Basic and Applied Social Psychology
Publication details, including instructions for authors and subscription information:
http://www.informaworld.com/smpp/title~content=t775648090

Religiosity, Psychological Acculturation to the Host Culture, Self-Esteem and Depressive Symptoms Among Stigmatized and Nonstigmatized Religious Immigrant Groups in Western Europe

Mike Friedman[a]; Vassilis Saroglou[b]
[a] Catholic University of Mons-Louvain School of Management, [b] Université catholique de Louvain at Louvain-la-Neuve,

Online publication date: 13 May 2010

To cite this Article Friedman, Mike and Saroglou, Vassilis(2010) 'Religiosity, Psychological Acculturation to the Host Culture, Self-Esteem and Depressive Symptoms Among Stigmatized and Nonstigmatized Religious Immigrant Groups in Western Europe', Basic and Applied Social Psychology, 32: 2, 185 — 195
To link to this Article: DOI: 10.1080/01973531003738387
URL: http://dx.doi.org/10.1080/01973531003738387

BASIC AND APPLIED SOCIAL PSYCHOLOGY, 32:185–195, 2010

ISSN: 0197-3533 print/1532-4834 online
DOI: 10.1080/01973531003738387

Psychology Press
Taylor & Francis Group

Religiosity, Psychological Acculturation to the Host Culture, Self-Esteem and Depressive Symptoms Among Stigmatized and Nonstigmatized Religious Immigrant Groups in Western Europe

Mike Friedman
Catholic University of Mons-Louvain School of Management

Vassilis Saroglou
Université catholique de Louvain at Louvain-la-Neuve

This study examined the associations among religiosity, psychological acculturation to the host culture, and self-esteem and depressive symptoms among immigrants to a secular European country (Belgium). A first hypothesis proposed that religiosity would be negatively indirectly associated with psychological acculturation through the intervening mechanism of perceived distance between the home and host cultures. A second hypothesis proposed that religiosity would be indirectly negatively related to self-esteem and indirectly positively related to depressive symptoms through (a) reduced perceptions that religious beliefs are tolerated by the host culture and (b) feelings of anger toward the host society. The first hypothesis received support among stigmatized and nonstigmatized religious groups, whereas the second was supported only for members of the stigmatized religious group.

Religion has been studied from a psychological perspective in a number of different ways. Previous work on the psychology of religion has produced vast amounts of research investigating the ways in which religious beliefs, at the level of the individual, contribute to, for example, physical and mental health, interpersonal relationships and intergroup relations (e.g., Koenig, McCullough, & Larson, 2000; Paloutzian & Park, 2005; Spilka, Hood, Hunsberger, & Gorsuch, 2003). The psychology of intergroup relations has studied the religiosity construct from a related yet distinct perspective. In this view, religion is not simply an individual belief system but also serves as a marker of group belonging and identification (e.g., Verkuyten & Yildiz, 2007).

The current work merges these two perspectives and examines religious belief at the level of the individual in an intergroup context. In this research, we use social psychological theory on intergroup relations and on the psychology of religion to examine the correlates of religious belief with important psychological variables among first- and second-generation immigrants to Europe. The current work thus takes both a theoretical and an applied perspective on a current societal issue.

Our general hypothesis is that intergroup context can shape the associations among religiosity, perceptions of the host society, and well-being and that these associations will take different forms in stigmatized versus nonstigmatized religious immigrant groups. To examine these issues, we examined associations among religiosity, acculturation to the host culture, and levels of self-esteem and depressive symptoms among Muslim and non-Muslim immigrants to a secular European country (Belgium).

Our hypotheses follow from previous social psychological research on intergroup relations and from research on religious identity among immigrants to Europe. We are further informed by descriptive public policy and anthropological research that has addressed

Correspondence should be sent to Mike Friedman, Chaussée de Binche, 151, B-7000, Mons, Belgium. E-mail: mike.d.friedman@gmail.com

these issues. Our interest is on the religiosity construct and its associations with acculturation to the host culture and to self-esteem and depression. This theoretical focus requires examining religiosity as an independent variable and acculturation to the host culture, self-esteem, and depressive symptoms as outcome measures. The rationale for our hypotheses concerning these relations is outlined below.

EVIDENCE OF STIGMATIZATION OF MUSLIMS IN HOST CULTURE UNDER STUDY

In the current work, we take the perspective that, although individual religious beliefs may to some extent be counternormative in a secular society, the suspicion, discomfort, and misunderstanding evidenced by native Europeans toward religious immigrants is particularly high for those of Muslim faith, as opposed to those of non-Muslim faith.

Indeed, previous work has shown that Muslim immigrants are a stigmatized group in the culture under study and that their religious beliefs constitute an important aspect of their stigmatization. The atmosphere in Belgium has been characterized by a mutual lack of confidence between Western Europe and the Arab-Muslim world, and some Belgians find Muslim practices are at odds with Western values (Bousetta & Jacobs, 2006; Bousetta & Maréchal, 2003; Manço & Manço, 2000).

Stigmatization is further evident among first- and second-generation Muslim immigrants in economic and social domains. For example, Muslim immigrants tend to live in more ethnically segregated areas, have less educational attainment in the second generation, and evidence reduced economic participation and higher unemployment rates compared to immigrants from other countries (Bousetta & Maréchal, 2003; Manço & Kanmaz, 2005; Manço & Manço, 2000; Phalet & Swyngedouw, 2003). Stigmatization is also likely to stem from the fact that, although Belgium is one of the most secularized countries in Europe (Halman, 2001) with a sizable percentage of the population defining itself as atheist or ''freethinking'' (Voyé & Dobbelaere, 2001), religion often plays an important role in the lives of Muslim immigrants and their children (Bousetta & Jacobs, 2006; Bousetta & Maréchal, 2003).

The specific host society under study has been shown to have particular difficulties in accepting members of immigrant groups, and these issues are especially pronounced concerning immigrants of Muslim faith (Magnette, 2000). One piece of evidence that speaks to the magnitude of the issue comes from the continent-wide Eurobarometer survey, which found that Belgium had the greatest percentage of citizens who admitted that they were ''very racist'' (55%, the highest of all surveyed nations; Eurobarometer, 1997).

INDIRECT EFFECTS OF RELIGIOSITY ON ACCULTURATION TO THE HOST CULTURE: AN INTERGROUP RELATIONS PERSPECTIVE

Previous social psychological research among Muslim immigrants to Europe has shown reduced identification with the national identity and active disidentification with the host culture among those highly identified with their religion (Verkuyten & Yildiz, 2007). In a secular culture, immigrants' religious beliefs (often associated with the heritage culture; e.g., Bousetta & Maréchal, 2003) diverge from the norm, and some public policy and anthropological research has postulated that the perceived difference between the host and heritage cultures can lead to a sense of distance or separation from the host culture (e.g., Bousetta & Maréchal, 2003; Dittrich, 2003; Huntington, 1993; Leiken, 2005; Manço & Kanmaz, 2005; Parekh, 2006). Following from these previous findings, we contend that the link between religiosity and psychological acculturation to the host culture is both complex and indirect. Specifically, we hypothesized that religiosity at the level of the individual would be negatively related to acculturation to the host culture, through the intermediary variable of perceived cultural distance between the heritage and host cultures. Because this process is less related to stigmatization of a given religious group, we hypothesized that these effects should hold for both Muslim and non-Muslim participants.

