individual layal} \\ 0.286 (0.055)^{***} \\ 0.403 (0.015)^{***} \\ 0.403 (0.015)^{***} \\ 0.426 (0.016)^{***} \\ \end{array} $	Individual laval	0.386 (0	055)***	0 /03 (0 015)***	0 /36 (0 01/)***	
$\begin{array}{cccccccccccccccccccccccccccccccccccc$	Municipality	0.000 (0	0.017 (0.002)**		0.430(0.014) 0.007(0.002)**	
level	level	0.017 (0		0.000 (0.004)	0.007 (0.002)	
Sample size	Sample size					
Individual level 3 273 3 273 3 273 3 273	Individual level	3 273	3 273	3 273	3 273	
Municipality level 126 48 126 48	Municipality level	126	48	126	48	

TABLE 3 Multilevel Multivariate Models for Inter-Minority Contacts and Minority-Majority Contacts: Ordinal Probit and Linear Approaches Compared

Notes: Unstandardized coefficients with standard errors in the brackets presented.

Individual- and municipality-level variance is not available separately for each dependent variable in Model 1 but is rather estimated for the model as a whole because of the latent variable approach that we used in the ordinal probit models. *p < 0.05, **p < 0.01, ***p < 0.001 (*p*-values for independent variables refer to one-sided *p*-tests).

predicted a negative relationship between occupational status and interminority contacts. Furthermore, given that minorities with a middle and high occupational status have significantly more contacts with the *majority* than those with an elementary occupational status, we found some support for our comparative hypothesis (H2_{comp}), which predicted a positive relation of occupational status with contacts with natives and a negative relation with inter-minority contacts.

The expectation about higher education being related to more interminority contacts based on higher preferences (H3amin) is confirmed. The alternative hypothesis about educational level being related to fewer interminority contacts through reduced opportunities (H3b_{min}) is rejected. Note, however, that our conclusions about the relative importance of preferences rely on indirect evidence, as we did not measure the underlying mechanisms but only expected a contrasting prediction based on preferences and opportunities. Furthermore, as we argued that the hypothesis H3b_{min} might only apply to people who had education in the Netherlands, we also estimated a model with an interaction between educational level and place of education (Netherlands versus abroad). The interaction was not significant (B = -0.034; SE = 0.029, p(1-sided) > 0.05), indicating that the relation of education with inter-minority contacts is the same for people who followed education abroad and those who were educated in the Netherlands. Yet, the main effect of education in the host country was significant: participants who got educated in the Netherlands had more inter-minority contacts. It was further expected that educational level would be more strongly positively related to contacts with natives than with other minorities (H3_{comp}), and this hypothesis was confirmed (Wald statistic = -0.032, SE = 0.019, p(1-sided) < 0.05).

Dutch language proficiency was positively related to inter-minority contacts, in line with hypothesis 4_{min} . Individuals who never experienced problems with speaking Dutch had more contacts with other minorities than individuals who often encountered problems. Those who sometimes experienced problems did not differ from those who experienced them often, meaning that even occasional Dutch language problems represent a barrier for inter-minority contacts. Furthermore, a stronger positive relationship was expected between language and contacts with the majority (H4_{comp}). We found no support for this hypothesis when using the ordinal probit method (Table 3, Model 1). Participants who never had language problems compared to those who often had problems did not differ more in contacts with natives than that they differed in inter-minority

contacts (Wald statistic = -0.070, SE = 0.107, p > 0.05). In contrast, when comparing the coefficients from Model 2 (Table 3), using linear regression, we found that the difference between minorities who never have problems with the Dutch language and those who often encounter problems is more pronounced for contacts with natives than for interminority contacts (Wald statistic = -0.105, SE = 0.050, p < 0.05).

Finally, ingroup identification was expected to be negatively related to both types of contact (H5_{min} and H5_{maj}), and especially to contact with majority (H5_{comp}). Contrary to H5_{min}, we found a positive relationship between ingroup identification and inter-minority contacts. Yet, in line with H5_{maj}, higher ingroup identifiers had fewer contacts with natives. Taken together, these findings support H5_{comp}, which predicted that ingroup identification would be significantly more negatively related to minority–majority contacts (Wald statistic = -0.174, SE = 0.037, p < 0.001).

