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Intercultural contact, knowledge of Islam, and prejudice against muslims in Australia

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ABSTRACT

This article empirically investigates the relationship between intercultural contact, factual and self-reported knowledge of Islam, and prejudice against Muslims in Australia. We propose an original measure of factual knowledge of Islam, based on the measurement of political sophistication, used alongside more established measures of intercultural contact and self-reported knowledge. The results show that possessing more knowledge about Islam and having more contact with Muslims is associated with less prejudice against Muslims regardless of whether an individual identifies or not with conservative parties (such as the Liberal–National coalition), whether they are older or younger, female or male, or more or less educated or religious. Moreover, factual knowledge and self-reported knowledge are found to have different effects on prejudice: whereas factual knowledge is associated with less prejudice, self-reported knowledge tends to be associated with more prejudice. Subsequently, we use mediation analysis to clarify the empirical and theoretical relationships between intercultural contact, factual knowledge, and prejudice against Muslims.

Introduction

In the current global environment of heightened risk of conflicts, refugee flows, and economic insecurities, intercultural relations seem under more pressure than ever before (Mansouri, 2015). Nothing captures intercultural tensions and other contemporary social anxieties, and their attendant moral panics, better than the rising fear of Islam and Muslims, no longer confined to right-wing groups (Lee et al., 2009; Bleich, 2011). This fear has been consistently on the rise since the September 11 attacks of 2001 (Vertigans, 2010). Islamophobia, the unfounded hostility towards and fear of Islam and Muslims (Allen, 2010), is therefore a crucial point of debate in many multicultural democracies.

Various factors may explain the rising hostility towards Muslims, in particular those living in the West. The political context undoubtedly matters (Said, 1978; Mansouri et al., 2015). Indeed, academic research (Werbner, 2005) and opinion polls have shown that the growing anxiety about terrorism related to the so-called 'Islamic State', as well as the asylum seeker crises that followed the instability in the Middle East and North Africa, amplified concerns about Muslims in Europe, North America, and Australia (see, for example, Chalabi, 2015; Hassan, 2015; Booth, 2016; Vergani & Tacchi, 2016). These concerns have triggered intergroup anxiety (Hopkins & Shook, 2017) and increased perceived threat (Vedder et al., 2016), which have been found to be associated with prejudice against Muslims, especially in contexts where Muslims are conflated with immigrants by the majority.

Out-group knowledge is one of the most consistent individual-level predictors of negative attitudes towards other religious and

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ethnic groups across different country contexts (see Allport, 1954; Pettigrew and Tropp, 2008; Meeusen et al., 2013; Czerwionka et al., 2015). Recent research suggests that corrective factual information about Islam may cause a positive shift in the ratings of Islam, especially among those who initially viewed Islam more negatively than they did Judaism and Christianity (Moritz, Göritz, Kühn, Brooke, Krieger, Röhlinger, & Zimmerer, 2017). In this article, we extend this line of research by looking at the relationships between prejudice against Muslims and different types of knowledge of Islam and Muslims. Out-group knowledge can be operationalized in different ways: it can be both *knowing* out-group members (i.e., contact) and *knowing about* out-group cultures and traditions. Moreover, the *knowledge about* out-group cultures and traditions can be *perceived* and/or *factual*. This article is the first to examine the extent to which knowledge of Islam in its various forms (factual knowledge, self-reported knowledge, and intercultural contact with Muslims) can influence prejudice against Muslims in Australia, beyond the effect of known predictors of prejudice such as education, political ideology, age, and gender.

Australia is an optimal case study to investigate this relationship because, like other multicultural democracies, it is experiencing high levels of interreligious and intercultural tension. For example, a recent Australia-wide poll conducted by the Scanlon Foundation, although reporting some overall positive findings regarding the state of multiculturalism, found anti-Muslim attitudes to be approximately five times higher than negative attitudes towards other religious groups (Markus, 2016). Other, less scholarly, opinion polls concur: the 2016 Essential Poll, for instance, suggests that almost half of Australians would support a ‘ban on Muslim immigration’ (Essential Report, 2016). Although this may be an exaggeration of the level of resistance and fear of Muslims and Islam, it echoes the findings of more rigorous academic studies that report an intensification of Islamophobic attitudes, which have polarized communities along cultural, religious and ethnic lines more deeply than ever before (Mansouri et al., 2015). Indeed, Australia’s recent history has been characterized by a heightened fear of Muslims, who are routinely associated with crime, misogyny, terrorism, and violence in general (Aslan, 2009).

Investigating the relationship between knowledge, intercultural contact, and prejudice has important theoretical as well as policy implications. The latter is of critical importance given the current sociopolitical climate of intercultural tensions, persisting levels of racism in culturally pluralist societies, and rising incidents of conflicts informed by sectarian divisions (Mansouri, 2015). Further, Australia’s history as an *émigré* society provides for complex sociopolitical dynamics and an increasingly diverse cultural and religious demographic profile (Bouma, 2011; Markus, 2016).

