

REGULAR ARTICLE

Under what conditions do gender differences exist in power and achievement values? The moderating role of gender ideology

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Abstract

Previous studies revealed differences between men and women in value priorities. It has been asserted that men do inherently attribute more importance than women to power and achievement values. Our study brings a sociocultural lens into account employing gender ideology as a moderator of the gender differences in these values. Specifically, we hypothesized that internalization and endorsement of gender role ideology shape gender differences in power and achievement values. We focused on two components of gender ideology as moderators of the gender differences in values: primacy of the breadwinner role, and acceptance of male privilege. We used data from the World Values Survey wave six (89,565 participants from 60 countries). Results indicated that gender ideology moderated the relationship between gender and the endorsement of achievement and power values. Specifically, the relationship between gender and achievement was significantly moderated by acceptance of male privilege, but not of primacy of the breadwinner role. In addition, the association between gender and power was significantly moderated by primacy of the breadwinner role, but not by acceptance of male privilege. In other words, when participants endorse egalitarian gender ideologies, gender differences in power and achievement disappear or even reverse. We contrast previous perspectives assuming inherent gender differences in human values and argue that such differences are related to beliefs in gendered separate spheres.

KEYWORDS

attitudes, gender differences, gender roles, human values, ideology

1 | INTRODUCTION

Human values are commonly defined as trans-situational goals, varying in importance among cultures, groups, and individuals, that serve as guiding principles in life (Sagiv & Schwartz, 2022; Schwartz, 1992). The values are organized in a hierarchy of importance and the most important values guide the actions. Schwartz (1992) identified 10 motivationally distinct basic values including achievement (personal success through demonstrating competence according to social standards) and power (social status and prestige,

control or dominance over people and resources). Two studies have focused on gender differences in human values (Schwartz & Rubel, 2005; Schwartz & Rubel-Lifschitz, 2009), both reporting that men score higher than women on power and achievement values. To investigate the underpinnings of gender differences in power and achievement values, Schwartz and Rubel-Lifschitz (2009) analysed data from 25 representative national samples and of students from 68 countries relying on evolutionary psychology and social role theory (SRT). Specifically, according to their explanation based on evolutionary psychology (Davies &

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Shackelford, 2008; Kenrick et al., 2002), women had to invest in parenting more than men. This investment prompted women to search for a mate who could provide resources for the raising of offspring. As their choice was essential to making a good investment, women then used men's status as a cue for mate searching because powerful high-status men typically controlled more resources. To achieve a dominant position, men developed a motivational incentive to compete with other men to be chosen by women. So, seeking status (power value) and obtaining resources and success (achievement value) have become central psychological goals for men (Schwartz & Rubel-Lifschitz, 2009). The focus of the evolutionary framework on biological and physical characteristics tends to overlook the fact that historically the role of women was not limited to reproduction and care and that “reconstructions of the past are in some respects also reflections of the present” (Fedigan, 1986, p. 63). There is evidence that historically women participated in the labour force and reproductive activities and did not foreclose the participation and contribution to productive activities (Fedigan, 1986; Pedraza, 1991). Following SRT (Wood & Eagly, 2002) instead, Schwartz and Rubel-Lifschitz (2009) would attribute the source of gender differences in power and achievement values to the division of labour, as the different occupational and family roles generate gender role expectations that indirectly influence men and women's values. However, in their article of 2009, Schwartz and Rubel-Lifschitz found that in more gender-equal countries¹ gender differences in power and achievement increased (men endorsed power and achievement more than women did, and women endorsed universalism and benevolence more than men did). Based on this finding it was concluded that gender equality allows men and women to *freely express their inherent value preferences* so that the importance of a value is augmented or diminished more for the gender to which it is intrinsically more important. From our perspective, this interpretation switched from a sociocultural (e.g., socialization of gender role expectations) to a biological essentialist (the innate predictive potential of gender categories, e.g., Haslam et al., 2000) explanation. As Schwartz and Rubel-Lifschitz claim:

The social role perspective (Wood & Eagly, 2002) points to the interaction of the demands of the socioeconomic and ecological systems with men's higher testosterone levels and larger physical size. This interaction may account for men's predominance across cultures in occupations that enjoy more power and status (Whyte, 1978). Their biological and physical characteristics may incline men to seek power and achievement

in the labor market and hence to value them more than women do.

(Schwartz & Rubel-Lifschitz, 2009, p. 173)

In the present study, we challenge the idea that power and achievement values are inherently more important for men than for women. We argue that gender differences in power and achievement are a function of the socialization and internalization of cultural beliefs about gender roles (i.e., gender ideology), rather than a sex-specific psychological disposition. We are therefore challenging the interpretation of Schwartz & Rubel-Lifschitz's results, without trying to replicate their study. Gender inequality refers to the systemic and institutional factors driving different rights and dignity for men and women and is related to but distinct from gender ideology because it refers to cultural beliefs about gender roles (e.g., Brandt, 2011; Cotter et al., 2011; Glick, 2006; Shu & Meagher, 2018; Stefani & Prati, 2022).