In the current work, psychological acculturation refers to an individual's behaviors, values, attitudes, and identities in relation to a specific culture (e.g., Berry, 2006; Matsudaira, 2006; Ryder, Alden, & Paulhus, 2000). Acculturation is thought comprise two fundamental dimensions: attitudes and identities toward the host culture and attitudes and identities toward the heritage culture (cf. Berry, 2006; Ryder et al., 2000). The two dimensions, however, are independent. In the current investigation, we focus on psychological acculturation to the host culture (in which the participants reside). We did so for the following reasons. The first is that given the difficulties of immigrants (particularly Muslim immigrants) in transition and settling into their European host societies (e.g., Parekh, 2006), exploring the relationship between religiosity and acculturation to the host culture was the critical dimension. Moreover, acculturation to the host culture has been found to be particularly important in predicting important outcomes; in previous research, this construct has been shown to be associated with increased psychological well-being and occasionally better physical health among immigrants (e.g., Nguyen, Messe, & Stollak, 1999; Ryder et al., 2000; Sam, 2006; though there is some doubt about these relationships among Hispanic minorities in the United States and Asian minorities in

Anglophone countries; Hunt, Schneider, & Comer, 2004; Salant & Lauderdale, 2003).

INDIRECT EFFECTS OF RELIGIOSITY ON SELF-ESTEEM AND DEPRESSIVE SYMPTOMS: AN INTERGROUP RELATIONS PERSPECTIVE

Previous research, from a strictly individual perspective, suggests that personal religiosity is related, although modestly and not systematically, to indicators of better well-being such as higher self-esteem and lower depressive symptoms (George, Ellison, & Larson, 2002; Hill & Pargament, 2003; Salsman, Brown, Brechting, & Carlson, 2005; Smith, McCullough, & Poll, 2003). We argue here that the relations between religiosity and well-being among people born of immigration are more complex than previously thought and that the relationship depends on the cultural context of intergroup relations and the immigrant group's stigmatizated status.

Research on opinion-based groups and group-based emotions suggests that the more members of minority immigrant groups see themselves as religious, the more they are sensitive to group concerns (e.g., Ellemers, Spears, & Doosje, 2002; Hewstone, Ruben, & Willis, 2002; Turner, Hogg, Oakes, Reicher, & Wetherell, 1987). Given the somewhat tense intergroup situation between religious (particularly Muslim) immigrants and the host culture under study (Bousetta & Jacobs, 2006; Eurobarometer, 1997; Maréchal, 2003; Magnette, 2000; Manço & Manço, 2000), highly religious individuals are likely to perceive that the majority group does not tolerate or accept the religious beliefs that mark them as outsiders (cf. Verkuyten, 2007; Verkuyten & Yildiz, 2007). This is consistent with public policy and anthropological investigations (Bousetta & Jacobs, 2006; Bousetta & Maréchal, 2003; Ozyurek, 2005; Parekh, 2006), which also suggest negative relationships among immigrants to Europe between religious belief and perceptions that the host culture tolerates or accepts their religious beliefs.

Research on intergroup relations suggests that in situations where a group is stigmatized and/or relatively disadvantaged (as is arguably the case for Muslim immigrants in the host society under investigation; Bousetta & Maréchal, 2003; Manço & Kanmaz, 2005; Manço & Manço, 2000; Phalet & Swyngedouw, 2003), group identity is likely to be particularly salient (e.g., Turner et al., 1987; van Zomeren, Spears, & Leach, 2008). Under these conditions of relative deprivation, stigmatization, and salient group identity, both psychological research (e.g., Van Zomeren et al., 2008; Walker & Smith, 2002) and public policy research (e.g., Leiken, 2005) suggest anger as a likely correlate of beliefs (in this case, individual levels of religiosity) that help mark one as a member of a stigmatized outgroup.

Given the negative associations between anger and well-being (e.g., Kassinove, 1995), as well as those between social rejection and well-being (e.g., Leary, Twenge, & Quinlivan, 2006), we hypothesized that religious belief at the individual level would be associated with reduced levels of self-esteem and increased levels of depressive symptoms through the intervening variables of perceived religious tolerance and anger toward the host society. Given the role of stigma in the relationship between religiosity and perceived religious tolerance and anger, we predicted that these effects would hold only for stigmatized (vs. nonstigmatized) religious groups (Muslims as opposed to non-Muslims in this case).

SUMMARY OF RESEARCH HYPOTHESES

Based on the literature cited above, we contend that religiosity is viewed with suspicion in the secular country under study. For immigrants for whom religion is important, their religious beliefs, values, and practices are to some extent in conflict with the beliefs, values, and practices of the host culture. The gap between an immigrant's beliefs and those of the host society should lead to a perception of cultural distance between the heritage and host culture, which should in turn lead to reduced acculturation to the host culture. Thus, our first hypothesis of the current study was that religiosity would be indirectly negatively related to acculturation to the host culture through the intermediary variable of perceived cultural distance (e.g., seeing great distance between one's heritage and host cultures).

Our second hypothesis takes an intergroup relations perspective and proposes that religious immigrant groups should perceive conflict and experience feelings of anger based on their stigmatization and that this should have consequences for psychological well-being. Concretely, Hypothesis 2 states that religiosity would be indirectly negatively related to self-esteem, and indirectly positively related to depressive symptoms, through the intermediary variables of perceived religious tolerance and through anger toward the host society.

Intergroup relations research suggests that the degree of stigmatization a minority group experiences is likely to directly influence the extent to which holding beliefs that mark one as an outgroup member (in this case, religious beliefs) is associated with negative psychological outcomes. For these reasons, we predicted that the linear indirect associations between intrinsic religiosity and well-being would be present among more (vs. less) stigmatized groups (Muslims as opposed to non-Muslims in this case).

METHOD

Participants

Muslim participants were 273 self-identified Muslim individuals (127 men, 146 women, M age = 21.52, $SD = 7.59$).[1] Eighty-one percent of the participants were second-generation immigrants (born in Belgium but one or both parents born abroad), the others were first-generation immigrants (born abroad) who had lived in Belgium for an average of 12.42 years ($SD = 9.35$). Non-Muslim participants were 155 individuals (60 men, 94 women, 1 did not report gender; M age = 21.65, $SD = 9.37$). Sixty percent of the participants were second-generation immigrants; the rest were first-generation immigrants who had lived in Belgium for an average of 8.41 years ($SD = 5.87$). The non-Muslim participants primarily self-identified as Christian (Catholic, Protestant, Orthodox, or nondenominational; 73%); the rest did not ascribe to any specific religious tradition (27%).

