ORIGINAL ARTICLE



# The Role of Ambivalent Sexism and Religiosity in Predicting Attitudes Toward Childlessness in Muslim Undergraduate Students

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Abstract The aim of the current study was to investigate the relationship between ambivalent sexism, specifically hostile sexism (HS) and benevolent sexism (BS), religiosity, and attitudes toward childlessness in Muslim undergraduate students. The sample consisted of 157 (79 women, 78 men) Turkish Islamic undergraduate students studying in North Cyprus, aged between 17 and 30 years-old and originating from various regions in Turkey. Participants completed measures of ambivalent sexism and attitudes toward childlessness as well as rated their level of religiosity. It was expected that due to its emphasis of traditional gender roles, benevolent sexism and high Islamic religiosity would predict negative attitudes toward childlessness in the Turkish sample. Results showed that in women, higher levels of religiosity and benevolent sexism predicted negative attitudes toward childlessness, whereas in men, benevolent sexism alone was predictive of negative attitudes toward childlessness. The results are discussed in accordance with literature on ambivalent sexism and the religion of Islam.

Keywords Ambivalent sexism  $\cdot$  Hostile sexism  $\cdot$  Benevolent sexism  $\cdot$  Attitudes toward childlessness  $\cdot$  Religiosity  $\cdot$  Islam

Positive attitudes toward childlessness, whether by choice or by circumstance, have become more acceptable in recent years in the United States and Europe, however social pressures still exist, especially on women, to have children (Koropeckyj-Cox and Pendell 2007a). Several predictors of

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negative attitudes toward childlessness have been established in studies conducted in the United States using national surveys of families and households (Koropeckyj-Cox and Pendell 2007b); the focus of the present study however was ambivalent sexism and religiosity in the context of Turkey, a culture where traditional gender ideology is still prevalent (Kağitçibaşi 1982). These two constructs were thought to be most relevant because, as will be discussed, sexist attitudes can justify and reinforce gender inequality. Established social institutions such as religion (in this case Islam) can function to further support or prevent unequal treatment of women and men (Brinkerhoff and Mackie 1985; Burn and Busso 2005; Glick et al. 2002). This inequality may particularly be the case in the decision to remain childless.

Researchers have previously examined the association between ambivalent sexism and religiosity in predominantly Christian and Western countries including the United States and Spain (Burn and Busso 2005; Glick et al. 2002). however, findings from Islamic, non-Western cultures are sparse (see Taşdemir and Sakallı-Uğurlu 2010). This is particularly the case for the link between these variables as predictors of attitudes toward childlessness. To date, most research on attitudes and perception of remaining childless has been conducted in developed, Western countries such as the United States (Ashburn-Nardo 2016; Koropeckyj-Cox and Pendell 2007a, 2007b), Australia (Mitchell and Gray 2007), and European countries such as Italy and Germany (Tanturri and Mencarini 2008; Testa 2007) using data from national surveys. The little research that has been conducted in developing countries has focused mainly on demographic and health related issues with regards to fertility (Inhorn and van Balen 2002). It is therefore important to examine attitudes toward childlessness (whether voluntarily childless or not) and discover what the predictors (e.g., ambivalent sexism, religiosity) of negative attitudes are in both Western and non-Western countries (such as Turkey).

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It is of relevance to know such predictors, particularly if negative beliefs regarding remaining childlessness can be a cause of pressure for women.

For instance in Turkey, the total fertility rate has declined from 6.7 children per woman in the early 1950s to 2.2 in 2003 (Institute of Population Studies 2003). Lower fertility rates have also been found in urban compared to rural areas (Toros 2002), and major differences across regions and ethnic groups have been observed (Isik and Pinarcioglu 2006). The average age of first marriage and first birth are also on the rise (Edirne et al. 2003; United Nations Children's Emergency Fund, State Institute of Statistics 1999). In 2003, nearly 28 % of 25-29 year-olds were childless compared to 22 % in 1993 (Institute of Population Studies 1993, 2003). In face of such statistics, the Turkish government is urging families toward having "at least 3 children" (Hurrivet Daily News 2013) and moving toward restricting abortions and Caesarian section births which may affect subsequent births (Shafak 2011). Such policies have important consequences for women and their bodies. It is therefore important to understand which beliefs underlie attitudes toward childlessness and birth rates.