1.1 | Gender ideology as a cultural belief system

Gender ideologies are sets of latent cultural beliefs about the essential natures and relative characteristics of men and women. We refer to the definition of Davis and Greenstein (2009), who use the term gender ideology to represent the underlying concept of an “individual's level of support for a division of paid work and family responsibilities based on the notion of separate spheres” (p. 88). Within this definition, endorsing higher levels of gender ideology means holding a more “traditional” gender ideology, while endorsing lower levels of gender ideology means having a more “egalitarian” gender ideology. However, there is evidence that different and mixed dimensions of gender ideologies coexist within a society given the complexity of the beliefs about the roles of women and men (e.g., Ciabattari, 2001; Davis & Greenstein, 2009; Knight & Brinton, 2017). According to Davis and Greenstein (2009), different components of gender ideology should be considered, including the primacy of the breadwinner role and acceptance of male privilege. The primacy of the breadwinner role refers to the traditional division of paid and unpaid work, with women viewed as homemakers and men as breadwinners. The acceptance of male privilege refers to the construction of a system of special privileges and status that are granted to men solely on the basis of their sex (Stefani & Prati, 2022). The core beliefs of gender ideology have also been studied as specific prescriptive beliefs about gender roles (Diekmann et al., 2020; Eagly et al., 2000). Characteristics and attributes associated with a determined gender role are culturally built, socially shared, and individually internalized

(Eagly & Wood, 2012; West & Zimmerman, 1987), and usually reflect genders' positioning in the social structure. Even though inter-individual variability in endorsing gender ideology exists (and depends on the extent people internalize gender roles; e.g., Zittoun & Gillespie, 2015), individuals are prompted to internalize cultural models of gender to develop a stable and positive identity (Wood et al., 1997). As a hegemonic cultural understanding of the gender system, gender ideology would affect gender differences in values because it reflects the level of internalization of cultural norms associated with the prescriptive components of the gender role (Eagly et al., 2000; Eagly & Wood, 2012). Specifically, widespread internalized beliefs that men are powerful, dominant, and competitive are likely to bring men to endorse power and achievement values more than women. Some evidence of the relationship between traditional gender roles and typical gendered values has been documented. For instance, Di Dio et al. (1996) found an association between typical masculine personal values and cultural beliefs about gender and gender roles. They suggested that gender-related personal values should be included with traits, interests, role behaviours, and global self-concepts as part of gender characteristics. Other authors similarly rebutted claims about “inherent” gender differences in gender-related outcomes. For instance, cultural beliefs about gender and gender roles were used to understand under what conditions gender differences exist in emotional expressiveness (Grossman & Wood, 1993); mate preferences (Eastwick et al., 2006); division of household labour (Greenstein, 1996; Lothaller et al., 2009), fertility (Stewart, 2003); preference for science, technology, engineering, and mathematics (STEM) fields (Breda et al., 2020); and work, earnings, and education (Christie-Mizell, 2006; Davis & Pearce, 2007; Stickney & Konrad, 2007).

In the present study, we reject the notion of inherent gender differences in power and achievement values. We argue that gender ideology can reveal under what conditions or when such gender differences in power and achievement values exist. Specifically, we hypothesized that gender ideology (internalized prescriptive beliefs about gender roles) would moderate the relationship between gender and achievement and power values. To take the multidimensionality of gender ideologies into account, we focused on two components of gender ideology: (a) primacy of the breadwinner role, and (b) acceptance of male privilege. The primacy of the breadwinner role refers to essentialist beliefs concerning the work-life spheres (Davis & Greenstein, 2009), a dimension that emphasizes which spaces genders have to occupy (for women, the home/private sphere, and for men, the work/public domain). Acceptance of male privilege is instead connected to the gender hierarchy in the competence dimension, conceiving women as the inferior group.

1.2 | Hypotheses

We argue gender differences in power and achievement values would be moderated by the level of gender ideology. The proposed model is depicted in Figure 1. Specifically, we hypothesize the following:

Hypothesis 1. Gender differences in achievement value will decrease as the levels of (a) primacy of the breadwinner role, and (b) acceptance of male privilege decrease.

Hypothesis 2. Gender differences in power value will decrease as scores on (a) primacy of the breadwinner role, and (b) acceptance of male privilege decrease.

