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Abstract

Religion remains deeply embedded in Arab societies, yet its economic implications are often portrayed in essentialist or anti-market terms. Drawing on pooled World Values Survey data from Waves 5–7 (2005–2022) for ten Arab countries, this article examines how a multidimensional measure of Muslim religiosity relates to three families of attitudes: market values, work norms, and legality/corruption. Using country–wave fixed effects and extensive socio-demographic controls, the analysis shows that higher religiosity is not associated with stronger support for income equality but is robustly linked to more market-friendly views regarding individual responsibility, private ownership, competition, and positive-sum wealth creation. Religiosity is also associated with a strong Islamic work ethic and moral duty to work, alongside skepticism that hard work is rewarded in practice, and consistently lower tolerance for illegal and corrupt acts. These findings challenge communitarian readings of "Islamic economics" and suggest that religious Arab publics combine pro-market and pro-work orientations with critical views of institutional fairness.

Keywords: Religiosity; Economic attitudes; Arab countries; Islam; Work ethic; Corruption; World Values Survey

JEL Classification: Z12, D73, J24, K42, O53

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I. Introduction

Recent surveys confirm that Arab countries maintain some of the world's highest levels of religiosity (Pew Research Center, 2018; Tessler, 2002). The Arab Barometer's seventh wave (2021-2022) across 12 Middle East and North African (MENA) countries shows "not religious" identification remains low—one-in-ten or fewer in most nations—with significant declines from 2018-2019, including seven points in Morocco, six in Egypt, five in Algeria, and four each in Jordan, Palestine, Sudan, and Tunisia (Arab Barometer, 2023). These trends, especially among youth, confirm religion's sustained centrality.

In addition, the Pew Research Center's 2017 Global Religious Landscape report finds that Muslims, making up approximately 90-95% of the population in most Arab countries, exhibit high levels of religious commitment across the region. The MENA region contains some of the highest proportions globally of adults who engage in daily prayer and affirm belief in God as essential to life (Pew Research Center, 2017). World Values Survey data further confirms high religiosity across Arab countries. In Wave 7, 90% of Egyptians and 95% of Jordanians report religion as very important in their lives, with Tunisia at 90% (World Values Survey, 2022).

The Arab world, home to more than 430 million people (World Bank, 2023), shares linguistic and religious ties but exhibits diversity in sectarian makeup, governance systems, and socio-economic conditions. Islamic scholarship and revival movements have had long-standing influence across the region, with many Arab states integrating Islamic principles formally and informally into laws, social policy, and daily practice (Esposito, 2003; Ahmed & Gouda, 2015). This shapes economic behavior and attitudes in ways that extend beyond national boundaries.

Extensive literature has explored the impact of religion and religiosity at the macroeconomic level (Barro & McCleary, 2003; Becker & Woessmann, 2009; Landes, 1999; McCleary & Barro, 2006), with many studies focusing on Islam's role in the economic performance of Muslim-majority countries (Kuran, 2011; Rubin, 2017). On the micro-level, there has been a surge in research that investigates the relationship between religiosity and individuals' economic attitudes (Guiso, Sapienza, & Zingales, 2003; Trautmann, 2022). However, few studies specifically investigate this relationship within Arab countries.

This study fills that gap by analyzing recent waves of the World Values Survey to assess how religiosity correlates with economic preferences, including views on income inequality, market fairness, competition, work ethic, and illegal acts of corruption among Arab populations. This study makes three key contributions to the literature on religion and economic attitudes. First, it provides the most comprehensive micro-level analysis to date of religiosity's associations with economic preferences across 10 Arab countries, using pooled World Values Survey Waves 5-7 (2005-2022)—extending beyond single-country analyses like Gouda (2025) on Egypt or regional comparisons like Diwan and Tzannatos (2018) that aggregate without disaggregating by religiosity levels.

Second, it tests 12 specific hypotheses spanning market attitudes (inequality, competition, ownership), work ethic (importance, meritocracy, moral norms), and corruption tolerance, revealing that religious Arab Muslims hold unexpectedly pro-market views alongside strong

work norms and anti-corruption stances, challenging communitarian interpretations of Islamic economics. Third, by employing robust measures—a standardized religiosity index and PCA factor—alongside country-wave fixed effects and full demographic controls, it addresses persistent methodological gaps in religiosity research (Basedau et al., 2018), offering timely evidence amid documented youth religiosity rebounds in the Arab Barometer (2023). These findings nuance global patterns from Guiso et al. (2003) for a high-religiosity context facing economic challenges.

This study faces two notable limitations. First, since it is conducted in predominantly religious Arab societies, responses related to religiosity and certain economic attitudes—especially those about sensitive topics like corruption and crime—may be influenced by social desirability bias. Research on survey methodology in the Arab world highlights that social desirability bias is at least as pronounced as in other regions, often enhanced by the politicization of religion and social norms, interviewer characteristics, and concerns about repercussions for expressing dissenting views (Blaydes & Gillum, 2013). This may lead respondents to overstate religious commitment and underreport socially stigmatized opinions, potentially inflating correlations between religiosity and economic attitudes.

Second, the data rely on self-reported measures collected at a single point in time, limiting the ability to establish causal relationships. Many variables are interrelated, which introduces challenges in disentangling directionality and isolating the unique contribution of religiosity from other social, cultural, or economic factors. Consequently, findings represent robust associations rather than definitive evidence of causation. Recognizing these constraints encourages cautious interpretation while emphasizing the value of observed patterns in informing our understanding of religiosity's role in shaping economic attitudes in the Arab world.

The study is structured as follows: Section 2 reviews related literature; Section 3 presents the theoretical framework and hypotheses; Section 4 outlines data and methodology; Section 5 reports empirical findings; Section 6 discusses implications and concludes.

II. Religion and economic attitudes

The idea that religion may influence economic behavior is long-standing. Adam Smith's moral philosophy highlighted how religiously infused moral sentiments shape incentives, cooperation, and social order (Smith, 1759). In a similar vein, Weber argued that specific Protestant doctrines fostered work ethic, thrift, and discipline, thereby promoting the emergence of capitalist institutions (Weber, 1905). Subsequent empirical work has revisited the "Protestant ethic" thesis with mixed results, finding that any Protestant advantage tends to be context-dependent and sensitive to historical and institutional controls (Barro & McCleary, 2003; Becker & Woessmann, 2009; Cantoni, 2015). Overall, contemporary studies view religion less as a single causal factor and more as a multidimensional cultural system that may shape preferences, norms, and institutional quality in heterogeneous ways (Iannaccone, 1998; Trautmann, 2022).

The increasing availability of cross-national survey data on religious affiliation and religiosity has generated a large empirical literature on religion and economic attitudes (Guiso et al., 2003; Norris & Inglehart, 2011). A seminal contribution by Guiso et al. (2003) uses World Values Survey data to examine the "intensity of religious beliefs and economic attitudes" and documents systematic links between religiosity and attitudes toward cooperation, government intervention, gender roles, legal rules, thrift, and markets. In their analysis, religious individuals in aggregate tend to endorse attitudes more favorable to economic performance, although the pattern differs by tradition; for example, Christians are generally more promarket, while Muslims appear more skeptical of competition in their setting (Guiso et al., 2003). The study also finds that Judaism is strongly negatively associated with tax evasion and that Buddhists are least likely to justify bribery, highlighting that differences in ethical content across religions can translate into distinct economic value profiles (Guiso et al., 2003).