The participants were recruited in the French-speaking parts of Belgium (Brussels and the Wallonia region) through local contacts, associations, and educational institutions. Participants received no compensation for their participation. The two groups of participants differed in terms of religious background but were similar in many other respects. For example, all participants were recruited from the same region in Belgium, and all were proficient in French, the language in which the current study was conducted. A comparison of participant ages between the groups revealed no significant difference, $t(430) = .08$, *ns*. In further evidence of the groups' overall similarities, the sociodemographic characteristics of the groups were largely the same. For example, most participants in both samples were students (73% of Muslim participants and 80% non-Muslim participants) and most were unmarried (80% of Muslim participants and 86% non-Muslim participants), which is what would be expected of individuals in the studied age range. Neither of these percentages differed across groups, $\chi^2(1) = 2.17$, *ns*, and $\chi^2(1) = .95$, *ns*, respectively.

Materials

Participants completed the following self-report measures in French language versions. When available, previously published French validations of the scales were used; for scales that had not been previously translated, back-translation techniques (e.g., Brislin, 1970) were used to produce the French language questionnaires. Unless otherwise indicated, all self-report measures were answered on 7-point Likert scales, from 1 (*strongly disagree*) to 7 (*strongly agree*). The study was presented as an investigation of attitudes and behaviors and the religiosity measures were completed at the end of the packet of questionnaires so as not to influence responses to the other scales.

Religiosity. Religiosity was measured with the intrinsic religiosity scale (Gorsuch & McPherson, 1989; eight items, $\alpha = .87$). This scale measures the extent to which individuals engage in religion for personal and spiritual reasons and consider religion as a central life motive. A sample item of the scale is, "My whole approach to life is based on my religion."

Although most previous research using examining this construct has been conducted on Christian or Jewish populations, recent empirical work has confirmed that this dimension of religiosity is applicable and meaningful to individuals of Muslim faith (e.g., Flere & Lavrič, 2007; Flere, Lavrič, Musil, & Klanjšek, 2007; Ghorbani et al., 2000, 2002; Ji & Ibrahim, 2007; Khan, Watson, & Habib, 2005; Watson et al., 2002). Before data collection began, the questionnaire was evaluated by a number of francophone Belgian Muslims who found the items appropriate and meaningful from their religious perspective.

Acculturation to the host culture. We used the 10-item measure of acculturation to the host culture ($\alpha = .81$) from the Vancouver Index of Acculturation (Ryder et al., 2000). The scale assesses aspects of acceptance of cultural attitudes and identities relative to a given culture. The scale was designed to tap various core aspects of cultural identity, such as participation in cultural traditions, social activities, values, and entertainment (e.g., movies and music) of the host culture. A sample item is, "It is important for me to maintain or develop the practices of the Belgian culture." The Vancouver Index of Acculturation has been found to be psychometrically reliable and to have consistent relationships with adjustment to one's host culture among both first- and second-generation immigrants (Ryder et al., 2000).

Perceived cultural distance. A three-item measure ($\alpha = .74$) was constructed to assess the idea of perceived distance between one's heritage culture and the culture of Western Europe. English translations of the items are as follows: "There are substantial differences between my heritage culture and the dominant culture of Western Europe"; "My heritage culture and the dominant culture of Western Europe are perfectly compatible" (reverse-scored); and "There is a large gap

[1]Because of the applied nature of this research project, the stigmatized religious group was deliberately oversampled.

between my heritage culture and the dominant culture of Western Europe.''

Perceived religious tolerance. A three-item scale ($\alpha = .75$) was created to measure perceptions of tolerance of one's religious beliefs by the host society at large. English translations of the items are as follows: ''I feel that my religious beliefs are tolerated by the Belgian society'' (reverse-scored); ''In Belgium, my religious beliefs are negatively perceived''; and ''Many Belgians have difficulty accepting people who share my religious beliefs.''

Feelings of anger towards the host society. A three-item measure was created to tap feelings of anger toward the host society ($\alpha = .74$). English translations of the items are as follows: ''At some level, I feel anger towards the Belgian society''; ''I am resentful of the Belgian society''; and ''I am very satisfied with the way the Belgian society is run and organized'' (reverse-scored).

Self-esteem. The validated French translation (Vallières & Vallerand, 1990) of the Rosenberg (1965) scale was administered ($\alpha = .81$). This scale measures global feelings of self-worth and was answered on a 4-point Likert scale from 1 (*strongly disagree*) to 4 (*strongly agree*). A representative item is, ''On the whole, I am satisfied with myself.''

Depressive symptoms. A short form version (Cole, Rabin, Smith, & Kaufman, 2004) of the Center for Epidemiologic Studies–Depression scale (Radloff, 1977) was used to measure levels of depressive symptoms ($\alpha = .77$). The 10 items that comprise this scale have been translated and validated in French (Fuhrer & Rouillon, 1989). Responses were made on a 4 point Likert scale from 1 (*rarely or none of the time*) to 4 (*most or all of the time*). A sample item is, ''During the past week, I felt my life had been a failure.''

RESULTS

Factor Congruence of Scales across Muslim and Non-Muslim Groups

To determine the factor congruence of the scales across the Muslim and non-Muslim groups, a Tucker's Phi congruence coefficient was conducted for each multi-item scale. The Tucker's Phi index is widely used in cultural and cross-cultural psychology to test whether the factor structure of a given scale is identical across cultures or groups (van de Vijver & Leung, 1997). Congruence coefficients equal to or greater than .85 (Haven & ten Berge, 1977; ten Berge, 1986; van de Vijver & Leung, 1997) or .90 (Barrett, 1986) indicate factorial equivalence. Principal components factor analyses within each group confirmed the appropriateness of a one-factor solution for each multi-item measure. The congruence of the unidimensional factor structures for measures were as follows: religiosity (.85), acculturation to the host culture (.99), perceived cultural distance (.99), perceived religious tolerance (.98), feelings of anger toward the host society (.99), self-esteem (.98), and depressive symptoms (.99), indicating that the factor structures of these scales were identical for the Muslim and non-Muslim groups.

Mean Level Differences

Table 1 presents the mean levels of the examined variables for Muslim and non-Muslim participants, along with tests of their mean-level differences (conducting these analyses controlling for gender yielded identical results). As between-group comparisons were not the focus of this investigation, they receive only a brief discussion.

Consistent with our perceptions of stigmatization of religious beliefs, Muslim participants reported significantly less perceptions that the host society tolerates their religious beliefs than did non-Muslims participants. Muslim participants evidenced higher levels of self-esteem and lower levels of depressive symptoms than did members of the non-Muslim group. This is consistent with past research on positive and negative self-feelings in stigmatized groups (e.g., Crocker & Major, 1989; Twenge & Crocker, 2002). However, there were no differences between the two groups in acculturation toward the host culture or in anger toward the host society. It may be that although more stigmatized than non-Muslim immigrants, Muslim immigrants still identify themselves as Belgians (if not more than non-Muslims; see Saroglou & Galand, 2004; Saroglou & Mathijsen, 2007) because they constitute a numerically significant and ethnically homogenous minority group within the Belgian society.

TABLE 1
Mean Levels of Variables Under Study

Variable	*Muslims*	*Non-Muslims*	*T*
Intrinsic religiosity	41.25 (10.87)	30.51 (11.03)	9.64***
Perceived cultural distance	14.42 (3.86)	12.58 (5.02)	4.29***
Acculturation to host culture	46.24 (10.22)	46.26 (9.53)	−0.01
Anger toward host society	8.81 (4.02)	9.01 (3.95)	−0.50
Perceived religious tolerance	11.83 (3.99)	17.65 (3.62)	−13.59***
Self-esteem	33.38 (4.92)	32.06 (5.15)	2.61**
Depressive symptoms	18.02 (5.09)	19.81 (5.23)	−3.43**

Note. The ranges of these scales are as follows: Acculturation to host culture (7–70), perceived cultural distance (3–21), self-esteem (4–40), depressive symptoms (4–40), anger towards host culture (3–21), perceived religious tolerance (3–21), intrinsic religiosity (8–56). Standard deviations are displayed in parentheses.