2 | METHOD

2.1 | Data

In this study, we have used the World Values Survey (WVS) wave six (Inglehart et al., 2014) to obtain data on both human values and gender ideology. The ethical review and authorization for the WVS wave six-study is granted by the WVS Association Secretariat Executive Committee. Data from wave six were collected between 2010 and 2014 at the respondents' homes or places of residence. Wave six included representative samples of people aged 18 and older from 60 different countries. There were 89,565 participants, of which 43,782 (48.9%) were men and 45,691 (51.0%) were women. In the overall sample, 49,871 people (55.8%) were married and only 23,030 (25.8%) were single, while 26,308 respondents (29.4%) had no children and only 13,606 (15.5%) reported having more than three children. Regarding education, 14,526 people (16.4%) achieved a university degree, 17,175 (19.3%) completed secondary school, 9,996 (11.3%) completed primary school, and 10,789 (12.2%) had no formal

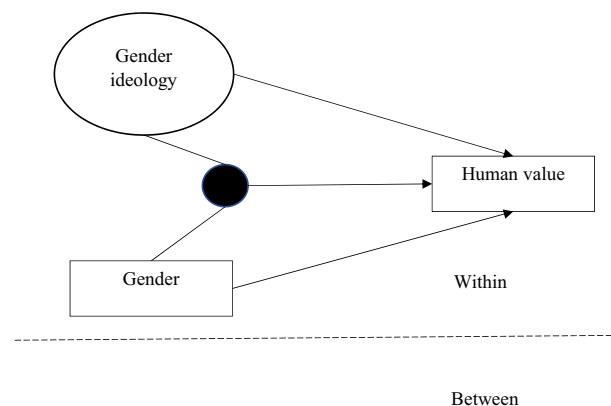


FIGURE 1 Hypothesized structural equation model.

education or had not completed primary school. Finally, 47,576 participants (54.1%) reported being employed, and only 8626 (9.8%) were unemployed. Additionally, housewives were 13,157 (14.9%), retirees were 10,533 (12.0%), and students were 6427 (7.3%). In Appendix S1, country-specific gender and age information is provided.

2.2 | Measures

2.2.1 | Schwartz human values

Measures for human values were obtained through a 10-item version (i.e., one item for each value) of the Portrait Values Questionnaire (PVQ; Schwartz et al., 2001) used in the WVS questionnaire.² Each item refers to one value and describes a person's goals, aspirations, or wishes that point implicitly to the importance of that value. For each portrait, respondents answered the question "How much like you is this person?" with a score ranging from 1 (*very much like me*) to 6 (*not like me at all*). The PVQ inferred respondents' values from their self-reported similarity to people implicitly described in terms of particular values. Specifically, "Being very successful is important to this person; to have people recognize one's achievements" describes a person for whom achievement value is important, whereas "It is important to this person to be rich; to have a lot of money and expensive things" describes a person for whom power value is important. Following the recommendations of Schwartz and Rubel-Lifschitz (2009, p. 176), we "centered each person's responses on his or her own mean for all items to eliminate individual differences in the use of the response scale... This converts absolute scores into value priorities that indicate the relative importance of each value to the person."

Moreover, to ease data interpretation of the present research, we reversed the scores so that higher scores reflected greater importance given to power or achievement value.

2.2.2 | Gender ideology

We used a multidimensional approach to measure gender ideology. Specifically, we employed the primacy of the breadwinner role dimension (i.e., two items, "When jobs are scarce, men should have more right to a job than women" and "If a woman earns more money than her husband, it's almost certain to cause problems") and the acceptance of the male privilege dimension (i.e., three items "Men make better political leaders than women do," "University is more important for a boy than for girl," and "Men make better business executives than women do"). The names of the dimensions and the items used to measure these dimensions were based on the work of Davis and Greenstein (2009; see also Stefani &

Prati, 2022). Respondents were asked to report whether they agreed or disagreed with the above-mentioned statements. Items on acceptance of male privilege were rated on a 4-point scale (1 = *Strongly agree*, 2 = *Agree*, 3 = *Disagree*, 4 = *Strongly disagree*), while items on primacy of the breadwinner role were evaluated on a 3-point scale (ranging from 1 = *Agree* to 3 = *Disagree*). To calculate the final scores, responses were averaged. We reversed the scores for ease of interpretation so that higher scores indicated higher levels of (traditional) gender ideology. In the current study, the reliability of the acceptance of male privilege was $\alpha=0.75$ and the correlation coefficient between the two items measuring primacy of the breadwinner role was 0.67.

Gender was coded as 2 for women and 1 for men.

For some questions, the sample was structurally reduced: About 2.8% of the data on power value and 3.1% of the data on achievement value are lacking because the questions were not asked in some countries included in the survey. For the gender ideology variables, there were also some missing data. The total percentages of missing values for primacy of the breadwinner role and acceptance of male privilege were 1.1% and 1.5%, respectively.