More recent work nuances and partly qualifies these findings by separating different dimensions of religion. Following the approach of Guiso et al. (2003), Davis and Rodríguez (2024) distinguish between religious beliefs (e.g., belief in God, heaven, hell, an afterlife) and religious attendance, and show that both dimensions predict a broad set of economic values—cooperation, patriarchy, institutional trust, lawfulness, thrift, markets, and market fairness—once individual, denominational, country, and period factors are controlled (Davis & Rodríguez, 2024). Using a multi-country WVS sample, they find that beliefs are somewhat more important than attendance for promarket and patriarchal values, whereas attendance is relatively more important for thrift, market fairness, lawfulness, and institutional trust, implying that an exclusive focus on participation understates the role of beliefs in shaping economic values (Davis & Rodríguez, 2024). Complementary experimental work shows that making religious identity salient can causally affect choices in economic tasks, such as public-good contributions and risk taking, and that these effects differ across denominations and between religious and non-religious individuals (Benjamin et al., 2016; Trautmann, 2022).

A large micro-literature examines how religion is related to moral attitudes, redistribution preferences, and household finance. Using representative Dutch survey and experimental data, Kirchmaier et al. (2018) find that religious individuals are less accepting of unethical economic behavior (e.g., tax evasion, bribery), report more hours of volunteering and informal caregiving, and show lower support for additional income redistribution than non-religious individuals (Kirchmaier et al., 2018). Their experimental trust game, however, suggests that religious and non-religious participants behave similarly in anonymous interactions, indicating that stricter stated moral attitudes do not necessarily translate into more trustworthy behavior in abstract settings (Kirchmaier et al., 2018).

Also focusing on the Netherlands, Renneboog and Spaenjers (2012) use household data and show that religiosity is associated with more conservative financial behavior, including higher risk aversion, different portfolio composition, and distinct debt patterns, suggesting that religious norms shape intertemporal choices and risk attitudes (Renneboog & Spaenjers, 2012). Related evidence from Germany points to systematic links between religious affiliation and general and financial risk-taking, although effect sizes are often modest (León & Pfeifer, 2017). At the same time, Steiner et al. (2020) and more recent work combining religiosity and

personality traits with economic preference parameters find that denominational differences in risk and time preferences largely disappear once personality and other covariates are accounted for, underscoring the difficulty of attributing preference heterogeneity solely to religion (Steiner et al., 2020; Bessey, 2024).

Several studies focus on specific regions to exploit historical variation in religious institutions. In post-communist Europe, Minarik (2014) documents that religion continues to shape economic attitudes after decades of official atheism and often supports the transition to a market economy, with religious individuals—irrespective of denomination—exhibiting relatively market-friendly orientations (Minarik, 2014).

Country-level work also suggests that religiosity is intertwined with social capital: religiosity is frequently associated with higher participation in voluntary organizations and civic engagement, channels through which it may affect economic performance (Putnam, 1993; D'Amore & Iorio, 2025). Recent empirical studies extend this line by connecting religiosity to concrete financial outcomes. For instance, Bazley et al. (2024) show that more religious households are less likely to experience financial hardship, particularly among low socioeconomic groups (Bazley et al., 2024). Similarly, a 2024 study of young Americans finds that higher adolescent religiosity causally reduces the likelihood of financial distress in early adulthood, plausibly via increased self-control and social capital cultivated in religious communities (Lei et al., 2024).

At a more aggregate level, religion has been linked to governance-relevant attitudes and institutional quality. Berggren and Bjørnskov (2011, 2013) report that higher aggregate religiosity is negatively correlated with generalized trust, protection of property rights, and the rule of law, pointing to possible adverse effects of religiosity on formal institutions and long-run development (Berggren & Bjørnskov, 2011, 2013). Other cross-country analyses highlight that religious traditions and majority-religion status interact with political regime type in shaping attitudes toward economic and personal freedoms, suggesting that religion's institutional effects are mediated by political context (Alemán & Woods, 2023).

The broader literature on religion and financial and institutional development similarly notes that religious organizations can either complement or substitute for state institutions, with implications for social cohesion and economic governance (Norris & Inglehart, 2011). Recent surveys provide a comprehensive synthesis of this rapidly expanding field. Trautmann (2022) reviews evidence on the relationship between religion and core economic preference parameters—risk tolerance, time discounting, social preferences, honesty, and attitudes toward markets and competition—and concludes that while robust correlations exist, theoretical foundations are often incomplete and many results remain exploratory (Trautmann, 2022).

When it comes to Arab context, the literature remains scant. A key addition in this context is the detailed analysis of economic values in the Arab world by Diwan and Tzannatos (2018), who use pooled WVS and Gallup data to compare citizens of Arab countries with the rest of the world, other middle-income economies, non-Arab Muslim majority countries, oil exporters, and other regional groupings. They find that, contrary to influential "culturalist" arguments, Arabs on average display strong work ethic, high economic motivation, and pro market

attitudes—comfort with competition, support for private ownership, and opposition to a large state role—at least as strong as in comparable middle income countries and, crucially, stronger than in non-Arab Muslim majority countries once income and demographics are controlled. This evidence directly challenges the view that "Islam" or "Arab culture" is inherently anti market and suggests that simple religious civilizational explanations for underperformance are empirically weak in this region (Diwan & Tzannatos, 2018).

At the same time, Diwan and Tzannatos (2018) identify several value dimensions in which Arab publics look less favorable from a market-led development perspective: low preference for thrift, strong patriarchal norms opposing women's employment when jobs are scarce, and very low trust in national institutions combined with high perceived corruption in both government and business. Importantly, these patterns are not simply a generic "Muslim" effect: thrift, for instance, is relatively low in Arab countries but relatively high in non-Arab Muslim majority economies (Diwan & Tzannatos, 2018).

Their regressions further show that religiosity in the Arab region is associated with stronger pro market attitudes and more positive views of hard work, but also with less economic motivation, more patriarchal views on gender and work, and lower respect for entrepreneurs, implying that the net effect of religiosity on development relevant attitudes is theoretically ambiguous and highly dimension specific (Diwan & Tzannatos, 2018).

Gouda (2025) investigates the relationship between religiosity and economic attitudes among Egyptians, postulating several hypotheses related to three sets of economic attitudes. Using World Values Survey data for the latest three waves, namely waves 5-7, conducted from 2005 to 2022, The author finds that religiosity is significantly linked with the three sets of economic attitudes examined.

Specifically, religious Egyptians tend to favour a greater role for government in supporting the needy and views market competition as harmful. Although religious Egyptians clearly recognize the importance of work in their lives, they support the notion that success is likely an outcome of luck and connection, rather than of hard work. In addition, the results show that religiosity is negatively correlated with acceptance of corrupt acts (Gouda, 2025).