Regarding the control variables, first generation migrants and older participants had on average fewer inter-minority contacts. It is interesting to see that after including all the explanatory variables and controlling for age, gender and migration generation, there were still differences in interminority contacts between the four ethnic groups. Minorities with a Turkish background had fewer contacts with other non-Western groups than Moroccans. However, Antilleans, who had most contacts with other minorities (as documented in Table 2) did not differ from Moroccans and Surinamese any more after accounting for individual and contextual differences in the multivariate analysis (Table 3).

Additional Analysis: Differences between the Minority Groups

While Turks, Moroccans, Surinamese, and Antilleans are all classified as non-Western minorities and on average occupy underprivileged positions in the Dutch society, there are also some notable differences between them. Turkish and Moroccan minorities (the Mediterranean groups) initially arrived in the Netherlands as guest workers and Surinamese and Antilleans (the Caribbean groups) as colonial migrants. Moreover, Turkish and Moroccan minorities are mostly Muslim, whereas Antilleans are predominantly Christian and the Surinamese are Christian, Muslim, or Hindu. The Caribbean groups hold on average higher economic status than the Mediterranean groups, as indicated by higher income and educational levels (Gijsberts and Dagevos 2009). Given these differences, we wanted to check whether the hypothesized relations regarding inter-minority and minority-majority contacts hold equally true for the Mediterranean and Caribbean groups. All explanatory variables were therefore interacted with a dummy variable indicating if a minority member belonged to the Mediterranean (0) or Caribbean (1) group (results not shown). For contacts with natives, all the associations were the same across the two groups. For inter-minority contacts only the interaction with ingroup identification was significant (B = 0.136, SE = 0.052, p = 0.009). Ingroup identification was positively associated with inter-minority contact for the Caribbean minorities but no relationship was found for the Mediterranean minorities. Still, in line with the prediction, the relationship between ingroup identification and contacts with the majority was more negative than that with inter-minority contacts for both groups. Overall, we can conclude that our hypotheses hold equally true for the Mediterranean and the Caribbean groups.

DISCUSSION AND CONCLUSION

Many West European countries are home to different non-Western minorities, and it has been argued that contacts with the native population are not only important for these minorities' economic integration (Lancee 2010; Kanas et al. 2012) but that they are also beneficial for the social cohesion of a society as a whole (Hindriks, Verkuyten, and Coenders 2014). With the current paper, we want to draw attention to another important, yet understudied, form of inter-ethnic contacts, namely that between ethnic minorities, which also matters for the social cohesion in the host country.

Our first aim was to identify determinants of this type of inter-ethnic contacts, and we did so by relying on the theory of preferences, opportunities and third parties (Kalmijn 1998). This theory, commonly used in studies on minority-majority contacts (Vervoort 2012; Martinovic 2013), turned out to be useful for explaining differences in inter-minority contacts too. Our hypotheses about individual and contextual determinants were generally supported by the data. We found that minority members living in areas with a higher percentage of non-Westerners, having a higher educational level and better Dutch language skills tend to have more contacts with other non-Western minorities, while minorities with a high occupational status hang out less with other minorities than those with a middle status.

An intriguing finding is that minorities in high-level occupations did not differ in the amount of inter-minority contacts from those employed in low positions. However, even though non-Western minorities are generally overrepresented in lower occupational strata (Huijnk, Mérove, and Dagevos 2014), ethnic groups can also be segregated across sectors and companies, and therefore have little chance of meeting each other in the work context (think of ethnic enclaves). A person with a lower status (e.g., a waiter with a Turkish background working in a Turkish restaurant among Turkish colleagues) is then less likely to be in contact with Dutch natives than a person with a higher status (e.g., a banker in a national bank with a Turkish background). However, the waiter and the banker both have equally little opportunity to meet people from other non-Western minorities (e.g., Antilleans) at work. In future research, including more detailed information about the proportion of different outgroups in the work environment might yield more precise conclusions about the role of work context and occupational status.