## **Attitudes Toward Childlessness**

Factors associated with more positive attitudes toward childlessness have been investigated within the United States, and these findings may help guide researchers in identifying predictive factors in Turkey. Four studies within the United States, including those by Koropeckyj-Cox and Pendell (2007a, b) (using the National Survey of Families and Households) and by Thornton and Young-DeMarco (2001) (using five datasets: Monitoring the Future, General Social Survey, International Social Science Project, Intergene rational Panel Study of Parents and Children, and the National Survey of Families and Households), found that women were more likely to embrace social changes and report more positive attitudes toward childlessness compared to men who were generally found to be more traditional with regards to gender and family issues (Bolzendahl and Myers 2004). More recently, using an experimental design, Ashburn-Nardo (2016) found among U.S. university students that voluntarily childfree targets were perceived as significantly less psychologically fulfilled than were targets with two children. She additionally found that participants reported greater moral outrage toward targets who chose to remain childfree than toward those with two children.

In a nationally representative sample of married U.S. couples without children, men reported more pronatalist attitudes compared to women, rating the general importance of having children as more important than did women (Seccombe 1991). In order to assess this gender gap in attitudes toward childlessness in the United States by using national surveys, Koropeckyj-Cox and Pendell (2007a, b) used a single measure that tapped two types of attitudes about childlessness in their studies: Prescriptive norms that stress the expectation, desirability, and imperative of parenthood and proscriptive norms that emphasize potential disadvantages of childlessness, including the risk of loneliness in old age. It was found that women's positive attitudes toward remaining childless was greater at higher education levels and were linked with intentions to remain childless (Koropeckyj-Cox and Pendell 2007a). Individuals with negative attitudes toward childlessness were found to be older, non-White men who were less educated (Koropeckyj-Cox and Pendell 2007b).

As for Turkey, despite the total fertility rate declining, parenthood is still of great significance for the Turkish family structure. Studies in Turkey have shown that the desire for a child and the value of children is of high social importance (Ataca and Sunar 1999; Kağitçibaşi and Ataca 2005). It is customary for men to represent the head of the family with the responsibility of keeping the family together and restricting women to traditional female roles such as child rearing and homemaking (Sunar 2002). Furthermore, gender stereotypic division of labor within marriage and pregnancy soon after marriage are still normative (Hortacsu 1999). Childbearing is viewed by many as the central work, activity, and source of status for women (Kulakac et al. 2006). In fact, the 2002 World Values Survey data for Turkey showed that nearly three quarters (73 %) of people surveyed agreed that a woman has to have children in order to be fulfilled and over 70 % said having children was necessary for a successful marriage (Copur et al. 2008). In their study on university student's attitudes toward remaining childless in Ankara, Turkey, Copur and Koropeckyj-Cox (2010) found evidence of continued importance of parenthood such that women who remain childless were seen as more driven but also as more emotionally troubled. They found evidence that male students in particular had negative biases when it came to remaining childless in a marriage, suggesting it may be due to male concerns with regards to procreation and passing down the familial name. An important predictor of such attitudes is gender ideology and beliefs about women's and men's role, more specifically sexism.

#### Sexism and Attitudes Toward Childlessness

According to Glick and colleagues (Glick and Fiske 1996, 2001) sexism includes the endorsement of traditional gender roles, but they further argue that sexism aimed at women is likely to be ambivalent; involving both hostility and benevolence in its view of women. The concept of hostile sexism (HS) therefore includes negative and aggressive attitudes toward women who are thought to be striving to gain power over men by using their sexuality or feminism. Benevolent

sexism (BS), on the other hand, characterizes women as special, pure, and warm individuals who are at the same time weak and in need of protection. These seemingly positive attitudes have negative consequences for women. For instance, in a study conducted in Spain with a community sample of women and undergraduate students, it was found that BS functioned to restrict women's roles and led women to accept rules and regulations about their own behavior (Moya et al. 2007). In another such study conducted with Belgian women (community members and undergraduate students), benevolent sexism was found to be worse than hostile sexism in impairing performance on cognitive tasks by causing women to doubt their skills (Dardenne et al. 2007). Both hostile and benevolent sexism are complementary and mutually supportive, serving to justify and maintain inequality between groups (Glick and Fiske 2001).

In the most extensive international investigation of ambivalent sexism, measured in more than 15,000 people in 19 nations, it was found that both hostile and benevolent sexism were quite common (Glick et al. 2000). Men were found to endorse HS more commonly compared to women; however, women were found to endorse BS as much as men do. Results indicated that the more sexist the nation's men were the more benevolent sexist the nation's women were. Both types of sexism are therefore highly correlated and tend to sustain sexist ideology in complementary ways. Benevolent sexism rewards those women who accept traditional gender norms whereas hostile sexism punishes women who challenge the status quo (Glick and Fiske 2001). Although the samples in which Ambivalent Sexism Inventory (ASI) have been administered have mainly been undergraduate students, the countries chosen have been culturally diverse and the sub-factors of ambivalent sexism have held up, showing the pervasiveness of hostile and benevolent sexism across nations (Glick et al. 2000).