Although relevant literature has been recently expanding, Basedau et al. (2018), in a systematic review of empirical work on religion and economic and social development, emphasize persistent conceptual and measurement problems, including unclear definitions of religiosity, limited cross-country comparability of religious concepts, and serious identification challenges (Basedau et al., 2018). They argue that there is no clear and robust evidence that religion uniformly promotes or hinders economic growth and that several classical hypotheses—most notably strong versions of the Weberian thesis—are not consistently supported across methods and contexts (Basedau et al., 2018). Taken together, recent relevant contributions reinforce the view that religion is best understood as a multidimensional, context-dependent set of beliefs, practices, and identities whose effects on economic attitudes may not be fully captured by denomination dummies or binary pro- vs. anti-market classifications (Davis & Rodríguez, 2024; Kirchmaier et al., 2018; Trautmann, 2022).

To sum up, the relationship between religion and economic attitudes remains controversial and under researched. This is especially relevant in the case of Arab countries, where very few studies tackle religiosity and economic attitudes among Arab Muslims. This is surprising given the high level of religiosity expressed in formal and informal institutions enforced in these countries, as well as the economic challenges many Arab countries are currently facing.

III. Theory and Hypotheses

In Muslim-majority societies, Islamic teachings provide a distinct normative framework for economic life. Core institutions such as *zakat*, prohibitions on *riba*, and Qur'anic injunctions regarding justice, charity, and honesty can plausibly influence attitudes toward income inequality, the role of the state, private ownership, work norms, and corrupt behavior. The Arab region is an especially relevant context: it combines high levels of self-declared religiosity with persistent inequality, segmented labor markets, and widespread perceptions of corruption. This study builds on these insights to examine how religiosity among Muslims in Arab countries relates to three families of attitudes: (i) market-oriented values, (ii) work values and beliefs about hard work, and (iii) legality norms and tolerance for illicit behavior.

a. Hypotheses I: Attitudes toward inequality, state responsibility, private ownership, competition, and wealth

Islamic teachings frequently emphasize charity, solidarity, and the obligation to care for the poor and vulnerable. One of Islam's five pillars, *zakat*, requires financially able Muslims to donate at least 2.5% of their net assets annually to support the less fortunate. The Qur'an contains numerous references to almsgiving and assistance to the needy, with the concept of *zakat* appearing in several verses (e.g., 7:156, 9:60, 19:31, 19:55, 27:3, 30:39, 31:4, 41:7). Building on this, Davis and Robinson (2006, 2012) argue that religious orthodoxy is often associated with economic communitarianism or egalitarianism, in which the state is expected to narrow wealth gaps and guarantee a basic level of welfare.

Empirically, however, the link between Islamic piety and redistributive preferences is not straightforward. Pepinsky and Welborne (2011), using WVS Wave 4 data, hypothesize that devout Muslims will favor redistributive policies but find limited evidence that piety consistently predicts stronger support for income redistribution or state responsibility for the poor. Davis and Robinson (2006), by contrast, show that in seven Muslim-majority countries (Algeria, Bangladesh, Egypt, Indonesia, Jordan, Pakistan, and Saudi Arabia), support for Islamic law as the sole legal foundation is positively correlated with preferences for government responsibility to provide for all, income equalization, and greater state control over business.

Based on the communitarian interpretations of Islamic ethics, we formulate the following expectations:

- **H1a:** Religious Muslims express more support than their less-religious counterparts for income equality.
- **H1b:** Religious Muslims express more support than their less-religious counterparts for the government's responsibility to support the needy.

Islamic scripture simultaneously affirms the right to private property while subjecting ownership to ethical constraints. The Qur'an does not explicitly mandate either public or private ownership as the preferred mode of organizing productive assets. Islamic legal scholarship therefore leaves considerable room for interpretation, and modern advocates on both sides of the ownership debate can appeal to religious arguments (Kamali, 2002a; Nomani & Rahnema, 1994; Kuran, 2010). Theoretical and empirical work suggests that Islam generally upholds private ownership, provided it is exercised in a socially responsible way, but the absence of consensus on what counts as socially just property arrangements creates ambiguity in practice (Kamali, 2002b; Davis & Robinson, 2006).

Land tenure is a classic example. Islam permits private land ownership but imposes restrictions to ensure that land is used productively and ethically (El-Gamal, 2006). Chapra (2000) and Kamali (2002b) note that Islamic jurisprudence allows the state or community to reclaim uncultivated land and redistribute it to those who will put it to productive use. More broadly, Islamic teachings can support redistributive intervention when private ownership generates social injustice or undermines communal welfare (Nomani & Rahnema, 1994).

In our framework, I posit:

- **H1c:** Religious Muslims express less support than their less-religious counterparts for expanding private ownership.

A similar ambivalence arises in Islamic discussions of markets and competition. The relationship between Islamic principles and market dynamics has been widely debated, with some scholars emphasizing a positive Islamic view of markets (Nomani & Rahnema, 1994) and others stressing the need for strong regulation (Khan, 1997). Reda (2013, pp. 36–37) argues that market competition carries a negative connotation in many Islamic texts. Trade pursued purely for profit is seen as potentially encouraging envy, enmity, and rivalry, whereas trade undertaken with an eye to the hereafter is associated with cooperation and compassion.

Reda (2013, p. 37) concludes that while Islam is not categorically opposed to all forms of competition, it does not regard competition as the primary organizing principle of markets, favoring instead a "market based on reciprocal compassion." This interpretation is often linked to Prophetic sayings such as "…do not outbid one another… do not enter into a transaction when others have already entered into that transaction, and be as brothers to one another" (Reda, 2013; Rice, 1999).

If religious Muslims are more skeptical of self-interested profit-seeking and unregulated competition, one might expect them to be less enthusiastic about competition and more suspicious of the idea that everyone can become richer without someone losing.

Finally, Islamic economic teachings frame wealth accumulation within a strong moral and distributive framework. Islamic jurisprudence emphasizes avoiding unjust enrichment, exploitation, and consuming the wealth of others unjustly, as well as mandates mechanisms such as zakat (almsgiving) and the prohibition of riba (usury) to prevent the concentration of wealth and address social inequality (Darakhshan Zia & Nasir-Ud-Din, 2023; Zaman, 2013). Furthermore, Islamic perspectives stress that wealth ultimately belongs to God, and humans are trustees responsible for its just use and distribution (Fakhrurrozi, 2024). Such a moral view can lead highly religious Muslims to be skeptical of large personal fortunes, particularly when perceived as resulting from unethical behavior or neglect of redistributive duties (Chaudhry, 2024).

Consequently, religious Muslims may be more inclined than their less-religious counterparts to adopt a less positive-sum view of wealth creation, seeing it as a zero- or negative-sum process involving social costs, exploitation, or inequality. This view is captured in Imam Ali ibn Abi Taleb's saying, "No poor person goes hungry except by what has been enjoyed by the rich, and God will question them about that" (Ahlolbait.com, 2017). This succinctly reinforcing beliefs among religious Muslims that wealth creation may be zero-sum or less positive-sum.