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

Correlational Analysis

Table 2 presents the intercorrelations among the variables for the Muslim and non-Muslim groups, respectively (conducting these analyses controlling for gender yielded virtually identical results). Many significant correlations were in line with the idea that difficulties in the acculturation process (e.g., low acculturation to the host society and anger toward the host society) are negatively related to well-being (higher depressive symptoms and/or lower self-esteem). Religiosity was not directly related to the indicators of well-being. Of importance, there was no indication of multicollinearity, a necessary condition for conducting the analyses of the indirect effects of religiosity on acculturation to the host culture, self-esteem, and depressive symptoms.

Indirect Effects of Religiosity on Acculturation to the Host Society, Self-Esteem and Depressive Symptoms

Tests of simple and multiple indirect effects were undertaken even when the independent variable (i.e., religiosity) was not independently related to the dependent variables of interest. Recent statistical thinking supports this practice because (a) it results in increased power to detect intervening variable effects and (b) if suppression is present or the indirect effect is distal (as in nonexperimental studies), no direct effect should be expected, even though the indirect effect is present and real (Preacher & Hayes, 2004; Shrout & Bolger, 2002). Testing indirect effects in the current study is particularly appropriate because they are likely to be of weak to medium size, to be distal in nature (hence the term "indirect"), and to unfold over time.

Bootstrapping was used to test indirect effects. This type of analysis is appropriate because using normal theory (e.g., Sobel's z test) assumes that the distribution of indirect effects in the data is normal, which is often not the case (MacKinnon, Lockwood, Hoffman, West, & Sheets, 2002; Preacher & Hayes, 2004; Shrout & Bolger, 2002). In the current article, we refer to our analyses as testing indirect effects (not implying a direct independent variable–dependent variable link; cf. Preacher & Hayes, 2004), and test these effects using the bootstrapping method described by Preacher and Hayes (2004), with 5,000 bootstrap samples per analysis.

Hypothesis 1 (an indirect effect of religiosity on acculturation to the host culture through the intermediary variable of perceived cultural distance) was first tested in the stigmatized religious group (i.e., the Muslim sample). As predicted, there was a significant negative indirect effect of religiosity through the perception of cultural distance on acculturation to the host society, $M = -.05$, $SE = .02$, 95% confidence interval (CI) [−.09; −.01], see Figure 1. Among Muslim participants, greater levels of religiosity were associated with an increased perception of cultural distance between one's heritage culture and the culture of Western Europe, which was in turn associated with a decreased level of psychological acculturation to the host culture.

The second analysis tested Hypothesis 1 in the nonstigmatized religious group (i.e., the non-Muslim sample). The negative indirect effect of religiosity on acculturation to the host culture through the intervening variable of perception of cultural distance between one's heritage culture and the Western European culture was significant, $M = -.06$, $SE = .03$, 95% CI [−.13; −.01], see Figure 2. As in the Muslim sample, increased levels of religiosity were associated with increased perceptions

TABLE 2
Correlations Among Variables Under Study, Muslim and Non-Muslim Groups

	1	2	3	4	5	6	7
1. Intrinsic religiosity		.18**	−.23**	.21**	−.21**	−.05	.10
2. Perceived cultural distance	.32**		−.34**	.09	.01	−.10+	.11+
3. Acculturation to host culture	−.02	−.17*		−.12*	.16**	.13*	−.21**
4. Anger toward host society	.04	.14+	−.23**		−.28**	−.22**	.26**
5. Perceived religious tolerance	−.31**	−.15	−.03	−.10		.20**	−.19**
6. Self-esteem	.04	−.20**	.18*	−.23**	.15		−.60**
7. Depressive symptoms	.04	.11	−.09	.18*	−.13	−.57**	

Note. Above the diagonal: Muslims; below the diagonal: non-Muslims.

+$p < .10$. *$p < .05$. **$p < .01$.

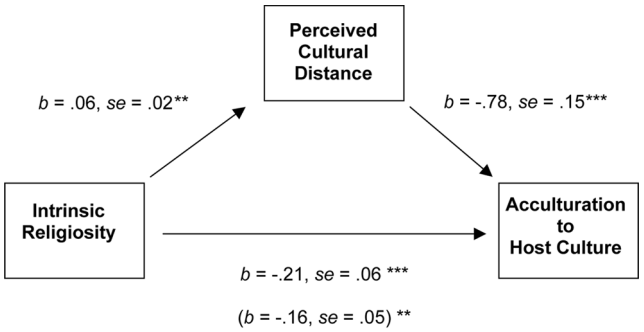

FIGURE 1 The indirect effect of intrinsic religiosity on psychological acculturation to the host culture through perceived cultural distance, stigmatized religious group. *Note*: The beta in parentheses is the relation between intrinsic religiosity and acculturation to the host culture, controlling for perceived cultural distance. The betas displayed in this figure are unstandardized. *$p < .05$. **$p < .01$. ***$p < .001$.

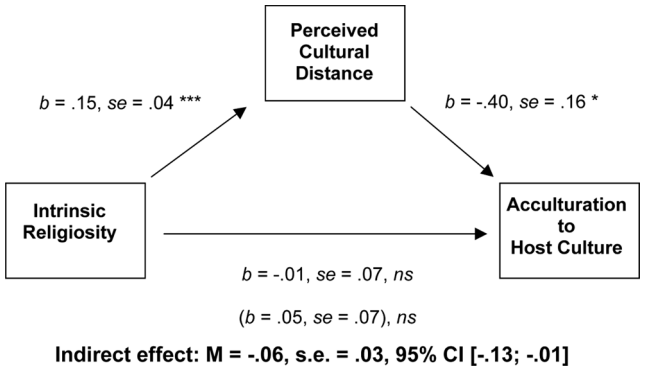

FIGURE 2 The indirect effect of intrinsic religiosity on psychological acculturation to the host culture through perceived cultural distance, non-stigmatized religious group. *Note*. The beta in parentheses is the relation between intrinsic religiosity and acculturation to the host culture, controlling for perceived cultural distance. The betas displayed in this figure are unstandardized. $^{*}p < .05$. $^{**}p < .01$. $^{***}p < .001$.

of cultural distance, which in turn were associated with reduced psychological acculturation to the host culture.

Hypothesis 2 stated that religiosity would be indirectly related to self-esteem and depressive symptoms, respectively, through the intervening variables of perceived religious tolerance and feelings of anger toward the host society. These effects should be more evident for the stigmatized, as opposed to the nonstigmatized, religious group.

The following statistical analyses tested the indirect effects of both intervening variables in the same model, such that the effect of religiosity through the intervening variable of perceived tolerance controlled for feelings of anger (and vice versa). Examining multiple indirect effects in a single analysis provides a more precise and parsimonious test of our hypotheses, and a more comprehensive picture of the psychological processes under study (cf. Preacher & Hayes, 2008).