In this article, we examine the role of knowledge and intercultural contact in relation to other individual-level predictors of prejudice, and investigate theoretically driven relationships between knowledge of Islam (in terms of factual knowledge, self-reported knowledge, and intercultural contact) and negative attitudes towards Muslims. Before we present the results from a representative, cross-sectional survey conducted Australia-wide, we reflect on some methodological and procedural issues related to the operationalization and the measurement of factual knowledge in social research.

Theoretical approach

Discussing Islamophobia

Islamophobia identifies Islam and Muslims as the ‘minority of the worst’, characterized by the ‘behavior of the least desirable’ (Vertigans, 2010, p. 29). Although Islamophobia is not a new phenomenon, its current state is linked to the influential late-twentieth-century report ‘Islamophobia: a challenge for us all: report of the Runnymede Trust Commission on British Muslims and Islamophobia’, also known as ‘the Runnymede Report’ (Allen, 2010). This report was launched in the UK in 1997, during the ‘Salman Rushdie affair’ which ignited a polarizing debate about freedom of speech, tolerance, and the nature of the sacred in Islam and Muslim societies. The term ‘Islamophobia’ has increased in prevalence since the 1990s, especially following the 9/11 attacks in the USA, which significantly affected social attitudes towards Arab and Muslim minorities in Western societies (Huddy et al., 2005).

There are philosophical and empirical challenges to conducting research about Islamophobia. At the philosophical level, there is a lack of clarity of the concept ‘Islamophobia’. The growing literature on Islamophobia is dominated by empirical analyses that do not address the ontology of the category, which obfuscates the possibility of theoretical clarity and precision (Sayyid, 2014). Then, of course, there is the political contestation of the very concept itself, in an environment where ‘questions about national security, social cohesion and cultural belonging’ are increasingly associated with the Muslim *other*, even if most acts of violence are perpetrated by the extremist fringe of Muslim communities (Sayyid, 2014, p. 11). In other words, Islamophobia is an ontologically and epistemologically underdeveloped concept that indeed needs more scholarly attention.

Previous research has attempted to operationalize Islamophobia by identifying its different manifestations: Imhoff and Recker (2012) distinguished between prejudice against Muslims, which captures the closed views of Islam, identified by the Runnymede Report (Allen, 2010), and secular critiques of Islam, reflecting laicist positions about the relationships between Islam and the state. Uenal (2016) distinguished between anti-Islamic sentiment and prejudice against Muslims. The former was covered in the influential work of Edward Said (1978) whose notion of Orientalism revealed an anti-Islam positionality, rejecting not only the theological manifestations of Islam, but also its civilizational dimensions. By contrast, the latter prejudice is more directly aimed at the level of the individual, where any sign of religious visibility is resisted, rejected, and, in many cases, attacked (Hassan, 2015; Werbner, 2015). Recent studies have pointed to the need to differentiate between these two facets of Islamophobia for practical and theoretical reasons (see, for example, Larsson & Sander, 2015; Uenal, 2016).

In the present study, we focus on the specific aspect of Islamophobia that is most visible and concerning at a societal level, namely prejudice against Muslims – on the rise in increasingly securitized sociopolitical environments. Prejudice against Muslims has been shown to be a key component of the operationalization of Islamophobia in previous research (see Imhoff & Recker, 2012; Uenal,

2016).

Predictors of Islamophobia

Individual-level predictors of Islamophobia are similar to the predictors of prejudice towards out-groups in general (Hodson & Dhont, 2015). For example, ideological factors (such as political and religious orientation) and personality traits (such as right-wing authoritarianism, social dominance orientation, see Altemeyer & Hunsberger, 1992; Pratto et al., 1994) have consistently been associated with negative views of Muslims in the USA (Johnson et al., 2012; Rowatt et al., 2005). These factors have also been consistently associated with prejudice (Hodson & Dhont, 2015); they capture resistance to change and acceptance of social inequality, both aspects of the broader ideological category of conservatism (Jost et al., 2003).

By contrast, socio-demographic factors such as race, age, gender, unemployment, and income have not been consistently correlated with Islamophobia (Ogan et al., 2014). However, these factors are often associated with other variables that predict prejudice, particularly age (being older) which is often associated with conservatism. Similarly, gender, unemployment, and age (being older) are associated with perceived threat (Vedder et al., 2016) and intergroup anxiety (Hopkins & Shook, 2017). Income and other indicators of social status are often associated with prejudice and Islamophobia, though only in certain contexts (Ciftci, 2012; Ogan et al., 2014; Hodson & Dhont, 2015).