Accordingly, I hypothesize:

- **H1d:** Religious Muslims express less support than their less-religious counterparts for market competition.
- **H1e:** Religious Muslims express more support than their less-religious counterparts for the view that wealth is accumulated at the expense of others (i.e., a less positive-sum view of wealth creation).

b. Hypotheses II: Attitudes toward hard work and work ethic

Building on Weber's insight that religious ideas can foster distinctive "work ethics," a growing body of research explores how different faith traditions frame the meaning and value of work. In the Islamic context, several recent studies emphasize that work is conceptualized as both a means of livelihood and a form of worship. Akhmadi et al. (2023) and Udin et al. (2022) argue that Islam actively encourages individuals to work hard to secure economic resources for themselves and their families, framing this effort as a religious duty. The Qur'an instructs believers that "human beings can have nothing but what they strive for" (Qur'an 53:39), and Prophetic traditions praise income derived from one's own labor, exemplified in the saying that "the best food a person eats is that which they have earned through their own labor" (Ali, 1992).

Comparative research in other religious settings points in a similar direction. Davidson and Caddell (1994), in a study of Protestants and Catholics, find that religion enhances work commitment and makes work a "central life interest." Benefiel et al. (2014), reviewing the literature on spirituality and religion in the workplace, conclude that—across a variety of

contexts—religiosity and spirituality tend to be associated with stronger organizational commitment, higher job satisfaction, and greater perceived performance and productivity.

Empirical quantitative research robustly demonstrates that Islamic work ethic (IWE), closely linked to religiosity, positively influences Muslim employees' attitudes and performance. Islamic teachings frame work as both a religious duty and a social responsibility, promoting values such as diligence, honesty, and commitment (Yousef, 2001; Abdullah et al., 2023; Zafar & Abu-Hussin, 2025). Highly religious Muslims internalize these norms more strongly, resulting in greater job satisfaction, organizational commitment, motivation, and work engagement, while rejecting idleness and reliance on unearned income.

For instance, Yousef (2001), in a seminal study, finds that IWE moderates the positive relationship between organizational commitment and job satisfaction among Muslim employees, highlighting religion's role in shaping pro-work attitudes. Abdullah et al. (2023) and Zafar and Abu-Hussin (2025) extend this evidence, showing that religiosity predicts stronger IWE beliefs, which in turn drive greater motivation and work engagement across diverse Muslim contexts. These findings substantiate the view that religious Muslims are more likely to see living on money without working as humiliating, view work as a duty toward society, and regard non-workers as lazy,

On the basis of Islamic theology and broader sociological evidence, we expect that more religious Muslims will place greater emphasis on work and endorse stronger work norms. This leads to the following hypotheses:

- **H2a:** Religious Muslims place greater importance on work than their less religious counterparts.
- **H2b:** Religious Muslims are more likely than their less religious counterparts to believe that hard work brings economic success.
- **H2c:** Religious Muslims are more likely than their less religious counterparts to agree that it is humiliating to live on money without working.
- **H2d:** Religious Muslims are more likely than their less religious counterparts to view work as a duty toward society.
- **H2e:** Religious Muslims are more likely than their less religious counterparts to agree that people who do not work become lazy.

These hypotheses allow us to test whether religiosity in Arab Muslim societies functions in a way that is analogous to Weber's "inner-worldly asceticism," reinforcing a disciplined, work-centered ethos, or whether perceptions of corruption and cronyism in the region weaken the perceived link between effort and reward.

c. Hypotheses III: Attitudes toward crime and corruption

Finally, religion is often argued to shape moral boundaries around corruption and criminal behavior. A substantial empirical literature documents a negative association between religiosity and tolerance for corrupt acts (North, Orman, & Gwin, 2013). At the micro level, religion is commonly linked to better moral conduct and stronger ethical standards (Gokcekus & Ekici, 2020). Using WVS data from 1980 to 2014, Evrensel and Sened (2019) find that higher religiosity is associated with lower acceptance of behaviors such as cheating on taxes, receiving unjustified government benefits, and taking bribes, echoing earlier results in Gouda and Park (2015).

In Islamic doctrine, corruption and illicit gains are explicitly condemned as threats to social and economic balance. The Qur'an and Hadith strictly proscribe bribery, fraud, misappropriation of public resources, and unjust enrichment, framing them as violations of both divine law and communal trust.

Consistent with Islamic teachings and the broader empirical literature, I posit:

- **H3a:** Religious Muslims are less tolerant than their less-religious counterparts of claiming government benefits illegally.
- **H3b:** Religious Muslims are less tolerant than their less-religious counterparts of avoiding fares on public transport.
- **H3c:** Religious Muslims are less tolerant than their less-religious counterparts of cheating on taxes.
- **H3d:** Religious Muslims are less tolerant than their less-religious counterparts of accepting or offering bribes.

Taken together, the three sets of hypotheses articulate how Islamic doctrine, classical sociological theory, and prior empirical work motivate systematic expectations about the relationship between religiosity and economic attitudes among Muslims in Arab countries.

IV. Data and Research Design

The empirical analysis relies on the latest three WVS waves (waves 5-7), covering the years 2005 to 2022. Given that informal institutions, such as norms and values, tend to change slowly (Williamson, 2000), the three waves are combined as a pooled dataset. The analysis covers all Arab countries included in WVS waves 5–7: Algeria, Egypt, Iraq, Jordan, Lebanon, Libya, Morocco, Palestine, Tunisia, and Yemen. Not all countries participated in every wave, but together they provide a broad and diverse representation of sociopolitical and economic attitudes across the Arab region from 2005 to 2022. The analysis focuses on respondents aged 18 and older who self-identify as Muslim.

A crucial empirical motivation for restricting the sample to Muslims is sample size imbalance across religious groups. In the WVS Arab-country subsample, Muslims constitute over 95% of all respondents, whereas all other denominations together account for only around 4% of the sample. Across country-level samples, some denominational groups have *fewer than 30*

observations, and several have fewer than 300. These sample sizes are too small to support meaningful country-level or wave-level fixed-effects regressions, let alone subgroup comparisons or robust inference. All descriptive statistics and regression results therefore reflect the attitudes of Muslims, weighted using the WVS post-stratification weights.

The dependent variables are selected from the World Values Survey (WVS) in direct correspondence with the study's hypotheses. These variables are grouped into three conceptual families: *market attitudes, work values, and legality/corruption norms*. All variables are recoded so that higher values indicate more economically orthodox, productivity-oriented, or socially desirable attitudes.

To test the first set of hypotheses, I draw on five standard WVS items that capture respondents' orientation toward markets, incentives, economic competition, and wealth accumulation. *Income Equality* is measured using respondents' placement on a 1–10 scale where *1* corresponds to the view that "incomes should be made more equal," while *10* reflects the opinion that "there should be greater incentives for individual effort." *People Responsible* adopts the same 1–10 structure, ranging from "the government should take more responsibility to ensure everyone is provided for" (*1*) to "people should take more responsibility to provide for themselves" (*10*).