Hypothesis 2 was first tested in the stigmatized religious group. The intervening variable model investigating self-esteem as an outcome revealed a significant negative total indirect effect of religiosity, through the intervening variables of perceived religious tolerance and feelings of anger toward the host society, $M = .03$, $SE = .01$, 95% CI [−.05; −.01], see Figure 3. The individual indirect effects of both perceived religious tolerance, $M = -.01$, $SE = .01$, 95% CI [−.03, −.002] and feelings of anger toward the host society, $M = -.02$, $SE = .01$, 95% CI = [−.03, −.01] were significant; these effects were not significantly different from one another, pairwise contrast = −.004, $SE = .01$, 95% CI [−.02; .02]. Greater levels of religiosity were associated with decreased perceptions of tolerance of one's religious beliefs and increased feelings of anger toward the host society. In turn, perceived religious tolerance was positively related to self-esteem and feelings of anger were negatively related to self-esteem.

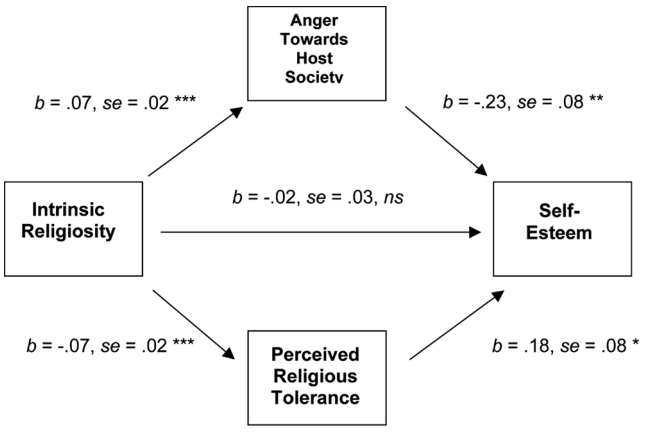

FIGURE 3 The indirect effect of intrinsic religiosity on self-esteem through perceived religious tolerance and feelings of anger towards the host society, stigmatized religious group. *Note*. The beta in the center of the figure is the relation between intrinsic religiosity and self-esteem, controlling for perceived religious tolerance and feelings of anger toward the host society. The betas displayed in this figure are unstandardized. $^{*}p < .05$. $^{**}p < .01$. $^{***}p < .001$.

The intervening variable model evaluating depressive symptoms revealed a significant positive total indirect effect of religiosity on levels of depressive symptoms through the intervening mechanisms of perceived religious tolerance and feelings of anger toward the host society, $M = .04$, $SE = .01$, 95% CI [.02; .06], see Figure 4. The individual indirect effects of both perceived religious tolerance, $M = .01$, $SE = .01$, 95% CI [.002, .03], and feelings of anger toward the host society,

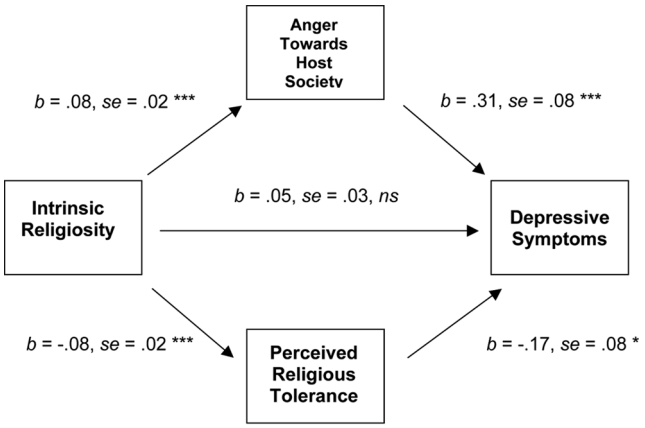

FIGURE 4 The indirect effect of intrinsic religiosity on depressive symptoms through perceived religious tolerance and feelings of anger toward the host society, stigmatized religious group. *Note*. The beta in the center of the figure is the relation between intrinsic religiosity and depressive symptoms, controlling for perceived religious tolerance and feelings of anger toward the host society. The betas displayed in this figure are unstandardized. $^{*}p < .05$. $^{**}p < .01$. $^{***}p < .001$.

$M = .01$, $SE = .01$, 95% CI = [.01, .05], were significant; these effects were not significantly different from one another, pairwise contrast = −.01, $SE = .01$, 95% CI [−.04; 01]. Greater levels of religiosity were associated with decreased perceptions of tolerance of one's religious beliefs and increased feelings of anger toward the host society. In turn, perceived religious tolerance was negatively related to depressive symptoms and feelings of anger were positively related to depressive symptoms.

In the non-Muslim sample, the two aforementioned models could not be evaluated because the assumptions needed to run them could not be met. Religiosity was not independently related to feelings of anger toward the host society. Furthermore, perceived religious tolerance was not related to self-esteem or depression. These findings support our prediction that the models investigating well-being would be more consistent for the stigmatized, as opposed to nonstigmatized, religious group.

DISCUSSION

This article tested two theoretically derived hypotheses regarding indirect associations of religiosity and psychological outcomes among immigrants to Europe. We specifically hypothesized that religiosity would be indirectly associated with reduced psychological acculturation to the host culture through the intervening variable of a perceived cultural gap between the heritage and Western European cultures. This hypothesis received empirical support. This pattern of associations was found among both stigmatized and nonstigmatized religious immigrant groups. This is consistent with the notion, derived from intergroup relations research and theory, that religious beliefs which mark one as an outgroup member are associated with the perception of distance between home and host cultures, which is in turn associated with reduced feelings of identities related to the host society.

We also hypothesized indirect effects of religiosity on self-esteem and depressive symptoms through the intervening variables of perceived tolerance of one's religious beliefs and feelings of anger toward the host society. Among Muslim participants, who we argue face significant stigmatization in the host culture under study (and who indeed perceived that their religious beliefs were less tolerated than did non-Muslim participants), religiosity was associated with decreased self-esteem and increased depressive symptoms through the intervening variables of perceived religious tolerance and feelings of anger toward the host culture. No such effects were found for non-Muslim participants.

It is worthwhile to note that, without examining indirect effects in the current work, one would erroneously conclude that there is no relationship between religiosity and acculturation to the host culture in the nonstigmatized group and no relationship between religiosity and well-being in the stigmatized group. However, the emerging consensus from the methodological literature is that lack of significant direct relationships need not indicate a lack of indirect effects among measured variables (e.g., Hayes, 2009; Preacher & Hayes, 2004, 2008; Shrout & Bolger, 2002). The current work shows how the hypothesizing and testing of indirect effects, even in the absence of an overall direct relationship between an independent variable and an outcome measure, can yield empirically valid and theoretically meaningful findings.