Regarding education, we found a positive relation between educational level and inter-minority contacts, suggesting that higher educated minorities are more open and have a stronger preference for contacts with other minorities. However, we cannot conclude that opportunities for inter-minority contacts, which were argued to be lower at higher levels of education, are irrelevant for the relationship between education and interminority contacts. The fact that we found a positive association only suggests that in explaining the influence of the educational *level*, the role of preferences is stronger and more influential than that of opportunities. However, people enrolled in a Dutch educational institution, regardless of the level, have more chance to get in contact with other non-Western groups, which shows that the opportunity to meet other minorities at school or university also matters for inter-minority contacts.

Our finding about the percentage of non-Western minorities being positively related to inter-minority contacts is in line with the theory but contradicts the findings by Vervoort, Flap, and Dagevos (2011), who detected no association between the two. This difference can probably be attributed to the measure of ethnic composition they used, which combined people from other non-Western minorities with those from one's own ingroup. The percentage of co-ethnics actually correlates negatively with inter-minority contacts (ibid.), which might explain why we found the expected significant positive relationship for the percentage of non-Western minorities using a purer measure.

Against expectation it was found that minority members who identify more with their ethnic ingroup have more inter-minority contacts. The (only available) question to measure ingroup identification asked if participants identified more strongly with the Dutch or with their own ethnic group. This question reflects a unidimensional model which assumes that stronger identification with the host culture precludes identification with the heritage culture (Arends-Tóth and van de Vijver 2006). This model has been criticized by arguing that minority members might in fact identify highly with both groups (or with neither) (Berry 2006). The drawback of the current question is that it only reflects the discrepancy between two identification options and is not the best measure for ingroup identification on its own. Higher scores might actually capture a distancing from the Dutch rather than a strong identification with the ethnic ingroup, and they might even reflect identification with non-Dutch groups as a whole. In the public discourse in the Netherlands a distinction is commonly made between autochtonen (native Dutch) and allochtonen (people with a non-Dutch - and usually non-Western - ethnic background). Minority members identifying with this superordinate category are probably more positive toward other members belonging to this category (Dovidio, Gaertner, and Saguy 2007), which might explain the positive relation of ingroup identification with inter-minority contacts.

The theory further led us to formulate hypotheses about the differential role of some of the determinants for the two types of inter-ethnic contacts. Using the arguments about opportunities to meet outgroup members, we expected and found that higher occupational levels are indicative of more contacts with natives but fewer contacts with other minorities. Next, education was more strongly related to contacts with majority members than to inter-minority contacts. This is also in line with the theoretical reasoning. While a higher level of education equips minority members with a stronger preference for inter-ethnic contacts irrespective of the target group, for people enrolled in higher levels of education there is more opportunity to meet Dutch natives and less opportunity to meet other non-Western minorities. The conflicting role of preferences and opportunities for inter-minority contacts is possibly the reason why the detected positive association with education is stronger for contacts with natives.

We also hypothesized that proficiency in the Dutch language would be relevant for both types of contacts, but that it would be a stronger predictor of contacts with native Dutch than with other minorities. Our argument was that knowing Dutch language probably increases the bond with the Dutch culture, thereby especially increasing the preference for contacts with the majority but less so with other minority members. While language did matter for both types of contact, we did not find unequivocal support for the comparative hypothesis. Although the coefficients for language proficiency were larger in relation to contacts with Dutch, only when treating contacts as a continuous variable, but not when treating it as ordinal, did we detect a significant difference in the strength of the effects.

In line with the expectations, we found that ingroup identification was related more negatively to contacts with natives than to contacts with other minorities (to which it was actually related positively). Choosing for ingroup over the Dutch outgroup as a source of identity implies a stronger commitment to the ethnic community, and this community as a third party tends to discourage interaction with culturally distant others, who are most often Dutch natives. Still, these findings should be interpreted with caution. As the measure of identification focused on the distinction between ethnic ingroup and the Dutch, this might also be part of the reason why a stronger association was found for minority-majority contacts.

Although our hypotheses were generally supported, and although all five determinants significantly predicted inter-minority contacts, the model as a whole was more successful in explaining contacts with the majority (as can be seen from generally larger effect sizes). This could partly be due to the fact that the determinants included in this study were taken from previous research on minority–majority contacts, thereby neglecting some potentially relevant determinants that are specific to inter-minority contacts, such as identification with minorities as a whole or perceived discrimination from Dutch natives, both of which might boost inter-minority interaction.