Private Ownership is also measured on a 1–10 scale, with *1* indicating a preference for expanding state ownership of firms and *10* indicating support for increasing private ownership. *Competition* captures whether individuals perceive competition as harmful or beneficial, moving from *1* ("competition is harmful and brings out the worst in people") to *10* ("competition is good as it stimulates people to work hard and innovate"). Finally, *Wealth Accumulation* follows the same 1–10 structure, ranging from "people can only get rich at the expense of others" (1) to "wealth can grow so there is enough for everyone" (10). Higher values therefore indicate a more positive-sum view of wealth creation and a more market-friendly understanding of economic growth.

The next family of dependent variables focuses the second set of hypotheses related to work salience, meritocratic beliefs, and moral attitudes toward work. *Work Important* is derived from "How important is work in your life?" The scale is restricted to its intended 1–4 range ("not at all important" to "very important"). Higher values indicate greater personal importance of work. *Hard Work Brings Success* uses the 1–10 WVS scale where 1 = success depends on luck and connections and 10 = hard work leads to a better life. Higher values therefore represent stronger meritocratic beliefs. Three additional indicators of work ethic are included, although they are available only for a subset of country–wave combinations: (i) whether respondents believe it is *humiliating to receive money without working* (1–5), (ii) whether *work is a duty toward society* (1–5), and (iii) whether *work should come first* (1–5). All three variables are reverse-coded so that higher values consistently represent stronger work norms, a greater sense of duty, and more productivity-oriented attitudes.

The final set of hypotheses examines attitudes toward legality and corruption, relying on four WVS items that ask respondents to rate the justifiability of specific dishonest or illegal actions: *claiming government benefits to which one is not entitled*, *avoiding fares on public transport*,

cheating on taxes, and *accepting a bribe in the course of one's duties*. Each item is originally measured on a scale from 1 ("always justifiable") to 10 ("never justifiable"). I retain this coding so that higher values consistently represent stronger adherence to legal norms and lower tolerance for corruption and unethical behavior.

The main independent variable—*Religiosity*—is measured using three widely used WVS indicators that capture different dimensions of religious belief, practice, and identity. All items are recoded so that higher values consistently reflect greater religiosity.

The first component, *Importance of Religion*, is drawn from the WVS question asking respondents to indicate how important religion is in their life (1 = "not at all important," 4 = "very important"). The second component, *Religious Attendance*, is based on the frequency of attending religious services beyond ceremonies such as weddings or funerals. The third component, *Religious Self-Identification*, asks whether the respondent considers themself a religious person, someone who is not religious, or a convinced atheist.

To construct a comprehensive measure of religiosity, I generate two complementary indicators:

1. **Standardized Religiosity Index**:
   Each of the three items is standardized (z-score) within our sample. The standardized items are then averaged and standardized again, yielding a scale centered at zero with higher values indicating stronger religiosity. This additive index is intuitive, transparent, and widely used in survey-based research on religion and economic attitudes.

2. **PCA-Based Religiosity Factor**:
   As a robustness check, I also extract the first principal component of the three indicators. The resulting factor score is standardized and its sign is aligned to ensure a positive correlation with the additive index. This measure captures the shared latent dimension underlying importance, practice, and identification of being a Muslim, thereby reducing measurement error and avoiding arbitrary weighting.

Both religiosity measures are highly correlated, but they rely on different assumptions. Using both allows the analysis to verify that the findings are not sensitive to measurement strategy.

Following relevant literature on religion and economic attitudes (Gouda & Park, 2015; Guiso, Sapienza, & Zingales, 2003; Renneboog & Spaenjers, 2012), I control for a set of variables, including sex, age, age squared, health status, employment status, self-employment, education, income level, social class, marital status, and number of children. All regressions include country fixed effects to absorb cross-national differences in political institutions, history, and cultural context, and survey-wave fixed effects to account for time-specific shocks and global events. The analysis is weighted using the WVS post-stratification weights to ensure national representativeness within each country-wave.

The empirical strategy relies primarily on ordinary least squares (OLS) estimation. Although many dependent variables are ordinal, their wide response ranges make them suitable for linear

modeling, and OLS offers straightforward interpretation, transparent incorporation of fixed effects, and easy comparability across outcome families. To ensure that results are not sensitive to functional-form assumptions, all models are additionally estimated using ordered logit as a robustness check. Both estimators are implemented with country fixed effects, survey-wave fixed effects, and WVS post-stratification weights. Because item availability varies across waves and countries, and because missing values are listwise-deleted, the number of observations differs across models, particularly for work-ethic variables that were not administered in every country–wave combination. The overall design captures within-country, within-wave associations between religiosity and socioeconomic attitudes while controlling for a comprehensive set of demographic and socioeconomic characteristics. Reverse causality remains possible, insofar as individuals with certain economic worldviews may also be more inclined toward religious commitment.

A full description of variables and descriptive statistics is provided in Table 1.

<Table 1 here>

V. Results

a. Religiosity and Market Attitudes

Table 2 reports estimates from OLS regressions examining the association between religiosity and a broad range of market-related beliefs, corresponding to Hypotheses H1a–H1e. I use *Religiosity index* as the main independent variable. All models include an intercept term (constant), which is estimated but not reported in the tables for brevity

<Table 2 here>

From hypothesis H1a, we expect that religious Muslims will be more supportive of more equal incomes. Model M1a shows that the coefficient on *Religiosity* is very small and statistically insignificant, suggesting that religious and less-religious Muslims do not differ in their views on income dispersion, indicating no support for our hypothesis. Several controls display expected patterns: *Age* is negatively associated with accepting greater income inequality, while higher *Social Class* and having more *Children* predict a greater willingness to tolerate income differences. *Bad health* strongly reduces support for income inequality, consistent with heightened vulnerability among less healthy respondents.

Hypothesis H1b posits that more religious Muslims should be more supportive of government responsibility to provide for the needy. Model M1b in Table 2 tests this expectation using the *People Responsible* variable, which is coded such that lower values reflect support for government responsibility and higher values reflect a preference for individual responsibility. The results show that *Religiosity* is positively and highly significantly associated with individual responsibility ($b = 0.115$, $SE = 0.021$, $p < 0.01$), indicating that more religious Muslims are less supportive of government responsibility. This finding therefore contradicts H1b, suggesting that religiosity is linked to a more individualist stance on welfare provision rather than a pro-state orientation.

Turning to the control variables, *Education*, *Income*, and subjective *Social Class* all exhibit positive associations with individual responsibility, indicating that more socioeconomically advantaged respondents tend to favor self-reliance. Conversely, respondents in poor health show significantly stronger support for government responsibility, consistent with higher vulnerability among less healthy individuals. Being *Self-employed* is also negatively associated with individual responsibility, possibly reflecting economic precarity or reliance on state safety nets among self-employed workers in the region.