One strength of the current research is that it demonstrates specific pathways through which religiosity is associated with reduced acculturation to the host culture among immigrants to a secular European country. Some research in the United States, a country whose contemporary approach to religion and immigration greatly differs from Europe, suggests that among U.S.-born minorities (e.g., African Americans, Latinos, Asian Americans), denominational affiliation or religiosity can be associated with reduced psychological acculturation to the American culture (Cavalcanti & Schleef, 2005; Ghorpade, Lackritz, & Singh, 2004, 2006). However, none of these studies outlined the specific mechanisms through which religious beliefs are associated with reduced acculturation and the theoretical interpretation of these previous findings is thus currently unclear. The results of the present study, conducted in a very different cultural context, suggest a specific psychological construct that helps explain this relationship. The delineation of a specific intermediary variable between levels of religiosity and acculturation to the host society is important because it goes beyond simple correlational analyses reported in previous research.

The indirect relationships between religiosity and self-esteem and depression run counter to what has been found among Christian individuals in the United States (in which research sometimes shows positive relationships between religiosity and well-being; George et al., 2002; Hill & Pargament, 2003; Salsman et al., 2005; Smith et al., 2003), and counter to what has sometimes been found among Muslim individuals in Muslim countries (showing positive relationships between religiosity and happiness; Abdel-Khalek, 2006; Abdel-Khalek & Lester, 2007; Abdel-Khalek & Naceur, 2007; Suhail & Chaudhry, 2004). Furthermore, a study of immigrants to the United States found that church attendance was negatively related to depressive symptoms and frequency of prayer was positively related to well-being (Harker, 2001), and a study reporting qualitative interviews with Somali Muslim immigrants to the United Kingdom suggests that religion can help religious

immigrants cope with difficult circumstances (Whittaker, Hardy, Lewis & Buchan, 2005). The findings from the current research suggest that the relationship between religiosity and well-being is more complicated than previously thought, at least when examining specific immigrant groups that experience multiple cultural pressures. Indeed, our findings indicate that members of a stigmatized group in a secular society can experience strained intergroup relations and intergroup feelings, which are further associated with decreased self-esteem and increased depressive symptoms. This suggests that previous findings linking religiosity with increased self-esteem, happiness, and decreased levels of depressive symptoms are more context dependent than has previously been thought. A main conclusion from this work is that the cultural and intergroup context can play a role in how religiosity relates to important psychological outcomes.

An additional strength of this research is that we examined religiosity, acculturation, and well-being among first- and second-generation immigrants in a European cultural context. This kind of population and research setting are relevant for applied psychological research, but they also enable one to study important psychological theories in situations where they are likely to be highly relevant. The findings presented here add an interesting dimension to the body of intergroup relations literature by showing how levels of religiosity can predict intergroup phenomena (e.g., perceptions of distance between heritage and host cultures) as well as individual levels of self-esteem and depressive symptoms.

It is important to note that the measurement of acculturation is not viewed with unanimity among acculturation researchers. Because our study sought to examine religiosity and acculturation to the host culture, and because research has suggested that acculturation to the host culture and to the heritage culture can be independent (Khang, 2006; Ryder et al., 2000), we chose to employ the Vancouver Acculturation Index (Ryder et al., 2000), a psychometrically sound measure that has demonstrated orthogonality between attitudes, behaviors, and identities toward heritage and host cultures, and that provides a valid measure of acculturation to the host culture. However, other acculturation psychologists distinguish among four different acculturation strategies (integration, assimilation, separation, and marginalization; e.g., Berry, Trimble, & Olmedo, 1986). These dimensions are derived by dichotomizing the Host and Heritage subscales and classifying each participant into a single acculturation strategy (e.g., assimilation is defined by being high in acculturation to the host culture and low in acculturation to the heritage culture), or by measuring each of the four dimensions using separate scales (Ward, 2001). For detailed discussions of the relative merits and weaknesses of these measurement approaches, see Khang (2006); Ryder et al. (2000); Ward (2001); and Ward, Bochner, and Furnham (2001). Future research could perhaps fruitfully examine the relationship between religiosity and the four specific acculturation strategies.

This work is not without its limitations. As previously noted, a main goal of this study was to examine relationships among religiosity and acculturation to the host culture in an actual intergroup immigrant setting in Europe. Although this permits researchers to examine a unique population and to investigate issues that are difficult to study experimentally, it results in the same weakness shared by all correlational research, namely, the inability to determine causality. Another limitation is that, although our measure of religiosity is widely used and provides a solid understanding of the strength of one's religious beliefs, it does not measure group identification per se. However, as shown in large cross-cultural studies, measures of religious beliefs, practices, and religious affiliation and identification are highly interrelated (Voas, 2007). More important, we contend and our results suggest that it is neither group membership nor identification nor religious beliefs individually that are associated with reduced acculturation to the host culture, decreased self-esteem, and increased levels of depressive symptoms. Rather, it is the combination of group membership and specific religious beliefs in a societal context that is hostile to those beliefs that is associated with these outcomes among immigrants.

In conclusion, this research shows indirect links between religiosity and reduced acculturation to the host society, and links between religiosity and self-esteem and depressive symptoms among members of a stigmatized religious group. Although these results add to the literature on intergroup relations and the psychology of religion, these two research domains provide a crucial framework to interpret the results. These theories suggest that there is nothing inherently negative or detrimental about religious beliefs per se. Rather, it is the combination of deeply held beliefs and an intergroup context that is somewhat in opposition to these beliefs that is associated with negative psychological outcomes. Thus, these findings are congruent with one of the central messages of basic and applied social psychology: that interactions between social situations and individual beliefs, attitudes, and opinions play an important part in shaping thought, behavior, and well-being.

ACKNOWLEDGMENTS

This research was funded by the Scientific Research Fund at the Université catholique de Louvain. We thank Sébastien Billion, Jamila El Hichou, Khadija

Ben Moulay, and Ikram Tahere for their assistance with this research.

REFERENCES

Abdel-Khalek, A. M. (2006). Happiness, health, and religiosity: Significant relations. *Mental Health, Religion & Culture*, *9*, 85–97.

Abdel-Khalek, A. M., & Lester, D. (2007). Religiosity, health, and psychopathology in two cultures: Kuwait and USA. *Mental Health, Religion & Culture*, *10*, 537–550.

Abdel-Khalek, A. M., & Naceur, F. (2007). Religiosity and its association with positive and negative emotions among college students from Algeria. *Mental Health, Religion & Culture*, *10*, 159–170.

Barrett, P. (1986). Factor comparison: An examination of three methods. *Personality and Individual Differences*, *7*, 327–340.

Berry, J. W. (2006). Contexts of acculturation. In D. S. Sam & J. W. Berry (Eds.), *Acculturation psychology* (pp. 27–42). Cambridge, UK: Cambridge University Press.

Berry, J. W., Trimble, J., & Olmedo, E. (1986). Assessment of acculturation. In W. J. Lonner & J. W. Berry (Eds.), *Field methods in cross-cultural research* (pp. 291–349). Newbury Park, CA: Sage.

Bousetta, H., & Jacobs, D. (2006). Multiculturalism, citizenship and Islam in problematic encounters in Belgium. In T. Modood, A. Triandafyllidou, & R. Zapata-Barrero (Eds.), *Multiculturalism, Muslims and citizenship: A European approach* (pp. 23–36). Abingdon, UK: Routledge.