2.3 | Statistical analysis

To establish the measurement model, we conducted a test of the overall measurement model involving all study variables simultaneously using Mplus v. 8.6. An adequately fitted measurement model is considered a prerequisite before estimation of the model using structural equation modelling (SEM; e.g., Byrne, 2012). The single-item Schwartz values questionnaire items were added as observed variables that are related to latent variables. The responses to the gender ideology questions were treated as ordered categorical (ordinal) variables that are related to latent variables.

To test our hypotheses using a dichotomous independent variable (gender: male vs. female) and latent moderator variables (i.e., gender ideology) to predict the dependent variables (i.e., human values), we used multilevel structural equation models to take the data hierarchy (due to grouping into countries) into account in the model and full information to handle missing data. Specifically, in Mplus the Bayesian estimator uses full information from all observations. We estimated a model with random intercepts and slopes. To test the moderation hypotheses, Bayesian estimation of latent moderated structural equations (Asparouhov & Muthén, 2021) was used. Analyses were controlled for age, education, job, and marital status. Specifically, we conducted four (multilevel) latent moderated structural equations, related to the separate components—primacy of the breadwinner role and acceptance of male privilege—of Hypotheses 1 and 2. Significant moderation effects were probed using the Johnson-Neyman

technique (e.g., Bauer & Curran, 2005; Lin, 2020). The Johnson-Neyman technique reveals whether the effect of an independent variable on a dependent variable varies from being statistically significant or not conditional on changes in the value of a moderating variable. When using the Johnson-Neyman technique to probe the interpretation of a moderation effect, a regression line with the effect regressed on the moderator is used. The *x*-axis represents the values of the moderator while the *y*-axis represents the effect of the independent variable. When the regression line is above, below, or crosses the *x*-axis, the effect of the independent variable is positive, negative, or zero, respectively. To determine the region(s) of significance, the Johnson-Neyman technique provides 95% confidence bands around the regression line. Usually, vertical dotted lines are used to specify the actual region of non-significance.

To determine standardized effect sizes for moderated conditional effects, we followed the guidelines of Bodner (2017). Specifically, a comparison of standardized mean differences for a 2 standard deviation difference in the moderator variable of 0.1, 0.3, and 0.5 could be considered small, medium, and large differences, respectively.

Because typical fit indices are not available from latent moderated SEM (Asparouhov & Muthén, 2021; Cortina et al., 2019), to estimate fit indices, we used the product of

scales approach (Cortina et al., 2019) using a maximum likelihood estimation with robust standard errors.

3 | RESULTS

An overall measurement model (Figure S1 in Appendix S1) involving gender ideology (i.e., primacy of the breadwinner role and acceptance of male privilege) and value (i.e., achievement and power) variables demonstrated excellent fit, $\chi^2(11)=35.511$, $p<0.001$, normed fit index (NFI)=0.99, comparative fit index (CFI)=0.99, root mean square error of approximation (RMSEA)=0.005, 95% confidence interval (CI) [0.003, 0.007]. The resulting model fit is satisfactory. More specifically, confirmatory factor analysis showed evidence of four distinct constructs: primacy of the breadwinner role, acceptance of male privilege, achievement, and power. Table 1 displays the means, standard deviations, intraclass correlations, and correlations for study variables.

The results of the four latent moderated structural equations are reported in Table 2. Concerning Hypotheses 1, the direct path between gender and achievement was significantly moderated by acceptance of male privilege (Hypothesis 1b), $b=-0.03$, $SE=0.01$, 95% CI [-0.05, -0.02], $p<0.001$, but not by primacy of the breadwinner role (Hypothesis 1a), $b=-0.01$, $SE=0.01$, 95% CI [-0.04, 0.02],

TABLE 1 Correlations, descriptive statistics, and gender differences for study variables.

	Men	Women	1	2	3	4
	<i>M</i> (SD)	<i>M</i> (SD)				
1. Primacy of the breadwinner role	2.02 (0.72)	1.86 (0.69)	0.20			
2. Acceptance of male privilege	2.51 (0.80)	2.22 (0.78)	0.78*	0.22		
3. Power	-0.82 (1.34)	-0.94 (1.32)	0.08*	0.15*	0.15	
4. Achievement	0.04 (1.08)	-0.08 (1.11)	-0.17*	0.07*	-0.00	0.07

Note: Means are those for the averaged composites. Correlation coefficients were derived using a multilevel structural equation modelling framework. Intraclass correlation coefficients ($ICC=(\text{Between-cluster variance}/\text{Total variance})=(\text{var}(u_{0j})/(\text{var}(u_{0j})+\text{var}(e_{ij})))$) are presented on the diagonal.

* $p<0.05$.

TABLE 2 Results of the four (multilevel) latent moderated structural equations.