Formal education is a consistent predictor of lower levels of prejudice across different contexts, and its attainment is often associated with less negative attitudes towards Muslims (Hooghe et al., 2008; Caravacho, Zick, Haye, Gonzalez, Manzi, Kocik, & Bertl, 2013; Ogan et al., 2014). Yet conceptually, the reasons that education is consistently associated with reduced prejudice remain a matter of debate. In the 1970s and 1980s, education was believed to promote progressive views of race relations, more cognitive sophistication, and therefore less out-group negativity (see, for example, Jackman, 1978). Other studies offer different explanations, most notably Jenssen and Engesbak (1994) who suggested that a high level of education is simply an indicator of higher social status. Such a status protects people from direct competition with immigrants in the labor market and therefore makes people less anxious and less vulnerable to the perceived material and symbolic threat. Moreover, Borgonovi (2012) found that where there are higher standards of living and fewer inequalities, formal education has weaker association with trust and tolerance. This suggests that in a country like Australia, that has a comparatively high quality of life and low social inequalities, factors other than education should predict negative attitudes towards Muslims.

Distinguishing between different types of knowledge

We propose looking at the relationship between intercultural contact, knowledge, and prejudice as a further individual-level dimension that can predict prejudice against Muslims. Specifically, we argue that in Australia more knowledge of Islam and contact with Muslims is associated with less prejudice against Muslims over and above the effects of education, ideology, and other important predictors of prejudice.

To better investigate whether and how knowledge of Islam can predict levels of prejudice against Muslims, in this article we distinguish between three different types of knowledge that are operationalized separately in our research, these are: factual knowledge about Islam, self-reported knowledge about Islam, and contact with Muslims. The effect of knowledge on prejudice is then tested beyond other individual predictors discussed above, such as age, political orientation, and formal education. In other words, we test whether knowing more facts about Islam as a religion and knowing more people that are Muslim predicts lower levels of prejudice among people across the board, younger and older, of high and low formal education, and with left- and right-wing political views.

First, we measure an individual's factual knowledge of Islam as a religion. In political science, factual knowledge of political issues is referred to as political knowledge or political sophistication (Luskin, 1987). This knowledge is a powerful predictor of attitudes related to better democratic functioning, because more knowledgeable individuals are more able to promote values with their vote (Ingleheart, 1990) and are less vulnerable to external manipulation and persuasion (Ladd, 2007).

Second, we look at self-reported knowledge by asking individuals about their perceptions of their knowledge of Islam. Previous research has highlighted the difference between actual knowledge, that is, the processing of information in a systematic manner, and self-perceived expertise, which is associated with dogmatism, bias, and prejudice (see, for example, Goren, 1997; Dunning et al., 2003; Price et al., 2015). Specifically, self-perceived knowledge (the belief that one is expert) is distinct from actual knowledge, as it occurs more frequently in unskilled individuals who overestimate their level of skill (Dunning et al., 2003).

Third, we look at intercultural contact. Research has consistently shown that knowing people of other groups (for example religious or ethnic groups) is associated with more out-group knowledge and less prejudice towards the out-group (Allport, 1954; Pettigrew & Tropp, 2008). We consider contact as a distinct source and type of knowledge, because it is not necessarily related to formal education or factual knowledge. It is, in fact, possible that individuals who have daily contact with Muslims (for example at work) do not necessarily acquire a greater amount of correct factual knowledge about Islam. Conversely, it is plausible that individuals who know facts about Islam may not know any Muslims in their daily lives.

We then investigate whether there is a relationship between intercultural contact, factual knowledge, perceived knowledge and levels of prejudice. A meta-analysis of the research on prejudice reduction (Pettigrew & Tropp, 2008) found that the effect of intergroup contact on prejudice is consistently mediated by knowledge of the out-group (specifically people from other cultures, people with stigmatized illnesses and people of different age groups). In this article, we will test whether, as the Intergroup Contact Theory predicts, factual knowledge mediates the relationship between contact with Muslims and prejudice against Muslims in

Australia.

Proposing a measure of factual knowledge of Islam

Terms such as ‘factual knowledge’, ‘sophistication’, ‘awareness’, and ‘expertise’ usually refer to the organized cognition that an individual has of a certain domain or issue (Luskin & Bullock, 2011). There is a large body of research in political science on the relationship between political sophistication (Luskin, 1987), which defines the quantity and organization of a person’s political cognitions, and its effects on opinions, votes, and other behaviors (see, for example, Zaller, 1992; Bartels, 1996).

Most of the studies on political sophistication do not use measures of self-reported knowledge, but rather measures that capture the quantity of factual information held by individuals, which is consistently associated with how accurate the information is (Luskin, 2002). In the past decade, the trend has been to focus on the quantity of stored information, measured by knowledge of facts in the political domain. This type of measurement is widely used in important political surveys, such as the American National Election Study and the Australian Election Study.