The second reason might be that contacts with Dutch natives referred to a clear outgroup, whereas the measure for inter-minority contacts captured interaction with non-Western minorities as a whole, irrespective of ethnicity. The model for inter-minority contacts could be improved by measuring minority members' contacts with a specific other minority. This might especially be useful for examining the role of outgroup size in the locality, which we unexpectedly found to be a stronger predictor of contacts with natives than of inter-minority contacts. We are cautious in drawing firm conclusions about this differential effect exactly due to the lower correspondence between the independent and dependent measure for inter-minority contacts: neither the dependent variable nor the contextual-level predictor clearly referred to a specific minority. Possibly a stronger association would be found if inter-minority contacts with separate ethnic groups were recorded and then predicted by the respective group sizes in the area.

As our study relied on cross-sectional data, we cannot be certain about the direction of causality in the detected relationships. However, previous longitudinal research in the Netherlands and Canada has shown that education, language proficiency, and percentage of natives in the neighborhood all have a causal effect on contacts with the majority (Martinovic, van Tubergen, and Maas 2009; 2011). We are therefore somewhat confident that these determinants also influence inter-minority contacts in the hypothesized directions. Nevertheless, a repetition of the analysis is needed using a longitudinal design.

We further encourage researchers to test the mechanisms behind theory of preferences, opportunities and third parties in a more direct manner in the future. The influence of third parties could, for example, be measured with a question about the extent to which members of one's family or ethnic community would mind if one had contact with someone belonging to an outgroup. To test the preference mechanism participants could be asked how much cultural similarity weighs in their choice of friends. And opportunity could be captured by questions about the proportion of outgroup members in people's relevant daily contexts (e.g., classroom, workplace, or clubs and associations).

Our study focused on the four largest non-Western minorities in the Netherlands, and has shown that in spite of the differences in the levels of inter-minority contacts, the theory and hypotheses hold equally for Turks and Moroccans (minorities with a guest worker history) and Surinamese and Antilleans (minorities from Dutch colonies). As minorities with a colonial or guest worker background live in many other European countries, our findings can probably be generalized to these contexts as well, but this should be confirmed empirically. Another question that remains is how the model would work if Western European immigrants, such as Germans or Belgians in the Netherlands, were included in the sample. Western immigrant groups in the Netherlands tend to be higher educated, more often employed and, when employed, they tend occupy higher-level positions (Van Tubergen, Maas, and Flap 2004; Van Tubergen 2006). Therefore, it is possible that inter-minority contacts between non-Western and Western minorities in the Netherlands would be predicted differently than inter-minority contacts among non-Western groups, with the former resembling more the pattern of contacts between non-Westerners and the Dutch majority.

In conclusion, we have made an important contribution to the research field by examining an understudied yet increasingly relevant form of inter-ethnic ties in Europe — inter-minority contacts in leisure time — independently and in comparison with minority-majority contacts. We have shown that the theory of preferences, opportunities and third parties is a helpful tool for understanding both types of inter-ethnic interaction, but we have also highlighted the importance of studying inter-minority contacts as a separate phenomenon. Future research on inter-minority contacts should focus on establishing causality, examining other national contexts and targeting other (e.g., Western European, European American) minorities.

REFERENCES

- Al Ramiah, A., and M. Hewstone
- 2013 "Intergroup Contact as a Tool for Reducing, Resolving, and Preventing Intergroup Conflict Evidence, Limitations, and Potential." *American Psychologist* 68:527–42.
- Allison, P. D.
- 1999 "Comparing Logit and Probit Coefficients Across Groups." Sociological Research and Methods 28:186–208.
- Allport, G. W.
- 1954 The Nature of Prejudice. Reading: Addison-Wesley.
- Arends-Tóth, J., and F. J. R. van de Vijver
- 2006 "Assessment of Psychological Acculturation." In *The Cambridge Handbook of Acculturation Psychology*, edited by D. L. Sam and J. W. Berry, 142–60. New York: Cambridge University Press.
- Berry, J. W.
- 2006 "Contexts of Acculturation." In *The Cambridge Handbook of Acculturation Psychology*, edited by D. L. Sam and J. W. Berry, 27–42. New York: Cambridge University Press. Blau, P. M.
- 1977 Inequality and Heterogeneity. New York: Free Press.
- Brown, R., A. Eller, S. Leeds, and K. Stace
- 2007 "Intergroup Contact and Intergroup Attitudes: A Longitudinal Study." *European Journal of Social Psychology* 37:692–703.
- Brüß, J.
- 2005 "Proud but Isolated? Effects of In-Group Favouritism and Acculturation Preferences on Inter-Ethnic Attitudes and Contact between German, Turkish and Resettler Adolescents." *Journal of Ethnic and Migration Studies* 31:3–27.
- Carol, S.
- 2014 "The Intergenerational Transmission of Intermarriage Attitudes and Intergroup Friendships: The Role of Turkish Migrant Parents." *Journal of Ethnic and Migration Studies* 40:1550–71.