Similar findings have been found in the Turkish context. Although women's rights and opportunities have expanded (Hortacsu 2007), Turkish families are still generally maledominated and gender-stereotyped, particularly in comparison to industrialized Western countries (Kağitçibaşi 1982; Van Rooij et al. 2006). For instance, Glick et al. (2000) found that Turkey was relatively high in ambivalent sexism. In terms of gender differences on the sub-factors of ambivalent sexism, studies in Turkey with university students (Sakallı-Uğurlu 2002; Sakallı-Uğurlu et al. 2007) have found that men score higher on HS than do women, and relative to men, women are as likely to embrace BS. This is in line with the finding that in relatively gender-traditional societies (such as Turkey), men tend to score higher on HS and women tend to score similarly to, or higher than, men on BS (Glick et al. 2000). Work by Sakallı (2001) has also shown positive correlations among hostile sexism, benevolent sexism, and patriarchy in both male and female Turkish college students.

Ambivalent sexism can therefore justify and reinforce structural inequalities, prescribe traditional roles to men and women, and function to restrict women's roles-leading women to accept rules and regulations about their own behavior (Glick and Fiske 2001). These findings bring us to its link to attitudes toward childlessness. A role that is often prescribed to women is childbearing. This is evidenced in the motherhood mandate (Russo 1976), which equates motherhood with womanhood and has traditionally defined women's roles, identities, and social values through their motherhood (Ireland 1993), thus adding social and moral pressures to women not to remain voluntarily childless (May 1995). Although to date, there is no research that has directly tested the link between ambivalent sexism and attitudes toward childlessness, literature on traditional gender ideology can help guide us. For instance, previous research has established a link between low egalitarian gender views and unfavorable attitudes toward childlessness in many Western countries such as the United States, Australia, and Europe (e.g., Koropeckyj-Cox and Pendell 2007a; Tanturri and Mencarini 2008; Testa 2007). Speculatively then, those individuals who prescribe to ambivalent sexist ideologies will also be more likely to endorse negative attitudes toward remaining childless.

More specifically and in line with ambivalent sexism theory (Glick and Fiske 1996, 2001), in the current research BS (rather than HS) due to its emphasis of women as better suited for conventional roles (such as child bearer) was expected to be related to negative attitudes toward childlessness in both men and women. I hypothesized that because men and women are seen as naturally having different social roles (Eagly and Wood 1999; Gaunt 2006), benevolent sexism will value the role of motherhood as a necessary experience for all women. BS reinforces conventional gender relations by rewarding women who serve men as wives, mothers, or home-makers. As a result, those high in BS should punish women who do not abide by conventional roles such as childbearing. HS, on the other hand addresses power relations, gender differentiation, and sexuality (Glick and Fiske 1996) and may therefore be less predictive of attitudes toward childlessness. Nonetheless, HS is elicited by women who challenge or steal men's power (e.g., career women), therefore, women who remain childless may also be seen as challenging men's authority and power status (Glick and Fiske 2001). It is for this reason that no exact prediction was made for HS which was included for exploratory purposes.

## Religiosity, Sexism, and Childlessness

Research into potential causes of sexist ideology has consistently found that traditional gender-role attitudes are associated with conservative religious beliefs and religiosity (Brinkerhoff and Mackie 1985; Jensen and Jensen 1993; Kirkpatrick 1993), particularly those religions that are most conservative and fundamentalist and thus promote traditional roles for women (Anwar 1999; Armstrong 2002; Hunsberg et al. 1999). These beliefs might include patriarchal control of women and their sexuality, as well as idealize the separation of gender spheres and a time when women were subordinate to men (Anwar 1999).