The development of concrete measures involves various choices about what items to select and how to convert responses into knowledge scores. On choosing items, scholars have made specific recommendations (see Mondak, 2001). For example, the questions should be able to capture the range of knowledge held by participants, and therefore the items should have different levels of difficulty, ensuring that a normal distribution of the scores on the knowledge index will result (Delli Carpini & Keeter, 1993). Further, scholars argue that having multiple-choice questions with three options is the optimal approach for robust psychometric analysis (Mondak, 2001).

There are important issues to consider when converting responses into knowledge scores, particularly regarding the quantification of different degrees of error and the treatment of ‘don’t know’ responses (Mondak, 1999, 2001). The approach we took was to attribute scores to responses, that is 1 (correct) or 0 (incorrect or don’t know). As for the treatment of the ‘don’t knows’ and correction for guessing, we follow Luskin and Bullock (2011) and use the conventional scoring system (treating the ‘don’t knows’ as wrong answers and not applying any correction). This has been found to be both statistically and theoretically more reliable. Scores could be attributed registering the degrees of (in)correctness: for example, stating that a 10 percent immigrant population in a given country is 20 percent is less incorrect than saying that it is 40 percent. Yet this method has been found to be less reliable than the use of binary responses (Luskin & Bullock, 2011), which we adopt in our research.

Data and methods

Data

Six hundred and twenty-one questionnaires were collected as part of the Australian Survey of Social Attitudes. The respondents were recruited from a simple random sample from the Australian electoral roll, which contains 95 percent of the citizens 18 years and above.¹ The questionnaires were collected between June and October 2016.

The sample represents the characteristics of the general Australian population. The geographical distribution of the sample is 33.5 percent from New South Wales, 26.1 percent from Victoria, 17.1 percent from Queensland, 9.2 percent from Western Australia, 8.7 percent from South Australia, 2.7 percent from Tasmania, 1.9 percent from the Australian Capital Territory, 0.8 percent from the Northern Territory. The average age of the sample is 55.34 (SD = 16.30), and 51 percent of respondents are male (N = 317). The ideological and political alignment of the sample are evenly distributed and reflect current political status in the federal parliament (Australian Electoral Commission, 2017), with 19.5 percent identifying with the Labor Party, 23.5 percent with the Liberal party, 7.9 percent with the Greens, 4.0 percent with the National party and 39.5 percent declaring no affiliation. The religious affiliation of the sample was mostly Christian (22.1 percent Catholic, 16.4 percent Anglican, 15.3 percent other Christians including Methodists, Pentecostals, Orthodox and unspecified other denominations) and not religious (37.4 percent declared no religion). Muslims, (N = 2) Hindus (N = 4), Jews (N = 3) and Buddhists (N = 6) are only marginally represented in this sample. As our study focuses on the attitudes towards Muslims, we have excluded the two Muslim respondents in the sample from our analyses here.

Variable description

Religiosity

This is based on regular religious practice and elicited through the following questions: ‘Apart from such special occasions as weddings, funerals, etc., how often do you attend religious services? Several times a week or more often, once a week, two or three times a month, once a month, several times a year, once a year, less frequently than once a year, never’.

Political affiliation

This is based on political and ideological alignment: ‘Do you usually think of yourself as close to any particular political party and, if yes, which party is that? Labor Party (ALP), Liberal Party, National (Country) Party, Greens, no party affiliation, other’. The variable has been recoded: 1 = Liberal/National, 0 = other affiliations.

¹ See the Australian Electoral Commission, enrollment statistics:

Formal education

To measure formal education, we used the following question: ‘How many full years of schooling or education have you had? Please include primary and secondary schooling, university, and full-time vocational training, but do not include repeated years. If you are currently in education count the number of years you have completed so far’.

Factual knowledge of Islam

To measure respondents’ factual knowledge of Islam, five factual questions about Islam were asked. The questions were selected based on a previous pilot study (not reported here). The questions were:

‘What is the main religious text for Muslims, like the Bible is for Christians?’

‘What does the word Ramadan indicate?’

‘Is Jesus a revered Prophet in Islam?’

‘Is Islam an Abrahamic religion as are Judaism and Christianity?’

‘Are the majority of Muslims Shia, Sufi or Sunni?’

The respondents were given three options in response to each question, where only one option was correct.

Self-reported knowledge of Islam

To measure self-reported knowledge, respondents were asked: ‘How much would you say you know about the Muslim religion and its practices?’ with the ability to respond on a four-point scale, from ‘a great deal’ to ‘nothing at all’. In the analyses, we treat self-reported and factual measures of knowledge as conceptually distinct because self-reported measures are subjective estimates, likely to be biased. Therefore, we do not expect self-reported measures of knowledge to be associated with attitudes to Muslims in the same way as factual knowledge might be.