Predictors/dependent variables	Achievement		Power	
	<i>b</i> (SD)	95% CI	<i>b</i> (SD)	95% CI
Gender	-0.09 (0.01)	-0.11, -0.08	-0.07 (0.01)	-0.09, -0.05
Primacy of the breadwinner role	0.11 (0.02)	0.07, 0.16	0.29 (0.02)	0.25, 0.34
Gender × primacy of the breadwinner role	-0.01 (0.01)	-0.04, 0.02	-0.07 (0.01)	-0.10, -0.05
	CFI=0.996, RMSEA=0.026		CFI=0.995, RMSEA=0.026	
Gender	-0.08 (0.01)	-0.10, -0.07	-0.04 (0.01)	-0.06, -0.02
Acceptance of male privilege	0.10 (0.01)	0.08, 0.12	0.13 (0.01)	0.10, 0.16
Gender × acceptance of male privilege	-0.03 (0.01)	-0.05, -0.02	0.01 (0.01)	-0.01, 0.03
	CFI=0.992, RMSEA=0.032		CFI=0.991, RMSEA=0.032	

Note: Coefficients are unstandardized. Gender was coded as 2 for women and 1 for men. All the predictors and dependent variables are at the within-individual level.

Abbreviations: CFI, comparative fit index; CI, confidence interval; RMSEA, root mean square error of approximation.

$p=0.338$. As expected, gender differences in achievement decreased as the levels of acceptance of male privilege diminished. Utilizing the Johnson-Neyman technique (Figure 2a), we determined that gender (male) was significantly associated with achievement when a participant's acceptance of male privilege exceeded a latent score of -1.60 . The vertical dotted lines represent the range of acceptance of male privilege values that results in a non-significant relationship between gender and achievement. Therefore, gender differences in achievement value disappeared in conditions of low acceptance of male privilege. The standardized mean difference was 0.07 and would be considered small.

Regarding Hypotheses 2, the association between gender and power was significantly moderated by primacy of the breadwinner role (Hypothesis 2a), $b=-0.07$, $SE=0.01$, $95\% \text{ CI} [-0.10, -0.05]$, $p<0.001$, but not by acceptance of male privilege (Hypothesis 2b), $b=0.01$, $SE=0.01$, $95\% \text{ CI} [-0.01, 0.03]$, $p=0.071$. As hypothesized, gender differences in power decreased as the

levels of primacy of the breadwinner role diminished. The Johnson-Neyman technique (Figure 2b) revealed that the effect of gender (male) was positive when the latent score on primacy of the breadwinner role was below -1.60 and was negative when the latent score on primacy of the breadwinner role was equal to or higher than -0.60 . The vertical dotted lines represent the range of values of primacy of the breadwinner role that result in a non-significant relationship between gender and power. Thus, gender differences in power value disappeared or were in favour of women when the scores on primacy of the breadwinner role were low. The standardized mean difference was 0.10 and would be considered small.

3.1 | Robustness checks

To check the robustness of the findings, we conducted some additional analyses including gender equality (World Economic Forum) and national income level