Researchers have emphasized the importance of distinguishing between different forms of sexism that religious institutions are likely to affect. For instance, in their work on the link between hostile and benevolent sexism and Catholic religiosity using a random sample of adults from Galicia, Spain, Glick et al. (2002) stated that although a history of hostile misogyny within the Catholic tradition had previously existed, the contemporary Catholic Church has justified conventional gender roles by promoting benevolent forms of sexism while distancing itself from its more hostile counterpart. The Catholic Church's use of benevolent sexism to justify any restrictions it places on women is less likely to be resisted by women because it cherishes a woman's role in family and church. Similarly, it promotes benevolently sexist beliefs about men to justify their role as complementary to women's. Glick et al. (2002) found that Catholic religiosity predicted higher benevolent, but not higher hostile, sexist attitudes in both men and women. They suggested that active participation in the Catholic Church may serve to reinforce benevolently sexist ideologies that can legitimize gender inequality and rigid gender roles as attitudes "ordained by God" (Glick et al. 2002, p.434). Similarly, evidence linking Catholic religiosity to the endorsement of benevolent sexism was found in a survey with a convenience sample of train passengers in Southern and Eastern Poland by Mikolajczak and Pietrzak (2014). Furthermore, using a convenience sample of Israeli Jews, Gaunt (2012) found that more Jewish religiosity was associated with benevolent attitudes toward both women and men, as well as a negative association to hostile attitudes, mainly among men.

As for Islam, Taşdemir and Sakallı-Uğurlu (2010) replicated findings from works in Catholicism and Judaism and found that high Islamic religiosity significantly predicted benevolent sexism while controlling for hostile sexism in both male and female Muslim university students in Turkey. They suggested that because the Quran has verses that include men as women's protector and provider while at the same time emphasizing women's subordinate role to men, adherence to such traditional gender roles can be seen as a requirement of a moral, religious individual (Glick et al. 2015).

With regards to the link between religiosity and attitudes toward childlessness, research in Christian religiosity, such as that by Koropeckyj-Cox and Pendell (2007b) conducted in the United States, has confirmed that more favorable attitudes toward childlessness is reported in individuals with no religious preference, lower attendance, and less conservative beliefs about the Bible. As for Islam, it is speculated that those individuals with greater affiliation to Islam will have more negative attitudes toward remaining childless. In the Quran, children are gifts from Allah; according to Omran's (1992) review of key readings, Allah directs his followers to have children. Although there are no injunctions against contraceptive use in the Ouran, the religion is known to be pronatalist, and many Muslims believe that it is against their religion to use contraception (Obermeyer 1994). Some researchers (e.g., Van Rooij et al. 2006) have suggested that for the Turkish society, traditional patriarchal beliefs regarding procreation are present due to Islam. For instance, Cukur et al. (2004) found that religious college students in Turkey gave more importance to social status differences between groups and put greater value on traditions and conformity to social expectations. Moreover, Sevim (2006) found that those Turkish university students with higher levels of faith endorsed more traditional views of women, such as having negative attitudes toward women in the workplace.

## The Present Study

The current study therefore aimed to explore the relationships among ambivalent sexism, religiosity, and attitudes toward childlessness in a Turkish, Muslim sample. More specifically, the following hypotheses were generated:

Hypothesis 1: Due to the patriarchal nature of the Turkish society (Sakallı 2001) and in line with previous findings (e.g., Glick et al. 2000) it was expected that men would express more hostile sexist attitudes (Sakallı-Uğurlu 2002; Sakallı-Uğurlu et al. 2007) and more negative attitudes toward childlessness compared to women (Copur and Koropeckyj-Cox 2010 [Turkey]; Koropeckyj-Cox and Pendell 2007b [U.S.]). Similarly, due to patriarchy in the Turkish society, men might be expected to score higher than women for benevolent sexism; however in line with previous findings from Turkey (Glick et al. 2000; Sakallı-Uğurlu et al. 2007; Taşdemir and Sakallı-Uğurlu 2010), no significant gender difference for BS was expected.

Hypothesis 2: Women were expected to report higher levels of Islamic religiosity compared to men because women are consistently found to be more religious or spiritual compared to men worldwide (Anwar 2006).

Hypothesis 3: Similar to research conducted with other major world religions including Christianity (Burn and Busso 2005 [U.S.]; Glick et al. 2002 [Spain]; Mikolajczak and Pietrzak 2014 [Poland]) and Judaism (Gaunt 2012) and in line with prior findings on Islam (Taşdemir and Sakallı-Uğurlu 2010), Islamic religiosity and both HS and BS were expected to be positively correlated in both men and women. It was assumed that those individuals who report higher levels of Islamic religiosity would be more likely to hold sexist beliefs, that is, both HS and BS.

- Hypothesis 4: Due to its emphasis on women as weak and best suited for conventional roles, such as mother and child-bearer (Glick and Fiske 1996), it was expected that higher levels of BS would be related to negative attitudes toward childlessness in both men and women. No specific prediction was made for the relationship between HS and attitudes toward childlessness; rather, their examination was exploratory in nature.
- Hypothesis 5: Given the emphasis on childbearing found in the Quran and the pronatalist stance of Islam, it was hypothesized that higher levels of Islamic religiosity would to be related to negative attitudes toward childlessness in both men and women (also in accordance with research conducted on Christianity in the U.S.; e.g., Koropeckyj-Cox and Pendell 2007b).