- CBS (Statistics Netherlands)
- 2012 StatLine. http://statline.cbs.nl.
- Dagevos, J., and M. Gijsberts
- 2007 Jaarrapport Integratie 2007 [Yearly Integration Report 2007]. The Hague: The Netherlands Institute for Social Research.
- Dovidio, J. F., S. L. Gaertner, and T. Saguy
- 2007 "Another View of "We": Majority and Minority Group Perspectives on a Common Ingroup Identity." *European Review of Social Psychology* 18:296–330.
- Esser, H.
- 1986 "Social Context and Inter-ethnic Relations: The Case of Migrant Workers in West German Urban Areas." *European Sociological Review* 2:30–51.
- Gijsberts, M., and J. Dagevos
- 2009 Jaarrapport Integratie 2009 [Yearly Integration Report 2009]. The Hague: The Netherlands Institute for Social Research.
- Hindriks, P., M. Verkuyten, and M. Coenders
- 2014 "Interminority Attitudes the Roles of Ethnic and National Identification, Contact, and Multiculturalism." *Social Psychology Quarterly* 77:54–74.
- Huijnk, W., G. Mérove, and J. Dagevos.
- 2014 Jaarrapport Integratie 2013. [Yearly Integration Report 2013]. The Hague: The Netherlands Institute for Social Research.
- Kalmijn, M.
- 1998 "Intermarriage and Homogamy: Causes, Patterns, Trends." Annual Review of Sociology 24:395-421.
- ——, and F. van Tubergen
- 2006 "Ethnic Internarriage in The Netherlands: Confirmations and Refutations of Accepted Insights." *European Journal of Population* 22:371–97.
- Kanas, A., B. R. Chiswick, T. van der Lippe, and F. van Tubergen
- 2012 "Social Contacts and the Economic Performance of Immigrants: A Panel Study of Immigrants in Germany." *International Migration Review* 46:680–709.
- Kao, G., and K. Joyner
- 2004 "Do Race and Ethnicity Matter Among Friends? Activities Among Interracial, Interethnic, and Intraethnic Adolescent Friends." *Sociological Quarterly* 45:557–73. Kobayashi, Y.
- 2006 "Interethnic Relations between ESL Students." Journal of Multilingual and Multicultural Development 27:181–95.
- Kokkonen, A., P. Esaiasson, and M. Gilljam
- 2015 "Diverse Workplaces and Interethnic Friendship Formation—A Multilevel Comparison Across 21 OECD Countries." *Journal of Ethnic and Migration Studies* 41:284–305.
- Kreager, D. A.
- 2008 "Guarded Borders: Adolescent Interracial Romance and Peer Trouble at School." Social Forces 87:887–910.
- Lancee, B.
- 2010 "The Economic Returns of Immigrants' Bonding and Bridging Social Capital: The Case of the Netherlands." *International Migration Review* 44:202–26.
- Martinovic, B.
- 2013 "The Inter-Ethnic Contacts of Immigrants and Natives in the Netherlands: A Two-Sided Perspective." *Journal of Ethnic and Migration Studies* 39:69–85.