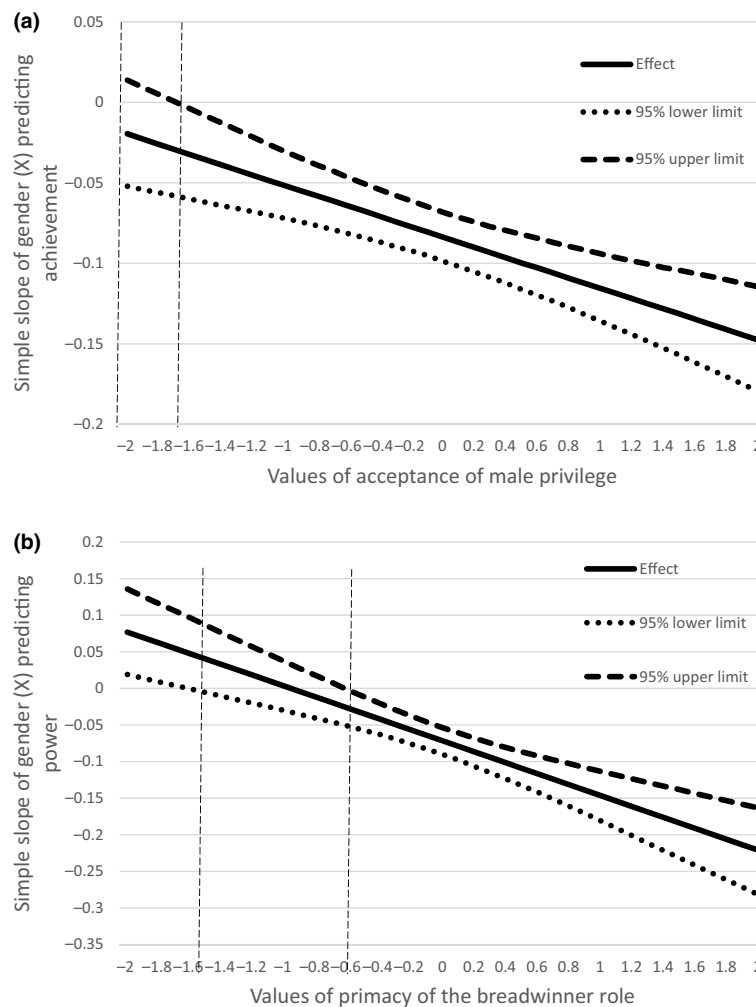


FIGURE 2 Johnson-Neyman technique showing the full range of conditional effect of (a) gender (coded as 2 for women and 1 for men) on achievement through acceptance of male privilege, and (b) gender (coded as 2 for women and 1 for men) on power through primacy of the breadwinner role. The vertical dotted lines represent the range of gender ideology values that result in a non-significant relationship between gender and human values.

(GDP per capita; World Bank) as the between-country level variables representing structural contextual factors. The structural contextual factors did not have a significant influence on the findings. More specifically, gender equality did not have a significant effect on (a) achievement, $b = -1.24$, $SE = 0.71$, 95% CI $[-2.65, 0.19]$, $p = 0.090$; (b) the interaction between gender and acceptance of male privilege, $b = 0.24$, $SE = 0.29$, 95% CI $[-0.31, 0.82]$, $p = 0.584$; (c) power, $b = -0.75$, $SE = 1.28$, 95% CI $[-3.27, 1.71]$, $p = 0.544$; and (d) the interaction between gender and primacy of the breadwinner role, $b = -0.71$, $SE = 0.59$, 95% CI $[-1.94, 0.43]$, $p = 0.232$. Moreover, national income level did not significantly predict (a) achievement, $b = 0.00$, $SE = 0.00$, 95% CI $[-0.00, 0.00]$, $p = 0.982$; (b) the interaction between gender and acceptance of male privilege, $b = 0.00$, $SE = 0.00$, 95% CI $[-0.00, 0.00]$, $p = 0.572$; (c) power, $b = -0.01$, $SE = 0.00$, 95% CI $[-0.01, 0.00]$, $p = 0.180$; and (d) the interaction between gender and primacy of the breadwinner role, $b = 0.00$, $SE = 0.00$, 95% CI $[-0.00, 0.01]$, $p = 0.388$. Therefore, our main findings (Figure 2) were not affected by structural contextual factors such as gender equality and national income level as the between-country level variables.

4 | DISCUSSION

Drawing on evolutionary theory and SRT, Schwartz and Rubel-Lifschitz (2009) claimed that power and achievement values are inherently more important for men than for women. In our study, we challenge the assumption of Schwartz and Rubel-Lifschitz that achievement and power values are *inherently* more important for men than for women by demonstrating that gender differences in power and achievement values disappear or even reverse when the scores on gender ideology are low. Specifically, we found that acceptance of male privilege moderates the relationship between gender and achievement (Hypothesis 1b), while the primacy of the breadwinner role moderates the relationship between gender and power (Hypothesis 2a). The Johnson-Neyman technique revealed that at low levels of acceptance of male privilege, gender differences in achievement value were non-significant. In addition, power was found to be more important to women than men at low levels of primacy of the breadwinner role. These findings were not affected by structural contextual factors such as national income level or gender equality that may be associated with human values (e.g., Stefani & Prati, 2021). In this respect, the results are quite interesting in light of Schwartz and Rubel-Lifschitz's (2009) findings, where they found values change in relationship with country-level gender equality. However, we want to make clear that we were not interested in rejecting the counterintuitive finding (i.e., gender differences in power and achievement values increase—and do not decrease—in gender-equal countries). This is the reason why we employed

individual-level variables: Our theoretical rationale is that values vary in the extent that individuals endorse, and the degree to which they endorse, gender ideology.

We argue that gender ideology plays a role in shaping human values through the socialization and internalization of gender roles. Based on the current findings, gender differences in values seem to stem from a cultural matrix that defines gender characteristics through differentiated objectives, characteristics, and roles.