In order to test these hypotheses, multiple regression analyses were conducted whereby religiosity, BS, and HS were entered as predictors of attitudes toward childlessness. Due to the high correlation between BS and HS (Glick et al. 2000), two separate regressions were conducted for these variables, with HS included for exploratory purposes. Additionally, the regression analyses were conducted separately for women and men.

# Method

#### **Participants**

Turkish undergraduate students (N=160) initially participated in the present study. Three identified their religion as Christianity and were therefore eliminated from the analysis of the study, leaving a total of 157 participants (79 women, 78 men) all of whom defined their religious affiliation as Islam. The age range was from 17 to 30 years-old, with a mean ages of 20.82 (SD=2.16) for women and 22.06 (SD=2.90) for men, t (155)=3.04, p=.003. Almost half the women (48.1 %) and men (46.2 %) reported being in a romantic relationship,  $\chi^2$  (3)=4.95, p=.18. Students came from various regions of Turkey and North Cyprus.

#### **Procedure and Measures**

Participants received the set of pencil-and-paper questionnaires in a classroom setting by both female and male researchers, after providing consent and with measures appearing in the order that follows. Having completed the measures, participants were thanked and debriefed. Students received extra course credit for their participation. Institutional Review Board (IRB) approval was obtained prior to conducting the study.

#### Ambivalent Sexism

The Ambivalent Sexism Inventory (ASI; Glick and Fiske 1996) was used to measure ambivalent sexism. The scale consists of 22 items, with 11 items measuring hostile sexism and 11 items measuring benevolent sexism. HS subscale includes items such as "Most women interpret innocent remarks or acts as being sexist" and "Feminists are not seeking for women to have more power than men" (reverse scored). The BS subscale includes items such as "Many women have a quality of purity that few men possess" and "In a disaster, women ought not necessarily be rescued before men" (reverse scored). Participants rate their agreement to each statement from 0 (Strongly Disagree) to 5 (Strongly Agree), with higher scores indicating higher HS and BS. The means of the item responses were calculated and used in the analyses for both subscales. The ASI has been translated and adapted to Turkish in a previous study by Sakallı-Uğurlu (2002) and demonstrates high reliability and validity. In the current study, internal consistency reliability was found to be sufficient for both HS ( $\alpha = .74$ ) and BS ( $\alpha = .76$ ).

#### Attitudes Toward Childlessness

Attitudes toward childlessness were assessed by collecting a number of items used in previous studies on attitudes toward childlessness which include the imperative of parenthood and potential disadvantages of childlessness (Koropeckyj-Cox and Pendell 2007a, b). Because my focus was on overall attitudes toward childlessness in reference to both men and women, all items were combined. Factor analysis indicated a onefactor solution which accounted for 34.52 % of the variance. Factor loadings after varimax rotation showed that all items loaded on a single factor (8 items, loadings from .18 to .78;  $\alpha = .70$ ). The scale included the following eight items: "People who have never had children lead empty lives," "It is better to have a child than to remain childless," "A woman can have a satisfying life without children" (reverse coded), "A man can have a satisfying life without children" (reverse coded), "The main purpose of marriage is to have children," "Children are life's greatest joy," "Children interfere with parents' freedom" (reverse coded), and "I want to have children."

Scores ranged from 1 (*strongly disagree*) to 9 (*strongly agree*), wherein higher scores indicated more negative attitudes to childlessness. The means of the eight item responses were obtained to create a reliable measure of attitudes toward childlessness. The Turkish version of the scale was translated from English to Turkish by a native, professional Turkish translator and then back-translated to English by a bilingual university instructor fluent in both languages. The original and its translation was then compared and evaluated by an independent bilingual instructor to ensure the accuracy and equivalency of the translation.

## Religiosity

Religiosity was measured using a single item in which participants were asked to state the extent to which they felt religious on a scale ranging from 1 (*very low*) to 9 (*very high*). Higher scores indicated higher feelings of religiosity. This single-item measure of religiosity was a crude measure. However, single items have been used in previous research (e.g., Glick et al. 2000), and although a large majority of Turkish people identify as being Muslim (official figures from the Directorate of Religious Affairs (2014) report this as approx. 99.2 %), the extent to which a person feels religious (ranging from low to high) was a more important measure for the current research.