Hypothesis H1c expects that religious Muslims will be *less supportive of private ownership*. Model M1c shows a small but statistically significant positive association between *Religiosity* and support for private ownership ($b = 0.040$, $SE = 0.023$, $p < 0.10$). Therefore, the estimate indicates the opposite pattern of H1c: more religious respondents express *slightly stronger* rather than weaker support for private ownership. Women, respondents with more children, and those with poor health display stronger support for private ownership, while self-employed and more educated individuals exhibit a preference for greater state involvement—possibly reflecting demand for regulatory protection or state-led economic support.

Hypothesis H1d predicts that more religious Muslims will be *less supportive of market competition*. Model M1d reveals a strong, positive, and highly significant relationship between *Religiosity* and the view that competition is good ($b = 0.217$, $SE = 0.026$, $p < 0.01$). This finding contradicts H1d. More religious Muslims are substantially more supportive of market competition than their less-religious counterparts. Support for competition is also stronger among individuals with higher education and social class, whereas those in poor health and with higher income tend to perceive competition more negatively.

Finally, Hypothesis H1e anticipates that religious Muslims will show stronger agreement with the notion that wealth is accumulated at the expense of others (a zero-sum view). Yet, Model M1e again reveals the opposite pattern. Religiosity is positively and significantly associated with more positive-sum beliefs about wealth—that wealth can grow and benefit everyone ($b = 0.077$, $SE = 0.029$, $p < 0.01$). Marriage shows a positive association with positive-sum beliefs, while other demographic predictors show nonsignificant effects.

Taken together, the results point to a consistent pattern: More religious Muslims in Arab countries tend to hold more market-friendly and economically orthodox attitudes, contrary to the expectations in Hypotheses H1a–H1e. Specifically, religiosity is unrelated to support for income equality (H1a), but significantly predicts greater support for individual responsibility (H1b), greater support for private ownership (H1c), greater support for competition (H1d), and more positive-sum beliefs about wealth creation (H1e). Collectively, Table 2 suggests that religiosity is associated with a more pro-market and incentive-oriented worldview among Arab Muslims.

b. Religiosity and Work Values

Table 3 reports the OLS estimates corresponding to Hypotheses H2a–H2e, which examine the relationship between religiosity and a broad set of work-related values among Arab Muslims.

All dependent variables are scaled such that higher values indicate stronger work salience, meritocratic beliefs, or stricter work-ethic norms.

<Table 3 here>

Hypothesis H2a predicts that higher religiosity is associated with greater endorsement of the importance of work. Model M2a provides strong support for this expectation: the coefficient on Religiosity is positive, large, and highly significant ($b = 0.086$, $SE = 0.006$, $p < 0.01$). More religious Muslims place substantially greater importance on work in their lives.

The pattern of control variables is also consistent with expectations about labor-market attachment: employed individuals—whether full-time, part-time, or self-employed—report substantially greater importance of work, while women attach significantly less importance to work, reflecting enduring gendered divisions in labor expectations. Work importance also rises modestly with age before flattening, as indicated by the significant but very small quadratic term. Higher social class, being married, and having children are associated with slightly lower evaluations of work importance, suggesting that family or socioeconomic security may lower the centrality of work in respondents' self-conceptions.

Model M2b tests Hypothesis H2b, which posits that religiosity strengthens the belief that "hard work brings success." The results run counter to this expectation. The coefficient on religiosity is negative and statistically significant at the 1% level ($b = –0.282$, $p < .01$), indicating that more religious individuals are more inclined to attribute success to luck or connections rather than to personal effort. Thus, religiosity appears to weaken meritocratic beliefs. Several control variables move in the opposite direction: women, the employed, and the self-employed are significantly more likely to believe in the payoff to hard work. Education and social class, by contrast, sharply reduce belief in meritocracy, possibly reflecting lack of confidence in social mobility mechanisms and/or exposure to structural inequalities among more educated or higher-status respondents. Other demographic factors—including health, age, marriage, and income—play limited roles in shaping meritocratic beliefs.

Model M2c evaluates Hypothesis H2c, which predicts that religious Muslims are more likely to agree that it is humiliating to live on money without working. The results strongly support this hypothesis. The variable *Religiosity index* is positively and significantly associated with moral disapproval of receiving unearned income ($b = 0.093$, $p < .01$). A number of background characteristics shape this attitude as well. Education consistently increases condemnation of living without work, while higher income is also associated with stronger rejection of unearned benefits. Age, marital status, and employment status do not exert meaningful influence. Because this question as well as the two subsequent ones are included in only a subset of country–wave combinations, the sample size for this model is substantially smaller, though the relationships remain robust.

Model M2d corresponds to Hypothesis H2d, which anticipates that more religious Muslims will view work as a duty toward society. The results again align with expectations: religiosity has a positive and highly significant effect ($b = 0.047$, $p < .01$). Here, greater religiosity appears

to reinforce a civic-moral understanding of work, beyond personal or instrumental considerations. Women are markedly less likely to endorse work as a social duty, while education is positively associated with such civic norms. Respondents with more children express slightly weaker endorsement of work duty, perhaps due to competing familial obligations. Other controls show no significant effects.

Finally, Model M2e tests Hypothesis H2e, which predicts that religious Muslims are more likely to express the view that "people who do not work turn lazy," a strong work-first principle. Once again, the results are consistent with the hypothesis: religiosity is positively and significantly associated with stronger work-first norms ($b = 0.046$, $p < .05$). Control variables reveal a familiar pattern. Women and respondents with more children consistently report lower endorsement of strict work norms.

Taken together, the results reveal a consistent pattern: religiosity strengthens the *moral* and *duty-based* dimensions of work values—religious Muslims are more likely to view work as important, morally required, and socially expected (supporting H2a, H2c, H2d, and H2e). However, religiosity does not reinforce meritocratic beliefs about the economic returns to effort. In fact, more religious Muslims are significantly *less* likely to believe that hard work leads to economic success (contradicting H2b).

Rather than indicating a morally grounded work ethic in the Weberian sense, the pattern suggests that highly religious respondents do not associate hard work with upward economic mobility. Instead, they appear to believe that economic outcomes depend on forces outside individual control—luck, connections, or structural advantages. This interpretation is consistent with the institutional context of many Arab countries, where perceived corruption, cronyism, and unequal access to opportunity weaken the credibility of meritocratic pathways and may shape the link between religiosity and economic expectations.

c. Religiosity and Attitudes Toward Illegality and Corruption

Table 4 reports the OLS estimates for the third set of hypotheses, which examine whether higher religiosity is associated with *lower tolerance* for dishonest, unethical, or illegal behaviors. Across all four models—covering unjustified benefit claims (M3a), fare evasion (M3b), tax cheating (M3c), and bribery (M3d)—the coefficient on the religiosity index is positive and statistically significant at the 1% level. Because higher values of these dependent variables indicate stronger rejection of wrongdoing, these results uniformly support hypotheses H3a–H3d.

For unjustified benefit claims, religiosity is strongly and positively associated with rejecting this behavior ($b = 0.126$, $p < 0.01$). More religious Muslims are thus significantly less tolerant of fraudulently claiming benefits. Regarding controls, poor health is significantly associated with a lower rejection of benefit fraud, suggesting greater leniency among those in worse health. Education is positively associated with rejecting benefit fraud, while self-employed respondents show a weaker rejection ($b = –0.143$, $p < 0.10$), consistent with higher perceived economic precarity. Other demographic variables—including age, income, and social class—do not show significant effects in this specification.