----, F. van Tubergen, and I. Maas

- 2009 "Dynamics of Interethnic Contact: A Panel Study of Immigrants in the Netherlands." *European Sociological Review* 25:303–18.
 , , , and a study of the study o
- 2011 "Acquisition of Cross-Ethnic Friends by Recent Immigrants in Canada: A Longitudinal Approach." *International Migration Review* 45:460–88.
- 2015 "A Longitudinal Study of Interethnic Contacts in Germany: Estimates from a Multilevel Growth Curve Model." *Journal of Ethnic and Migration Studies* 41:83–100.
- McPherson, M., L. Smith-Lovin, and J. M. Cook
- 2001 "Birds of a Feather: Homophily in Social Networks." *Annual Review of Sociology* 27:415–44.
- Mouw, T., and B. Entwisle
- 2006 "Residential Segregation and Interracial Friendship in Schools." American Journal of Sociology 112:394-441.
- Munniksma, A., A. Flache, M. Verkuyten, and R. Veenstra
- 2012 "Parental Acceptance of Children's Intimate Ethnic Outgroup Relations: The Role of Culture, Status, and Family Reputation." *International Journal of Intercultural Relations* 36:575–85.
- Musterd, S.
- 2005 "Social and Ethnic Segregation in Europe: Levels, Causes, and Effects." *Journal of Urban Affairs* 27:331–48.
- Muttarak, R.
- 2014 "Generation, Ethnic and Religious Diversity in Friendship Choice: Exploring Interethnic Close Ties in Britain." *Ethnic and Racial Studies* 37:71–98.
- Nortier, J., and M. Dorleijn
- 2008 "A Moroccan Accent in Dutch: A Sociocultural Style Restricted to the Moroccan Community?" *International Journal of Bilingualism* 12:125–42.
- Pettigrew, T. F., and L. R. Tropp
- 2006 "A Meta-analytic Test of Intergroup Contact Theory." Journal of Personality and Social Psychology 90:751–83.
- Quillian, L., and M. E. Campbell
- 2003 "Beyond Black and White: The Present and Future of Multiracial Friendship Segregation." *American Sociological Review* 68:540–66.
- Roth, W. D., M.-D. L. Seidel, D. Ma, and E. Lo
- 2012 "In and Out of the Ethnic Economy: A Longitudinal Analysis of Ethnic Networks and Pathways to Economic Success across Immigrant Categories." *International Migration Review* 46:310–61.
- Schoonen, R., and R. Appel
- 2005 "Street Language: A Multilingual Youth Register in the Netherlands." Journal of Multilingual and Multicultural Development 26:85–117.
- Semyonov, M., and A. Glikman
- 2009 "Ethnic Residential Segregation, Social Contacts, and Anti-Minority Attitudes in European Societies." *European Sociological Review* 25:693–708.
- Smith, J. A., M. McPherson, and L. Smith-Lovin
- 2014 "Social Distance in the United States Sex, Race, Religion, Age, and Education Homophily among Confidants, 1985 to 2004." *American Sociological Review* 79:432–56.

- Special Eurobarometer
- 2006 Europeans and Their Languages. Brussels: European Commission. http://ec.europa.eu/public_opinion/archives/ebs/ebs_243_en.pdf.
- Stoop, I. A. L.
- 2005 The Hunt for the Last Respondent: Nonresponse in Sample Surveys. The Hague: Social and Cultural Planning Office.
- Van Tubergen, F.
- 2006 "Occupational status of immigrants in cross-national perspective: A multilevel analysis of 17 Western Societies." In *Immigration and the Transformation of Europe*, edited by C. Parsons and T. Smeedings, 147–71. Cambridge: Cambridge University Press.
 - -----, I. Maas, and H. Flap
- 2004 "The Economic Incorporation of Immigrants in 18 Western Societies: Origin, Destination, and Community Effects." American Sociological Review 69:704–27.
- Vervoort, M.
- 2012 "Ethnic Concentration in the Neighbourhood and Ethnic Minorities' Social Integration: Weak and Strong Social Ties Examined." Urban Studies 49:897–915.
 , and J. Dagevos
- 2011 "The Social Integration of Ethnic Minorities: An Explanation of the Trend in Ethnic Minorities' Social Contacts with Natives in the Netherlands, 1998–2006." *Journal of Ethnic and Migration Studies* 37:619–35.
 —, H. Flap, and J. Dagevos
- 2011 "The Ethnic Composition of the Neighbourhood and Ethnic Minorities' Social Contacts: Three Unresolved Issues." *European Sociological Review* 27:586–605.