# Results

In order to test Hypotheses 1 and 2, a MANOVA was conducted to determine whether women and men differed on their HS, BS, religiosity scores, and attitudes toward childlessness. There was a statistically significant effect of gender on the dependent measures, F(4, 149) = 7.99, p < .001,  $\eta p^2 = .18$ , Wilks'  $\lambda = .82$ . This difference was due to the effects of gender on HS, F(1, 152) = 10.96, p = .001, such that men (M = 2.97, SD = .80) scored higher than did women (M = 2.54, SD = .83) and on religiosity, F(1, 152) = 4.33, p = .039, whereby women (M = 4.97, SD = 2.26) scored higher than did men (M = 4.19; SD = 2.38). There were no significant differences between men and women on either benevolent sexism or attitudes toward childlessness (see Table 1).

Zero-order correlations between variables are presented in Table 2. The analyses were computed separately for women (above the diagonal) and men (below the diagonal). Consistent with Hypothesis 3, significant relationships between religiosity with both HS and BS were obtained for both genders. Most of the correlations were moderate, except for the correlation between HS and BS in women which was relatively higher. This is consistent with previous findings conducted on the Turkish society and abroad (Glick et al. 2000; Sakalh 2001).

 Table 1
 Descriptive statistics for study variables for women and men

Variables	Women		Men		
	М	SD	М	SD	
Hostile Sexism	2.54 <sup>a</sup>	.83	2.97 <sup>a</sup>	.80	
Benevolent Sexism	2.98	1.03	2.75	.75	
Religiosity	4.97 <sup>b</sup>	2.26	4.19 <sup>b</sup>	2.38	
Attitudes toward Childlessness	4.96	1.61	4.81	1.59	

HS and BS scales range from 0 to 5; Religiosity and attitudes toward childlessness scale scores from 1 to 9. Higher scores indicate higher HS, BS, religiosity. and more negative attitudes to childlessness

<sup>a</sup> Means between genders significant at p < .01

<sup>b</sup> Means between genders significant at p < .05

In order to test the predictions of Hypotheses 4 and 5 about the effects of HS, BS, and religiosity on attitudes toward childlessness, two regression analyses were conducted. As shown in Table 2 and in line with previous research in the area (Glick et al. 2000), BS and HS were highly correlated and therefore separate regression analyses were conducted. In the regression analyses, attitudes toward childlessness was the dependent variable, and HS or BS and religiosity were predictor variables. Separate analyses are reported for women and men and can be seen in Table 3. To determine whether the data met the assumption of collinearity the Variance Inflation Factor (VIF) was computed. As a rule, multicollinearity is detected if the VIF is more than 10 (O'Brien 2007). Results indicated low levels of multicollinearity (for BS, VIF = 1.323; for HS, VIF = 1.268; and for religiosity, VIF = 1.135).

In women, religiosity and BS explained 18 % of the variance in attitudes toward childlessness, F(2, 76)=8.05, p =. 001; BS alone was significant (*beta* = .32, *p* = .006) in predicting attitudes in the model (see Analysis 1 in Table 3). In men, religiosity and BS explained 16 % of the variance in attitudes toward childlessness, F(2, 76)=6.83, *p* = .002; BS

 Table 2
 Correlations among HS, BS, religiosity, and attitudes toward childlessness

Variables	Hostile Sexism	Benevolent Sexism	Religiosity	Attitudes toward Childlessness
Hostile Sexism	_	.66**	.30**	27*
Benevolent Sexism	.29*	-	.37**	.37**
Religiosity	.33**	.24*	-	.30**
Attitudes toward Childlessness	.22 *	.37**	.21 *	-

Correlations for women (n = 79) are presented above the diagonal; for men (n = 78), below the diagonal

<sup>†</sup> p = .06. \* p < .05. \*\* p < .01

 Table 3
 Hierarchical regression analyses predicting attitudes toward childlessness

Predictors	Women			Men	Men		
	В	SEb	β	В	SEb	$\beta$	
Analysis 1							
Benevolent Sexism	.49	.56	.32**	.73	.23	.34**	
Religiosity	.13	.08	.19	.09	.07	.13	
	$R^2 = .18$		$R^2 = .16$				
Analysis 2							
Hostile Sexism	.45	.22	.22*	.33	.24	.17	
Religiosity	.17	.08	.23*	.10	.08	.16	
	$R^2 = .14$			$R^2 = .07$			

<sup>†</sup> p=.06. \* p<.05. \*\*p<.01

alone was significant (beta = .34, p = .002) in predicting attitudes in the model.