Intercultural contact with muslims

To measure intercultural contact, we incorporated a question about contact with Muslim people in the daily life, specifically: ‘Please think about your relatives, your friends, your neighbors, your schoolmates and/or your colleagues. How many of them are Muslims?’ The available responses were: ‘none’, ‘less than 5’, ‘between 5 and 10’, ‘more than 10’, and ‘don’t know’. The ‘don’t know’ responses were recorded as missing values in the analyses.

Anti-Muslim prejudice

Prejudice against Muslims was measured by seeking the level of agreement with six statements on a five-point scale from ‘strongly disagree’ to ‘strongly agree’. The statements were developed by the research team as follows: ‘Practicing Muslims are pious people and therefore they are more trustworthy’; ‘Practicing Muslims are the same as other citizens’; ‘Practicing Muslims do not fit Australian society’; ‘Practicing Muslims pose a threat to Australian society’; ‘Practicing Muslims should be searched more thoroughly than others in airports and stations’; ‘Counter-terrorism policies in Australia should focus exclusively on practicing Muslims’. We included those items on practicing Muslims because we argue that the stereotypical representation of Muslims as the ‘minority of the worst’ is epitomized by the image of practicing Muslims, who carry distinctive and visible signs of their religious belief, for example their dress (e.g., the veil for women) or their physical appearance (e.g., the beard for men). Additionally, we added to our survey three items that were used in previous surveys to measure prejudice and racism in Australia and Britain (see, [Ford, 2008](#); [Dunn et al., 2004](#)), specifically:

‘How concerned would you feel if one of your close relatives were to marry a person of Muslim faith?’

‘How would you feel if one of your neighbors was a person of Muslim faith?’

‘How accepting would you be to live near a Mosque?’

Analytical approach

As the items used to capture anti-Muslim prejudice are not a validated scale, we wanted to explore the underlying relationships between the nine items and identify whether they capture one single latent construct (that is, anti-Muslim prejudice), or they capture multiple constructs. We therefore employed exploratory factor analysis and looked at the scree plot to identify the factor structure and to identify where the slope of the function of variance explained obvious breaks. We calculated correlation matrix and factor loadings using principal axis factoring for comparison and assessment for best fit. After estimating the tau-equivalent reliability of our measures and providing descriptive statistics, we created composite scores by summing the individual items’ scores (summated rating scales). We then conducted bivariate correlations to test whether the three types of knowledge outlined above are associated, as well as whether they correlate individually with formal education and prejudice against Muslims. We then conducted ordinary least squares regression to test which of the three types of knowledge is the best statistical predictor of prejudice, irrespective of other individual predictors. We included as control variables individual-level characteristics that could be predictors of anti-Muslim attitudes. In addition to basic demographic characteristics like gender and age, we included religiosity, education and political affiliation

Table 1
Frequencies of the answers to the factual questions about Islam (N = 619).

	Correct answer	Wrong answers	Don't know	Missing
What is the main religious text for Muslims, like the Bible is for Christians?	69.2%	7.9%	19.0%	3.9%
What does the word Ramadan indicate?	80.4%	4.7%	11.6%	3.4%
Is Jesus a revered Prophet in Islam?	22.4%	41.7%	32.4%	3.5%
Is Islam an Abrahamic religion as are Judaism and Christianity?	26.2%	14.9%	55.1%	3.9%
Are the majority of Muslims Shia, Sufi or Sunni?	16.4%	15.3%	64.4%	3.9%

as control variables.

Finally, we applied mediation analysis to test whether the data support the contact hypothesis' account of the relationship between knowledge and contact (Allport, 1954). Specifically, we tested whether knowing more Muslims is associated with having more knowledge of Islam, which is in turn associated with having less prejudice against practicing Muslims. In other words, we tested to what extent knowledge of Islam mediates the relationship between intercultural contact and prejudice against Muslims. If confirmed, the mediation would suggest that knowing more Muslims decreases prejudice against Muslims because it increases knowledge of Islam. Moreover, because previous research in this area is limited by inability to directly infer causal influences (Pettigrew & Tropp, 2008), and as we believe that religious knowledge can also precede interfaith contact because it could eliminate the barriers that impede the possibility of positive contact, we also test whether contact mediates the relationship between knowledge and prejudice. Mediation analysis was conducted using the PROCESS macro in SPSS (Hayes, 2013). Bootstrapping with 5000 random re-samples was used to test the indirect effects.