Regarding achievement value, only acceptance of the male privilege (and not the primacy of the breadwinner role) dimension of gender ideology moderated the relationship between gender and the endorsement of this value. When people do not endorse male privilege, gender differences in achievement value disappear. So, having an egalitarian ideology eliminates the gender differences in achievement value. However, gender differences in achievement were not moderated by scores on primacy of the breadwinner role (Hypothesis 1a). We tried to speculate about the reasons: Achievement is the motivational goal underlying social recognition, which concerns a positive assessment of the accomplished goals. The reference to income and job highlighted in items of the primacy of the breadwinner role does not seem tied to a sense of job fulfilment. Rather, it emphasizes the instrumental and utilitarian functions of the job. In such a sense, the primacy of the breadwinner role has less to do with achievement and more with power. In addition, acceptance of male privilege did not moderate the relationship between gender and power value (Hypothesis 2b). One explanation could be that acceptance of male privilege refers to skills and competencies, rather than material resources held by genders. Moreover, acceptance of male privilege refers to the belief that men should have better qualities than women for academic and leadership roles. An alternative interpretation of the non-significant finding could be that the beliefs concerning the acceptance of male privilege may actually be more important for men than for women when it comes to the pursuit of achievement values. Among women, the pursuit of achievement may be compatible with success in different and more heterogeneous domains. Finally, responses from both women and men showed an increase in preference for achievement and power values when gender ideology is higher (i.e., more traditional). An explanation could be that gender ideology is a cultural process that embeds elements of authority and deference and organizes the world in hierarchies of power (Duncan et al., 1997). As gender ideology increases, those among the relatively more powerful (men) have more resources to spread in the public sphere the beliefs that established roles must always be respected. On the other hand, the powerlessness of women leads to “a greater susceptibility to the internalization of the values, beliefs, or rules of the game of the powerful as a further adaptive response—i.e., as a means of escaping the subjective sense of powerlessness, if not its objective condition” (Gaventa, 1980, p. 17).

Our study is the first to have shown that the existence of gender differences in these human values might be attributable to internalized cultural norms and not to supposedly inherent gender differences. However, it is important to point out that even though gender ideologies may have a huge impact in many areas of life, values are relatively stable beliefs over time and between cultures (Schwartz, 1992). Therefore, we acknowledge that the relationship between values and gender ideology may be bidirectional.

In the present study, we found a small standardized mean difference. We believe that the construct of gender ideology alone cannot capture the complex nature and dynamic evolution of gender differences in human values. Future studies are needed to investigate more comprehensively the complex process leading to gender differences in human values.

4.1 | Limitations and future research directions

The correlational nature of the research design is not able to establish causal relationships between gender ideology and human values. However, correlational data are useful for our purpose because they allowed us to show that when men and women do not internalize a traditional gender ideology, gender differences disappear. Although a one-item measure of human values has demonstrated good validity (e.g., Held et al., 2009), the use of a one-item measure for assessing achievement and power values is a limitation in this study. Additional research is needed to replicate these findings using measures with more than one item to assess human values. Future research could be addressed to analyse changes in gender ideology over time to find out if a change in these beliefs affects gender-related values. In this study, we proposed gender ideology as a moderating variable between gender and human value. However, future research might look at gender ideology as a mediator between gender and values: If we regard gender as a product of social and cultural construction, then it would be interesting to test whether people of different genders have different gender ideologies and whether such differences lead to differences in values. Another interesting issue to deepen is how the different components of gender ideology would be associated with gender differences in values. Our proposal considers that gender ideology, conceived as internalized gender roles, steers gender differences in power and achievement values. Other efforts could be invested in investigating whether gender ideology can moderate the relationship between gender and benevolence and universalism. Indeed, in the study of Schwartz and Rubel-Lifschitz (2009), gender differences in these values are wider in gender-equal societies (women embrace them more). Schwartz and Rubel-Lifschitz interpreted these value preferences in the same way as power and achievement (that gender equality allows women

to pursue values that are inherently more important to them). However, we have not taken them into account because we believe that the items in the WVS database are not suitable for measuring gender differences in benevolence and universalism values. More specifically, we believe the benevolence item, “It is important for this person to do something for the good of society,” does not comprehensively detect values of benevolence, which also concern the care of nearby people. Given that (a) the content of the measure of benevolence refers to society, and (b) society represents the public sphere of inequality (where claims about its management domain rest on men), the formulation of the item could be interpreted as something that mainly concerns men in a patriarchal society. Women who embrace a traditional gender ideology (which relegates them to the private sphere) may think that “doing something good for society” is not their job. We also believe as well that the universalism item in the WVS dataset (“Looking after the environment is important to this person; to care for nature and save life resources”) is imprecise with respect to the meaning of universalism, which also involves equality, understanding, appreciation, tolerance, and protection for the welfare of all people (Schwartz & Rubel-Lifschitz, 2009). Knoppen and Saris (2009) likewise report that the focus on the environment embedded in the universalism item did not load on universalism in a sample of German students. Future research can examine the moderating role of gender ideology in the relationship between gender and benevolence and universalism values using different items. There are other cross-national datasets such as the European Values Study which include values and measures concerning beliefs about gender and gender roles that could be used to replicate these findings. Finally, an interesting question arises here as to whether measurement invariance can be an issue. The human values were assessed by one-item measures. Therefore, measurement invariance cannot be statistically tested. The content validity and cross-cultural measurement invariance of the gender ideology measures have already been tested. For instance, in their assessment of the content validity and cross-cultural measurement invariance of the gender ideology measures in the WVS, Constantin and Voicu (2015, p. 733) concluded that these measures “are suitable for testing relations between attitudes towards gender roles and other theoretically relevant concepts.”