In women, religiosity and HS, explained 14 % of the variance in attitudes toward childlessness, F(2, 76) = 6.14, p =. 003. Religiosity (*beta* = .23, p = .042) was a significant predictor of attitudes toward childlessness, whereas HS (*beta* = .22, p = .064) was marginal (see Analysis 2 in Table 3). In men, religiosity and HS explained 7 % of the variance in attitudes toward childlessness, however the model was not significant, F(2, 76)=2.72, p = .07.

#### Discussion

The aim of the present study was to examine the role of ambivalent sexism and religiosity on attitudes toward childlessness in a sample of Turkish Muslim undergraduate students. Partial support was found for Hypothesis 1 in which men were assumed to score higher than women in hostile sexism and report more negative attitudes toward childlessness. It was however found that men only showed higher HS compared to women, and no significant difference between the two genders was obtained for attitudes toward childlessness. Additionally, no significant gender difference was found for BS. Research on ambivalent sexism has often shown women to score higher or equal to men in BS, particularly in countries such as Turkey where HS and patriarchy are high (Glick and Fiske 2001; Sakallı 2001; Taşdemir and Sakallı-Uğurlu 2010). The standard deviation for men on the BS scale was however quite high, indicating a lack of uniformity and instead polarization in response to this measure for the men in the current sample which might also account for the lack of gender differences obtained. Women were found to report higher levels of Islamic religiosity compared to men in line with research by Anwar (2006). As predicted in Hypothesis 3, religiosity and both types of ambivalent sexism were correlated. Results showed that higher levels of BS (in both men and women) and religiosity (in women) predicted negative attitudes toward childlessness, partially supporting the assumptions of Hypotheses 4 and 5.

BS was found to be a stronger and more consistent predictor of negative attitudes toward childlessness compared to HS for both male and female Turkish students. A closer examination of both sub-factors of ambivalent sexism and the traditional gender system in Turkey helps to explain the findings better. Whereas hostile sexism is more involved in beliefs that women are inferior and threatening to take over men's rightful dominant position in society, benevolent sexism emphasizes women as pure beings in need of protection and adoration, which implies that women are weak and best suited for conventional roles, such as mother and housewife (Glick and Fiske 1996). Childbearing is a role in which women are assumed to have inherent and ideal traits (e.g., a "maternal instinct"), which perpetuates beliefs of men and women as being "naturally/biologically different" (Gaunt 2006) and corresponds to the concept of BS. This might explain why BS is a stronger predictor of attitudes toward childlessness compared to HS. BS also rewards women who accept conventional gender norms and power relations, leading women to be more likely to endorse BS, particularly in cultures or societies high in HS such as Turkey (Glick et al. 2000). BS is additionally received with much less reactance from women compared to HS (Glick et al. 2000) because overtly hostile sexist views are becoming politically incorrect as women continue to pursue careers outside the home. BS can therefore be regarded as a "celebration" of a woman's significant and unique role in family and religion (Burn and Busso 2005; Glick et al. 2000). This is likely to be the case in Turkey where men are high in HS and women score similarly to, or higher than, men in BS (Glick et al. 2000; Sakalli 2001). It is therefore not surprising that conventional roles such as motherhood and childrearing are characteristics expected of a "good" Turkish woman, and hence a likely correlate of BS.

In their study with Turkish university students, Copur and Koropeckyj-Cox (2010) found evidence of traditional ideologies for parenthood and stereotypes regarding childless couples. For instance, participants reported parents as having better marital relationships and positive emotionality than childless couples. Childless couples were thought to be more likely to experience negative conflicts within the marriage. Particularly interesting was the difference in the perception of working women with or without children in different occupations. Childless women who were in traditionally female jobs that included femininity and caretaking were seen as more positive than childless women in less traditional occupations such as lawyer or office-based secretary. Although these authors did not measure ambivalent sexism, these stereotypical representations of childbearing women as more emotional, as well as the more positive evaluations of childless women only if they have traditionally female occupations (e.g., nurse), fit into the description of benevolent sexist ideology whereby women who fulfil the traditional mold are rewarded.

In line with research in the United States (Koropeckyj-Cox and Pendell 2007b), higher levels of religiosity predicted more negative attitudes toward childlessness, particularly in women. According to the Quran, children are gifts from Allah, and many Muslims believe that it is their religious duty to populate the earth, hence unequivocal support is given to high fertility in Islam (Schenker 2000).