Bousetta, H., & Maréchal, B. (2003). *L'islam et les musulmans en Belgique: Enjeux locaux et cadres de réflexion globaux*. [Islam and Muslims in Belgium: Local issues and a framework for global reflection]. Brussels, Belgium: Fondation Roi Baudouin.

Brislin, R. W. (1970). Back-translation for cross-cultural research. *Journal of Cross-Cultural Psychology*, *1*, 185–216.

Cavalcanti, H. B., & Schleef, D. (2005). The case for secular assimilation? The Latino experience in Richmond, Virginia. *Journal for the Scientific Study of Religion*, *44*, 473–483.

Cole, J. C., Rabin, A. S., Smith, T. L., & Kaufman, A. S. (2004). Development and validation of a Rasch-derived CES-D short form. *Psychological Assessment*, *16*, 360–372.

Crocker, J., & Major, B. M. (1989). Social stigma and self-esteem: The self-protective properties of stigma. *Psychological Review*, *96*, 608–630.

Dittrich, M. (2003). *What perspectives for Islam and Muslims in Europe?* Brussels, Belgium: Fondation Roi Baudouin.

Ellemers, N., Spears, R., & Doosje, B. (2002). Self and social identity. *Annual Review of Psychology*, *53*, 161–186.

Eurobarometer 113. (1997, December). *Racism and xenophobia in Europe*. Retrieved from http://ec.europa.eu/public_opinion/archives/ebs/ebs_113_en.pdf

Flere, S. J., & Lavrič, M. (2007). Is intrinsic religious orientation a culturally specific American Protestant concept? The fusion of intrinsic and extrinsic religious orientation among non-Protestants. *European Journal of Social Psychology*, *38*, 521–530.

Flere, S. Lavrič, M., Musil, M., & Klanjšek, R. (2007). Religious sentiment as peripheral: A cross-cultural study of religious orientation by multidimensional scaling. *Europe's Journal of Psychology*. Retrieved from http://www.ejop.org/archives/2007/05/religious_senti.html

Fuhrer, R., & Rouillon, F. (1989). *La version française de l'échelle CES-D* (Center for Epidemiologic Studies-Depression Scale). *Description et traduction de l'échelle d'autoévaluation* [French version of the CESD scale. Description and translation of the self-report scale]. *Psychiatrie et Psychobiologie*, *4*, 163–166.

George, L. K., Ellison, C. G., & Larson, D. B. (2002). Explaining the relationships between religious involvement and health. *Psychological Inquiry*, *3*, 190–200.

Ghorbani, N., Watson, P. J., Ghramaleki, A. F., Morris, R. J., & Hood, R. W. (2000). Muslim attitudes towards religion scale: Factors, validity and complexity of relationships with mental health in Iran. *Mental Health, Religion, & Culture*, *3*, 125–132.

Ghorbani, N., Watson, P. J., Ghramaleki, A. F., Morris, R. J., & Hood, R. W. (2002). Muslim–Christian religious orientation scales: Distinctions, correlations, and cross-cultural analysis in Iran and the United States. *The International Journal for the Psychology of Religion*, *12*, 69–91.

Ghorpade, J., Lackritz, J. R., & Singh, G. (2004). Psychological acculturation of ethnic minorities into white anglo-American culture: Consequences and predictors. *Journal of Applied Social Psychology*, *34*, 1208–1228.

Ghorpade, J., Lackritz, J. R., & Singh, G. (2006). Intrinsic religious orientation among minorities in the United States: A research note. *The International Journal for the Psychology of Religion*, *16*, 51–62.

Gorsuch, R. L., & McPherson, S. E. (1989). Intrinsic/extrinsic measurement: I/E-revised and single-item scales. *Journal for the Scientific Study of Religion*, *28*, 348–354.

Halman, L. (2001). *The European values study, a third wave: Source book of the 1999/2000 European values study surveys*. Tilburg, the Netherlands: Tilburg University.

Harker, K. (2001). Immigrant generation, assimilation, and adolescent psychological well-being. *Social Forces*, *79*, 969–1004.

Haven, S., & ten Berge, J. M. F. (1977). *Tucker's coefficient of congruence as a measure of factorial invariance: An empirical study* (Geymans Bulletin No. 290 EX). Groningen, the Netherlands: University of Groningen.

Hayes, A. F. (2009). Beyond Baron and Kenny: Statistical mediation analysis in the new millennium. *Communication Monographs*, *76*, 408–420.

Hewstone, M., Rubin, M., & Willis, H. (2002). Intergroup bias. *Annual Review of Psychology*, *53*, 575–604.

Hill, P. C., & Pargament, K. I. (2003). Advances in the conceptualization and measurement of religion and spirituality: Implications for physical and mental health research. *American Psychologist*, *58*, 64–74.

Hunt, L. M., Schneider, S., & Comer, B. (2004). Should "acculturation be a variable in health research? A critical review of research on US Hispanics. *Social Science & Medicine*, *59*, 973–986.

Huntington, S. P. (1993). The clash of civilizations? *Foreign Affairs*, *72*, 22–49.

Ji, C. C., & Ibrahim, Y. (2007). Islamic doctrinal orthodoxy and religious orientations: Scale development and validation. *International Journal for the Psychology of Religion*, *17*, 189–208.

Kassinove, H. (1995). *Anger disorders: Definition, diagnosis, and treatment*. Washington, DC: Taylor & Francis.

Khan, Z. H., Watson, P. J., & Habib, F. (2005). Muslim attitudes toward religion, religious orientation and empathy among Pakistanis. *Mental Health, Religion & Culture*, *8*, 49–61.

Khang, S. M. (2006). Measurement of acculturation, scale formats, and language competence: Their implications for adjustment. *Journal of Cross-Cultural Psychology*, *37*, 669–693.

Koenig, H. G., McCullough, M. E., & Larson, D. B. (2000). *Handbook of religion and health*. Oxford, UK: Oxford University Press.

Leary, M. R., Twenge, J. M., & Quinlivan, E. (2006). Interpersonal rejection as a determinant of anger and aggression. *Personality and Social Psychology Review*, *10*, 111–132.

Leiken, R. S. (2005). Europe's angry Muslims. *Foreign Affairs*, *84*, 120–135.

MacKinnon, D. P., Lockwood, C. M., Hoffman, J. M., West, S. G., & Sheets, V. (2002). A comparison of methods to test mediation and other intervening variable effects. *Psychological Methods*, *7*, 83–104.

Magnette, P. (2000). Racism and the Belgian State. *Les Cahiers du Cevipol*, 1. Retrieved from http://dev.ulb.ac.be/cevipol/dossiers_fichiers/cahier00-1.pdf

Manço, U., & Kanmaz, M. (2005). From conflict to co-operation between Muslims and local authorities in a Brussels borough: Schaerbeek. *Journal of Ethnic and Migration Studies*, *31*, 1105–1123.

Manço, U., & Manço, A. (2000). *Voix et voies musulmanes de Belgique* [The voices and paths of Muslims in Belgium]. Brussels, Belgium: Publications des Facultés universitaires Saint-Louis.

Maréchal, B. (2003). The question of belonging. In B. Maréchal, S. Allievi, F. Dassetto, & J. Nielsen (Eds.), *Muslims in the enlarged Europe* (pp. 1–18). Leiden, the Netherlands: Brill.