Results

We first conducted exploratory factor analysis. The structure of the data (scree plot) clearly suggested a single-factor structure, which explained 55.86% of the variation in the original matrix (see supplementary materials for the scree plot, descriptive statistics and factor loadings using principal axis factoring). The analysis suggested that we remove from the scale the item 'practicing Muslims are pious and therefore they are more trustworthy' because of the low factor loading. After removing the item, the reliability of the scale improved from $\alpha = 0.89$ to $\alpha = 0.91$. The descriptive statistics of the aggregate measure showed that it had a normal distribution, with mean of 2.59 (SD = 0.97), skewness of 0.49 (SE = .10) and kurtosis of -0.39 (SE = 0.19).

Second, the responses to the five factual questions about Islam were analyzed. Table 1 shows the frequencies of correct and incorrect responses, 'don't knows' and missing values. An index of knowledge about Islam was created using the conventional scoring system that attributes 1 point to each correct response and 0 to incorrect and 'don't knows'. The measure of knowledge about Islam had a normal distribution, with a mean of 2.21 (SD = 1.32), skewness of 0.26 (SE = .10) and kurtosis of -0.48 (SE = 0.20). The reliability of the factual knowledge score was $\alpha = 0.64$.

Bivariate correlations were conducted between the measures of knowledge, education, and prejudice against Muslims (Table 2).

Subsequently, we conducted ordinary least squares regression to test which of the knowledge measures was the best statistical predictor of prejudice beyond other factors such as formal education (see Table 3). We also tested all interactions between the knowledge and the control variables and found that no interaction was statistically significant (all p-values above 0.14). Having more factual knowledge and more intercultural contact predicted having less prejudice against Muslims beyond other individual demographic and political characteristics. Of these two factors, intercultural contact had a larger negative effect on prejudice. Self-reported knowledge had a significant positive association with anti-Muslim prejudice.

Lastly, we investigated the relationships between knowledge and prejudice in theoretically informed mediation models. First, we tested whether knowledge of Islam mediated the relationship between intercultural contact and prejudice as predicted by Contact Theory (Allport, 1954; Pettigrew & Tropp, 2008).

Fig. 1 shows the unstandardized indirect effect of intercultural contact on prejudice against Muslims through factual knowledge of Islam, $ab = -0.02$, CI $[-0.04, -0.01]$.

We then tested a second model to examine whether intercultural contact mediated the relationship between knowledge and prejudice (Fig. 2). Theoretically, we believe that religious knowledge can precede interfaith contact because it eliminates the barriers that impede the possibility of positive contact.

Table 2
Bivariate correlations between the main measures of the study.

	N	1	2	3	4
1 Prejudice	613				
2 Knowledge (factual)	597	-0.17^{**}			
3 Knowledge (self-reported)	592	0.02	0.56^{**}		
4 Intercultural contact	541	-0.27^{**}	0.33^{**}	0.31^{**}	
5 Education	578	-0.31^{**}	0.32^{**}	0.22^{**}	0.28^{**}

** = $p < 0.01$.

Table 3

Ordinary least squares regression model on prejudice.

	Unstandardized B	Standard error	Standardized beta	t-value	p-value
Sample size	487				
Gender (female = 1)	−0.050	0.080	−0.026	−0.625	0.532
Age	0.006	0.003	0.092	2.115	0.035
Religiosity	0.018	0.019	0.040	0.968	0.333
Liberal–National (conservative)	0.326	0.091	0.147	3.581	0.000
Education (years)	−0.057	0.011	−0.232	−5.222	0.000
Knowledge (factual)	−0.112	0.039	−0.143	2.878	0.004
Knowledge (self-reported)	0.225	0.059	0.182	3.799	0.000
Intercultural contact	−0.228	0.050	−0.203	−4.539	0.000
Adjusted R Square	0.199				
F-test	16.345				

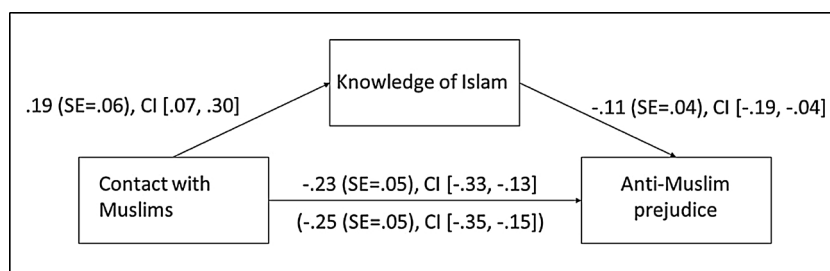
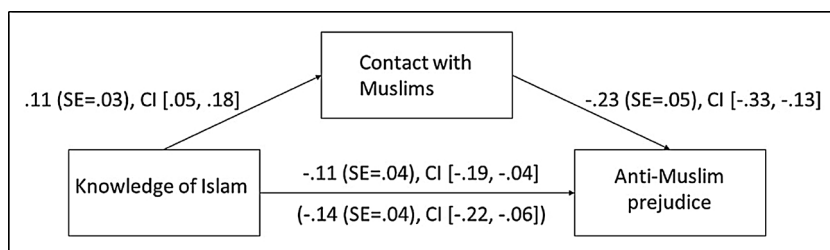
* = $p < 0.05$; ** = $p < 0.01$.**Fig. 1.** The mediation model where knowledge mediates the relationship between contact and prejudice. Unstandardized coefficients. Values in parenthesis are indirect effects.**Fig. 2.** The mediation model where intercultural contact mediates the relationship between knowledge and prejudice. Unstandardized coefficients. Values in parenthesis are indirect effects.