Model M3b demonstrates that religiosity significantly predicts opposition to fare evasion (b = 0.146, p < 0.01). All else equal, more religious Muslims are more likely to condemn avoiding payment on public transport. Among controls, women express slightly stronger disapproval than men. Poor health again predicts greater tolerance of wrongdoing (b = –0.140, p < 0.01). Education shows a particularly strong and significant positive effect, making it one of the most important predictors of opposition to fare evasion. Social class has a significant yet modest negative coefficient, suggesting that lower-class respondents tend to be harsher toward fare evasion than upper-class respondents. Other controls exhibit no significant influence.

The model for tax cheating reveals similarly strong patterns. Religiosity is again positively associated with rejecting this behavior (b = 0.131, p < 0.01). This confirms H3c, indicating that religious individuals are less tolerant of tax evasion. Several controls are also influential. Women are significantly more disapproving of tax cheating (b = 0.139, p < 0.01). Poor health predicts greater acceptance of tax evasion, mirroring earlier models. Education is positively associated with rejecting tax cheating. Higher income, in contrast, reduces the likelihood of condemning tax evasion (b = –0.039, p < 0.01), consistent with international evidence that wealthier individuals feel less compelled by redistributive fiscal norms. Self-employed individuals are also more tolerant of tax cheating (b = –0.161, p < 0.05), possibly reflecting greater opportunities or incentives to underreport income.

In the final model, religiosity continues to exhibit a positive, highly significant effect on rejecting bribery (b = 0.109, p < 0.01). This again provides strong support for H3d. Control variables show several notable patterns. Women express slightly stronger condemnation of bribery than men (b = 0.040, p < 0.10). Poor health is associated with greater tolerance of bribery. Education is again positively associated with stricter legality norms (b = 0.024, p < 0.01), while income reduces condemnation of bribery (b = –0.017, p < 0.01).

With regards to this set of hypotheses and across all four measures, the findings reveal a robust and consistent pattern: Higher religiosity among Muslims is associated with significantly lower tolerance for illegal or unethical behaviors. This effect is stable across models with full controls, country fixed effects, and wave fixed effects. Importantly, the coefficients are not only statistically significant but also substantively meaningful, placing religiosity among the strongest predictors of legality norms in the dataset. Control variables show intuitive and consistent patterns: women and those with higher education reject corruption more strongly; poorer health predicts more permissive attitudes; and higher income and self-employment tend to reduce condemnation of tax-related violations. These patterns align with existing evidence on economic vulnerability, opportunity structures, and moral norms in developing economies.

d. Robustness check

To evaluate the stability of the results, I conduct two robustness checks. First, I replace the additive standardized religiosity index with the PCA-based religiosity factor. Across all market attitudes, work norms, and legality outcomes, the substantive direction of religiosity effects remains unchanged. The magnitude of coefficients also remains similar, though the PCA measure produces slightly smaller effects for some market outcomes (e.g., income equality, private ownership, and wealth accumulation) and slightly larger ones for several work-ethic

indicators (e.g., humiliating to live without working). These differences are modest and consistent with the PCA factor capturing a somewhat narrower but more concentrated dimension of religiosity. Overall, the conclusions from Tables 2–4 remain intact: higher religiosity is systematically associated with stronger work norms, higher moral condemnation of illegal behavior, and more conservative views on several market outcomes.

Second, because many dependent variables are ordinal, I re-estimate all models using ordered logit. These models strongly corroborate the OLS results. In every specification, the sign and significance of the religiosity coefficient are unchanged. The ordered logit estimates differ mainly in scale—as expected when switching from linear to multiplicative odds ratios—but not in substance. The association between religiosity and market competition is slightly stronger in the ordered logit models, while the magnitude of religiosity's effect on "hard work brings success" becomes somewhat smaller in odds-ratio terms. No substantive conclusions are altered.

Taken together, the robustness checks demonstrate that the results are not sensitive to either (1) the measurement strategy for religiosity or (2) the functional form of the model. Full regression tables for all robustness analyses are available upon request[‡].

VI. Discussion, Policy Implications, and Conclusion

This article has examined how religiosity among Muslims in ten Arab countries is associated with economic attitudes toward markets, work, and legality. Using pooled World Values Survey data from Waves 5–7 (2005–2022), a multidimensional religiosity index, and country–wave fixed effects, the analysis offers one of the most comprehensive micro-level portraits to date of how religion intersects with economic values in the Arab world. Contrary to a long tradition of culturalist claims that Islamic religiosity is inherently anti-market or fatalistic, the results reveal a more complex and internally differentiated pattern.

On market-related attitudes, the findings are striking. Religiosity is not associated with a stronger preference for income equality, but it is robustly linked to more market-friendly views on several core dimensions. More religious Muslims are significantly more likely to favor individual responsibility over state responsibility in providing for the needy, express stronger support for private ownership, endorse competition as beneficial, and adopt a more positive-sum understanding of wealth creation. Taken together, these results contradict the communitarian expectations articulated in Hypotheses H1a–H1e and challenge influential readings of "Islamic economics" that portray religious Muslims as systematically skeptical of markets, incentives, and private property. In the Arab context studied here, higher religiosity is associated with a more economically orthodox, incentive-compatible worldview.

The picture is different, and more ambivalent, when it comes to work values. Religiosity clearly strengthens the moral and duty-based dimensions of work: more religious respondents place

[‡] The full robustness tables are included in the referee appendix for review purposes only and will not appear in the published version.

greater importance on work in their lives, are more likely to view living on unearned income as humiliating, see work as a duty toward society, and agree that people who do not work become lazy. These results support Hypotheses H2a and H2c–H2e and resonate with the literature on the Islamic work ethic. At the same time, religiosity is negatively associated with the belief that hard work brings economic success. More religious Muslims are less likely to endorse meritocratic narratives and more likely to attribute economic outcomes to luck, connections, or structural factors, contradicting Hypothesis H2b. This combination—strong work ethic, but weak belief in the payoff to effort—is central to understanding the role of religiosity in contemporary Arab societies.

Finally, the results on illegality and corruption are unambiguous. Across all four indicators—illegally claiming government benefits, fare evasion, tax evasion, and bribery—higher religiosity is associated with significantly lower tolerance for wrongdoing. These relationships are substantively large, highly statistically significant, and robust to alternative measures of religiosity and ordered logit estimation. Religiosity emerges as one of the strongest predictors of legality norms in the data. This supports Hypotheses H3a–H3d and aligns with doctrinal emphases on honesty, trust, and the prohibition of illicit gains in Islamic sources, as well as with broader empirical work linking religiosity to stricter ethical standards.

Taken together, the findings suggest a distinctive configuration of attitudes among religious Arab Muslims: they are pro-market and pro-work, but skeptical of meritocracy and intolerant of corruption. Rather than endorsing a state-centric communitarian model, more religious respondents tend to favor individual responsibility, private ownership, competition, and positive-sum wealth creation. At the same time, they reject living off unearned income, see work as a social duty, and strongly condemn illegal and corrupt practices—yet they do not believe that hard work reliably translates into economic success.