Matsudaira, T. (2006). Measures of psychological acculturation: A review. *Transcultural Psychiatry*, *43*, 462–487.

Nguyen, H. H., Messe, L. A., & Stollak, G. E. (1999). Toward a more complex understanding of acculturation and adjustment: Cultural involvement and psychosocial functioning in Vietnamese youth. *Journal of Cross-Cultural Psychology*, *30*, 5–31.

Ozyurek, E. (2005). The politics of cultural unification, secularism, and the place of Islam in the new Europe. *American Ethnologist*, *32*, 509–512.

Paloutzian, R. F., & Park, C. L. (Eds.). (2005). *Handbook of the psychology of religion and spirituality*. New York: Guilford.

Parekh, B. (2006). Europe, liberalism and the "Muslim question." In T. Modood, A. Triandafyllidou, & R. Zapata-Barrero (Eds.), *Multiculturalism, Muslims and citizenship: A European approach* (pp. 178–203). Abingdon, UK: Routledge.

Phalet, K., & Swyngedouw, M. (2003). Measuring immigrant integration: The case of Belgium. *Migration Studies*, *152*, 773–803.

Preacher, K. J., & Hayes, A. F. (2004). SPSS and SAS procedures for estimating indirect effects in simple mediation models. *Behavior Research Methods, Instruments and Computers*, *36*, 717–731.

Preacher, K. J., & Hayes, A. F. (2008). Asymptotic and resampling strategies for assessing and comparing indirect effects in multiple mediator models. *Behavior Research Methods*, *40*, 879–891.

Radloff, L. S. (1977). The CES-D scale: A self-report depression scale for research in the general population. *Applied Psychological Measurement*, *1*, 385–401.

Rosenberg, M. (1965). *Society and the adolescent self-image*. Princeton, NJ: Princeton University Press.

Ryder, A. G., Alden, L. A., & Paulhus, D. L. (2000). Is acculturation unidimensional or bidimensional?: A head-to-head comparison in the prediction of personality, self-identity, and adjustment. *Journal of Personality and Social Psychology*, *79*, 49–65.

Salant, T., & Lauderdale, D. S. (2003). Measuring culture: A critical review of acculturation and health in Asian immigrant populations. *Social Science & Medicine*, *57*, 71–90.

Salsman, J. M., Brown, T. L., Brechting, E. H., & Carlson, C. R. (2005). The link between religion and spirituality and psychological adjustment: The mediating role of optimism and social support. *Personality and Social Psychology Bulletin*, *31*, 522–535.

Sam, D. S. (2006). Acculturation: Conceptual background and core components. In D. S. Sam & J. W. Berry (Eds.), *Acculturation psychology* (pp. 11–26). Cambridge, UK: Cambridge University Press.

Saroglou, V., & Galand, P. (2004). Identities, values, and religion: A study among Muslim, other immigrant, and native Belgian young adults after the 9/11 attacks. *Identity: An International Journal of Theory and Research*, *4*, 97–132.

Saroglou, V., & Mathijsen, F. (2007). Religion, multiple identities, and acculturation: A study of Muslim immigrants in Belgium. *Archive for the Psychology of Religion*, *29*, 177–198.

Shrout, P. E., & Bolger, N. (2002). Mediation in experimental and nonexperimental studies: New procedures and recommendations. *Psychological Methods*, *7*, 422–445.

Smith, T. B., McCullough, M. E., & Poll, J. (2003). Religiousness and depression: Evidence for a main effect and the moderating influence of stressful life events. *Psychological Bulletin*, *129*, 614–636.

Spilka, B., Hood, R. W., Hunsberger, B., & Gorsuch, R. (2003). *The psychology of religion: An empirical approach* (3rd ed.). New York: Guilford.

Suhail, K., & Chaudhry, H. R. (2004). Predictors of subjective well-being in an Eastern Muslim culture. *Journal of Social and Clinical Psychology*, *23*, 359–376.

ten Berge, J. M. F. (1986). Some relationships between descriptive comparisons of components from different studies. *Multivariate Behavioral Research*, *21*, 29–40.

Turner, J. C., Hogg, M. A., Oakes, P. J., Reicher, S. D., & Wetherell, M. S. (1987). *Rediscovering the social group: A self-categorization theory*. New York: Blackwell.

Twenge, J. M., & Crocker, J. (2002). Race and self-esteem: Meta-analyses comparing Whites, Blacks, Hispanics, Asians, and American Indians. *Psychological Bulletin*, *128*, 371–408.

Vallières, E. F., & Vallerand, R. J. (1990). Traduction et validation canadienne-française de L'Échelle de l'Estime de Soi de Rosenberg. [Translation and validation in Canadian French of the Rosenberg self-esteem scale]. *Journal International de Psychologie*, *25*, 305–316.

van de Vijver, F. J. R., & Leung, K. (1997). *Methods and data analysis for cross-cultural research*. Thousand Oaks, CA: Sage.

van Zomeren, M., Spears, R., & Leach, C. W. (2008). Exploring psychological mechanisms of collective action: Does relevance of group identity influence how people cope with collective disadvantage? *British Journal of Social Psychology*, *47*, 353–372.

Verkuyten, M. (2007). Religious group identification and inter-religious relations: A study among Turkish-Dutch Muslims. *Group Processes and Intergroup Relations*, *10*, 341–357.

Verkuyten, M., & Yildiz, A. A. (2007). National (dis)identification, and ethnic and religious identity: A study among Turkish-Dutch Muslims. *Personality and Social Psychology Bulletin*, *33*, 1448–1462.

Voas, D. (2007). Surveys of behaviour, beliefs and affiliation: Micro-quantitative. In J. A. Beckford & N. J. Demerath, III (Eds.), *The SAGE handbook of the sociology of religion* (pp. 144–166). London: Sage.

Voyé, L., & Dobbelaere, K. (2001). De la religion: Ambivalences et distancements. [Ambivalence and distancing from religion]. In B. Bawin-Legros, L. Voyé, K. Dobbelaere, & M. Elchardus (Eds.), *Belge toujours: Fidélité, stabilité, tolérance. Les valeurs des Belges en l'an 2000* (pp. 143–175). Brussels, Belgium: De Boeck Université.

Walker, I., & Smith, H. J. (2002). *Relative deprivation: Specification, development, and integration*. Cambridge, UK: Cambridge University Press.

Ward, C. (2001). The ABCs of acculturation. In D. Matsumoto (Ed.), *Handbook of culture and psychology* (pp. 411–445). New York: Oxford University Press.

Ward, C., Bochner, S., & Furnham, A. (2001). *The psychology of culture shock* (2nd ed.). London: Routledge.

Watson, P. J., Ghorbani, N., Davison, H. K., Bing, M. N., Hood, R. W., & Ghramaleki, A. F. (2002). Negatively reinforcing personal extrinsic motivations: Religious orientation, inner awareness, and mental health in Iran and the United States. *International Journal for the Psychology of Religion*, *12*, 255–276.

Whittaker, S., Hardy, G., Lewis, K., & Buchan, L. (2005). An exploration of psychological well-being with young Somali refugee and asylum-seeker women. *Clinical Child Psychology and Psychiatry*, *10*, 177–196.