An anonymous reviewer raised the issue of whether gender ideology could be a mediator, rather than a moderator. When formulating a mediational hypothesis in a three-variable system, several hypotheses should be considered involving the following aspects of indirect effects:

1. There is a significant relationship between the independent variable and the dependent variable.
2. There is a significant relationship between the independent variable and the mediating variable.

3. There is a significant relationship between the mediating variable and the dependent variable.
4. The statistical significance of the indirect or mediated effect.

To our knowledge, there is no established theory supporting such a mediational pathway. In addition to the lack of theory supporting a mediation pathway, we raise the issue of the plausibility of such a pathway. In this study, if we hypothesize a mediation pathway, we would speculate (without having a theory to guide us) that women are less likely to endorse achievement and power values (from now on compared to men) because women are less likely to agree that men deserve the privileges a society bestows upon them, and such a tendency to challenge male privilege in turn causes women to be less likely to endorse achievement and power values. Following this reasoning, we should expect no gender differences in power and achievement in those situations where women endorse non-egalitarian gender ideologies as do men (i.e., both the relationship between the independent variable and the mediating variable and the indirect or mediated effect are not statistically significant). We argue that this explanation is not plausible. Based on solid theoretical ground, future research could refine our understanding of the reasons for gender differences in human values.

4.2 | Practical implications

The findings of the present study demonstrated that power and achievement values are not inherently more important to men than to women. The practical significance of our research is that we demonstrated that the idea that power and achievement are values likely to be inherently more important to men is not supported by theory and our findings. Specifically, our findings do not support the assumption that men inherently value power and achievement more than women do. Indeed, among people with an egalitarian gender ideology, gender differences in power and achievement disappear or even favour women. Therefore, such gender differences are also a function of cultural factors (i.e., endorsement of gender ideology principles). Knowing the role of gender ideology in shaping gender differences in human values enables practitioners to construct interventions that encourage critical reflection about the role of patriarchy, challenge the stereotypical portrayal of women and men (e.g., men inherently value power), and promote freer expression of values. Moreover, these findings allow practitioners to base their interventions on relevant and valid knowledge concerning the biological, psychological, social, and cultural factors involved in gender differences in human values. Finally, the findings of the present study help practitioners to evaluate gender differences in human values

more comprehensively and to critically reflect on interpretations of gender differences that may implicitly support essentialist interpretations.

5 | CONCLUSION

To sum up, our study has demonstrated the psychosocial nature of gender differences in values perceived to be more important to men than women. In particular, the present research challenged the assumption that power and achievement are values likely to be inherently more important to men. We demonstrated that gender differences in power and achievement are associated with gender ideology. In addition, the findings of the present investigation provided further evidence that gender ideology is a multidimensional construct, and each dimension may influence the outcomes.

AUTHOR CONTRIBUTIONS

Gabriele Prati: Conceptualization; data curation; formal analysis; investigation; methodology; software; supervision; validation; visualization; writing – original draft; writing – review and editing. **Serena Stefani:** Data curation; methodology; visualization; writing – original draft; writing – review and editing.

CONFLICT OF INTEREST STATEMENT

The authors declare they have no conflict of interest.

DATA AVAILABILITY STATEMENT

The data that support the findings of this study are available from World Values Survey. Restrictions apply to the availability of these data, which were used under licence for this study. Data are available at <http://www.worldvaluessurvey.org/WVSDocumentationWV6.jsp>.

ETHICS STATEMENT

This study was performed in accordance with the ethical authorization approved by the World Values Survey Association Secretariat Executive Committee. All procedures performed in studies involving human participants were in accordance with the ethical standards of the institutional research committee and with the 1964 Helsinki Declaration and its later amendments or comparable ethical standards.

INFORMED CONSENT

Informed consent was obtained from all individual adult participants included in the study.

PRE-REGISTRATION STATEMENT

This study was not preregistered.

RESEARCH MATERIALS AVAILABILITY STATEMENT

No materials are available.

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ENDNOTES

¹ In response to an anonymous reviewer's comment, we note that Schwartz and Rubel-Lifschitz (2009) did not use gender ideology in their study. They used societal-level gender equality which (a) is different from gender ideology and (b) was operationalized as an index composed by three other indexes: the Population Crisis Committee (1988) index of gender equality, Prescott-Allen's (2001) index of gender equity, and the average family size in 1985 from *Encyclopaedia Britannica* (1987).

² In the present study, we examined only two (i.e., achievement and power) of the 10 values.

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How to cite this article: Prati, G., & Stefani, S. (2023). Under what conditions do gender differences exist in power and achievement values? The moderating role of gender ideology. *Asian Journal of Social Psychology*, 00, 1–11. <https://doi.org/10.1111/ajsp.12588>