Fig. 2 shows that knowledge of Islam produced a small but significant unstandardized indirect effect on prejudice against Muslims through intercultural contact, that is, contact with Muslims in daily life, $ab = -0.03$, $CI [-0.06, -0.01]$. Our data therefore suggests that more knowledge about Islam can potentially diminish the barriers and the risks of intercultural contact, which in turn predicts less prejudice against Muslims.

Discussion and conclusion

This article reports findings from an original empirical examination of the relationship between different forms of knowledge of Islam and prejudice against Muslims in Australia. Current research shows that education is an important and consistent predictor of prejudice (Caravacho et al., 2013), with out-group knowledge consistently reported as a factor that mediates the relationship between intergroup contact and prejudice (Pettigrew & Tropp, 2008). Yet, no research to date has empirically examined the relationships between different types of knowledge of Islam and prejudice against Muslims above the effect of education and other individual-level predictors of prejudice. Previous research has shown that corrective factual information about Islam improved positive views of Islam relative to other religions (Moritz et al., 2017) and that religious fundamentalism is associated with the refusal of the theological overlap between Abrahamic religions (Kunst et al., 2014; Kunst & Thomsen, 2015). This article expands on these findings by showing that knowledge of Islam is negatively associated with prejudice against Muslims beyond the effects of religiosity and conservatism (i.e., also among people who are not religious and not conservative), and by exploring the relationships between different forms of knowledge of Islam (factual vs. self-reported) and Muslims (contact).

Questionnaires were collected among a random national sample of Australians ($N = 612$), soliciting their factual and self-

reported knowledge of Islam, prejudice against Muslims, and respondents' everyday contact with Muslims in their daily lives. The results confirm that respondents who display the most prejudice against Muslims are also those who know the least about Islam and Muslims in terms of factual knowledge, and the ones who know and have less contact with Muslims, above and beyond other individual-level predictors of prejudice. In other words, possessing more knowledge about Islam as a religion and having more contact with Muslims is associated with less prejudice against Muslims regardless of whether an individual identifies or not with conservative parties (such as the Liberal–National coalition), whether they are older or younger, female or male, more or less educated or religious. This finding presents a substantive challenge to right-wing opinion leaders who mobilize their negative attitudes towards Muslims with supposed knowledge of Islam as a religion (see, for example Bolt, 2016). The present paper shows that prejudice against Muslims is fueled not by knowledge, but in parts by ignorance of Islam as a religion.

At the same time, factual knowledge and self-reported knowledge were found to have different effects: whereas factual knowledge was associated with less prejudice, self-reported knowledge tended to be associated with more prejudice. In our analyses, the relationship was statistically significant only when controlling for all variables in the model, which suggests that other individual differences (such as factual knowledge, contact, education and ideology) could affect this relationship. Not all individuals self-report knowledge using the same criteria, for example, the definition 'a great deal of knowledge' can be different for different people. Moreover, high levels of self-perceived knowledge can be frequent among unskilled or under-skilled individuals who overestimate their levels of education and knowledge (Dunning et al., 2003). When we separate the effects of actual knowledge from self-reported knowledge, we believe that we are fundamentally left with bias. Individuals who believe themselves to be experts, even when they possess low factual knowledge, are usually biased, dogmatic, and prejudiced (see, for example, Goren, 1997; Dunning et al., 2003; Price et al., 2015). Bias is high among people with high self-perceived expertise and low knowledge (Dunning et al., 2003), and among those who are engaged in motivated reasoning, because they are more likely to reject information about unpalatable objects, or to employ partial search for information (Dawson et al., 2002).

The effects of factual knowledge on prejudice reported here are theoretically important, particularly because the effect of religious knowledge exists beyond the effect of education, and is therefore conceptually distinct from it. This study adds, therefore, to the understanding of the relationship between education and tolerance (Borgonovi, 2012), by showing that knowledge (in terms of factual and contact-derived, but not self-reported, knowledge) are significantly associated with high tolerance beyond the effects of education.