The findings of my study with a predominantly Muslim society show some overlap with studies conducted on the role of Christianity and ambivalent sexism (see Burn and Busso 2005 [U.S.]; Glick et al. 2002 [Spain]; Mikolajczak and Pietrzak 2014 [Poland]) as well as Judaism and ambivalent sexism (Gaunt 2012) in which religiosity was consistently found to uniquely predict benevolent sexist (and not hostile sexist) attitudes. In the current study however, a significant link between both types of sexism and religiosity was obtained. In fact, religiosity was more strongly correlated with hostile sexism than with benevolent sexism in men, whereas the opposite was observed in women (i.e., the correlation between religiosity and benevolent sexism was stronger than that between religiosity and hostile sexism). This extends findings by Taşdemir and Sakallı-Uğurlu (2010) who found the link between religiosity and both types of ambivalent sexism to be strongly correlated in men, but for women only benevolent sexism and religiosity were related. It may be the case that Turkish religious men justify their domination over women and punish non-conformist women by holding negative and aggressive attitudes reflected in their higher hostile sexist attitudes. As for women, those who are more religious are more likely to endorse benevolent sexist views which suggest a woman who is pure and nurturing should be protected by a man. By accepting benevolent sexism, women may be protected from hostile sexist views (Glick et al. 2000; Taşdemir and Sakallı-Uğurlu 2010). As stated previously, such views may be endorsed due to interpretations of the Quran stating men to be the protector and maintainer of women.

It is important to state that there are several variants to religious traditions and not all are represented by patriarchal or misogynous practices (Ruether 2002). However, in line with research conducted with other major world religions such as Catholicism and Judaism and prior work on Islam, the findings of my research confirm the notion that as strength of affiliation to religious practices that share texts or traditions that justify rigid gender roles as bound by God or the holy book increase, it may reinforce benevolently sexist ideologies. This can in turn legitimatize gender inequality, or as seen in my study, restrict a woman to conventional roles such as child bearing. Further studies need to be conducted to see if these findings on attitudes toward childlessness overlap with other world religions as well.

It is necessary to note some caveats that should be kept in mind when interpreting the results of my study. Firstly, its design is correlational and therefore does not offer any cause-effect relationships. Being high in benevolent sexism might promote negative attitudes toward childlessness, however individuals with more negative beliefs about remaining childless can be attracted to benevolent sexist ideologies, therefore the relationship might be reciprocal. Secondly, the single-item measure of religiosity was a rather crude measure for a multifaceted construct like religiosity and a more reliable measure of religiosity that is less susceptible to social desirability biases should be used in future research. For instance a 14-item religiosity scale was used by Taşdemir and Sakallı-Uğurlu (2010) which might be a more comprehensive tool for measuring religiosity. Additionally, the attitudes toward childlessness measure, although based on prior questionnaires on the topic of childlessness, needs to be further validated in future research.

Thirdly, the present study can provide insight into the relationship between ambivalent sexism components, religiosity, and attitudes toward childlessness in a Turkish student population alone. Stronger or different findings may have been obtained with a broader or more diverse sample including non-student populations with adults from a variety of religions. The current student population reported average levels of religiosity and lower than mid-range ambivalent sexism scores. Similarly, a lack of uniformity in response to the BS measure was obtained for the men in the current sample. The participant pool might therefore be less religious and sexist than their older counterparts with very different viewpoints on the constructs of my study.

Further research is also needed to generalize the results to Western cultures, in order to get a more comprehensive picture of the consequences of ambivalent sexism and religious ideology. Research has shown that education can be particularly beneficial in reducing sexist attitudes and egalitarian ideologies (Benson et al. 1980; Farley et al. 1994). For instance it was shown that despite high Catholic religiosity in Spain being linked to more hostile and benevolent sexist attitudes, educational attainment was predictive of less ambivalent sexist attitudes (Glick et al. 2002). It would be noteworthy to see whether education is successful in combating sexism in Islamic cultures such as Turkey. Lastly, the use of self-report measures leaves the research open to social desirability biases which can in the future be addressed by use of more implicit measures.

To conclude, despite research previously highlighting the relationship between more traditional beliefs and negative attitudes toward childlessness, the present study is the first time known that the relationships between subfactors of ambivalent sexism and attitudes toward childlessness have been investigated. Benevolent sexism is deeply rooted in religion which in turn capitalizes on justifying traditional gender roles such as denying women the right to remain childless. This may be a significant obstacle toward attaining gender equality.

**Compliance with Ethical Standards** The work reported in this manuscript is original, has not been published elsewhere, and is not currently under review in any other journal. The directions for submission of manuscripts have been carefully read and the submission of this manuscript conforms to them all.

APA ethical standards for the treatment of samples have been adhered to.

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