Since Allport's (1954) Intergroup Contact Theory found that knowledge of the out-group mediates the relationship between contact and prejudice, we tested whether this theory can explain the effects of knowledge on prejudice among our Australian participants. In the findings reported here, however, the mediation is not as large as we would have expected given previous research (see Pettigrew & Tropp, 2008). We suspect that this was because the measure of factual knowledge of Islam captured a sophisticated level of knowledge unlikely to have originated simply from intercultural contact in daily life, such as having Muslim colleagues at work. Nonetheless, data here support the idea that more knowledge about Islam could diminish the barriers that prevent intercultural contact from occurring, which in turn contributes to reducing prejudice towards Muslims. These findings suggest that knowledge of Islam can also precede contact with Muslims, because it can predispose individuals to be more open to accept and meaningfully interact with Muslims in their daily lives. This study, therefore, offers a new perspective on the relationships between intercultural contact and knowledge. It suggests that knowledge can theoretically and empirically precede actual contact, in the process eliminating, or at least minimizing, the barriers that impede the possibilities of positive encounter. This hypothesis should be taken as suggestive only, and further research with experimental studies are needed to investigate the causal impact of knowledge on positive contact and prejudice reduction. As Paluck and Green (2009) have claimed, the field of prejudice reduction needs more rigorous experimental research to evaluate the effects of prejudice-reduction programs, and the present article suggests a potential prejudice-reduction mechanism that should be rigorously tested with experimental research.

Finally, this study shows the analytical potential of factual and domain-relevant knowledge in predicting social attitudes. Although political scientists have operationalized and investigated the impact of political knowledge on policy decisions, voter intentions, and other political attitudes, knowledge about religious minorities is still an under-researched field. It deserves increased attention in future research agendas because it has the potential to explain interreligious cooperation and, ultimately, the mechanisms of functioning multicultural societies.

As developments in Australia and globally suggest, intercultural relations are facing their strongest test yet with a considerable rise in hate speech, racism, violent extremism and an overall retreat of progressive politics and policies (Mansouri, 2015; Abbas, 2004). Despite these worrying trends, Australia scores relatively high on indicators of social cohesion (Markus, 2016). Yet, Australian Muslims are still the least socially and politically accepted group, as recent findings attest (see, Hasan, 2015; Markus, 2016; Mansouri et al., 2015). In the Australian context, Islamophobia is closely interrelated with fear of immigration, as exemplified in the debate about the ban on Muslim immigration (Essential Report, 2016). The findings of this study are critical for future policy directions in the diversity governance space, especially in relation to understanding the role of knowledge (both factual and perceived) in shaping attitudes and prejudices. This has the potential to provide a solid platform for policymakers and practitioners to initiate appropriate measures for improving the lives of Muslim Australians, and strengthening intercultural and interfaith relations more broadly.

Limitations and future research directions

The main limitation of this study was the need to use proxy and narrow measures. Because of the limited space available in the questionnaire, it was not possible to use validated measures of knowledge and intercultural contact. These proxy measures were used for the first time in this study. Although we established a significant association between contact, knowledge, and prejudice, we

acknowledge that our adopted measure of intercultural contact remains too narrow, because it does not distinguish between intimate contacts (such as family and friends) and less intimate contacts (such as schoolmates and work colleagues), overlooking the quality of the contact. And although this study captures conservatism and religiosity through self-reported measures of political affiliation and religious attendance, future research should include more established and precise measures of authoritarianism and social dominance orientation, which have been found to be strong predictors of prejudice (Johnson et al., 2012; Rowatt et al., 2005). Furthermore, other validated measures of prejudice and Islamophobia could be used in future research as additional dependent variables (see for example Imhoff & Recker, 2012; Uenal, 2016). We also acknowledge a potential self-selection bias (the response rate of the survey was about 30%) and the small effect sizes as a limitation of this study. This article, although providing adequate empirical evidence to advance the understanding of the relationships between intercultural contact, knowledge, and prejudice, cannot examine the nuances of those complex constructs. We suggest this as an exciting new avenue for future research directions.

Finally, this study has exclusively focused on one possible mechanism to explain the association between contact and prejudice: a cognitive mechanism derived from knowledge. Yet, as a growing body of research reveals, rational reasoning often collides with emotions, which shape values, moral sentiments, and attitudes (see for example Westen, 2008). This too raises new research questions: how do emotions shape contact and knowledge acquisition? How does this affect the relationship between knowledge and prejudice? Indeed, negative emotions, like fear and anxiety, triggered by terrorism and immigration concerns could potentially disrupt the positive association between knowledge and prejudice. Therefore, further research is needed to examine these questions and test associated hypotheses in order to understand the mechanisms that intensify prejudice against Muslims in the current political and social environment.

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Appendix A. Supplementary data

Supplementary material related to this article can be found, in the online version, at doi:<https://doi.org/10.1016/j.ijintrel.2018.07.001>.

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