This pattern is intelligible in light of the contemporary political economy of many Arab countries. Over the last two decades—spanning the pre–Arab Spring period, the uprisings of 2010–2011, and their aftermath—the region has combined high religiosity with chronic youth unemployment, segmented labor markets, pervasive informality, and entrenched perceptions of corruption and cronyism. Surveys consistently highlight wasta (connections), patronage, and unequal access to state and private opportunities as central obstacles to social mobility. In such a context, it is unsurprising that more religious individuals internalize strong work norms and moral commitments yet remain unconvinced that the economic system rewards effort fairly.

In other words, religiosity in the Arab world appears to coexist with a deeply critical view of the functioning of markets and institutions, rather than with opposition to markets as such. The pro-market orientation revealed in the data concerns the ideal organization of economic life—competition, incentives, private ownership, and positive-sum growth—while the weak belief in meritocracy likely reflects lived experience in economies characterized by limited upward mobility, pervasive informality, and perceived corruption. This configuration helps explain why appeals to Islamic ethics can simultaneously underpin critiques of existing economic orders and support for more competitive and rule-bound markets.

These results carry several implications for policymakers, reformers, and international partners concerned with economic development and governance in the Arab region. First, religiosity is not an obstacle to market-oriented reform per se. The finding that more religious Muslims are, if anything, more supportive of private ownership, competition, and individual responsibility suggests that religious publics are not inherently hostile to market-based reforms. Policy debates that frame economic liberalization as a secular or "Western" project opposed by religious constituencies risk misdiagnosing the underlying political economy. Insofar as citizens doubt that markets will be fair, transparent, and accessible rather than captured by elites, resistance is likely to reflect distrust in institutions rather than doctrinal opposition to markets. Reform strategies that emphasize equal access, fair competition, and protection from crony capitalism are therefore more likely to resonate with religious as well as secular segments of society.

Second, the combination of strong work norms and weak meritocratic beliefs underscores the centrality of fairness and opportunity. More religious Arabs clearly value work and regard living off unearned income as morally problematic, but they do not believe that effort alone is rewarded. In contexts of high youth unemployment and segmented labor markets, this gap between moral norms and perceived opportunity structures can generate frustration, disillusionment, and political alienation. Policies that strengthen the credibility of meritocratic channels—transparent recruitment in public administration, fair and contestable procedures for public contracts, and open, rules-based access to business opportunities—are likely to be crucial not only for economic efficiency but also for reconciling religiously grounded work ethics with lived economic experience.

Third, religiosity can be a resource for anti-corruption and legality agendas. The strong and consistent association between religiosity and rejection of corrupt and illegal acts suggests that religious values can be mobilized in support of integrity-oriented reforms. This does not mean outsourcing anti-corruption policy to religious authorities, but it does imply that coalitions between state institutions, civil-society actors, and religious leaders may be especially effective when they frame corruption as both a legal and a moral violation. Public campaigns, school curricula, and religious discourse that emphasize honesty, public trust, and the religious prohibition of illicit gains could complement institutional reforms such as asset disclosure regimes, independent oversight bodies, and digitization of bureaucratic procedures.

Fourth, social protection and redistribution debates should take seriously the preference for individual responsibility. The result that more religious respondents are less supportive of state responsibility for the poor suggests that welfare reforms framed purely in statist terms may encounter resistance, even in high-need contexts. Policy designs that combine targeted state support with incentives for work and community-based solidarity—such as contributory schemes, conditional transfers tied to education and training, and support for zakat- or waqf-based initiatives that complement public programmes—may better reflect prevailing value structures. This also implies that simply invoking Islamic charity as a substitute for systemic social protection is neither adequate nor consistent with the pro-market and anti-corruption attitudes documented here; rather, religious norms can be integrated into broader systems that protect the vulnerable without undermining work incentives.

Fifth, education policy and civic education are central. The strong role of education as a predictor of stricter legality norms, alongside the independent effect of religiosity, suggests that civic and religious socialization can reinforce one another. Curricula that link religious teachings about honesty, responsibility, and justice to concrete civic principles—tax compliance, respect for public goods, and fair competition—could help bridge the gap between moral norms and institutional practice. This is especially salient for younger cohorts, who face acute labor-market pressures but also show signs of renewed religiosity in recent Arab Barometer waves.

Several limitations of this study, already noted, point to fruitful avenues for future work. First, the analysis relies on cross-sectional survey data and cannot establish causal effects of religiosity on economic attitudes. Panel data, experimental designs, and quasi-experimental exposure to religious discourse or institutional change would help to clarify causality and mechanisms. Second, the study focuses on self-identified Muslims in ten Arab countries and cannot speak to cross-religious comparisons within the region or to non-Arab Muslim-majority contexts. Future research could explore whether the "pious, pro-market, but skeptical of meritocracy" configuration identified here also holds in non-Arab settings, or whether it is specific to the historical and institutional trajectories of Arab societies.

Third, while the religiosity index captures belief, practice, and self-identification, it does not differentiate between theological orientations (e.g., Islamist vs. secular-leaning religious, Sufi vs. Salafi) or between official and informal religious authority. Combining survey data with subnational measures of religious institutions or with more granular doctrinal indicators would allow for a richer understanding of intra-religious variation. Finally, linking stated attitudes to behavioral outcomes—such as actual tax compliance, labor-market participation trajectories, or engagement in informal payments—remains an important challenge.

Despite these limitations, the analysis offers a timely and empirically grounded contribution to debates on religion, markets, and development in the Arab world. It shows that higher religiosity among Arab Muslims is associated with more market-friendly orientations, stronger work norms, and stricter legality standards, but also with skepticism about the fairness of economic rewards. In doing so, it challenges essentialist narratives that attribute the region's economic difficulties to an inherently anti-market "Islamic" culture and instead points to the interaction between religiously grounded values and institutional environments characterized by inequality, informality, and perceived corruption.

For scholars, the findings underscore the need to move beyond simple denominational comparisons and toward a more nuanced, multidimensional account of religiosity and economic attitudes. For policymakers, they suggest that religious values can be allies rather than obstacles in advancing agendas of fairer markets, stronger work incentives, and cleaner government—provided that reforms tackle not only the structure of incentives but also the credibility of institutions tasked with upholding them.

References

Ahmed, D. I., & Gouda, M. (2015). Measuring constitutional Islamization: The Islamic Constitutions Index. *Hastings International and Comparative Law Review, 38*, 1–74.

Arab Barometer. (2023). *Arab Barometer Wave 7 (2021–2022)*. Retrieved from **https://www.arabbarometer.org/survey-data/**

Abdullah, R., Ismail, I., Yusop, Z., & Al Mamun, A. (2023). An exploration of religiosity influences on Islamic work ethic over time. *Cogent Social Sciences, 9*(1), Article 2181127.

Ahlolbait.com. (October 17, 2017). Nahj al-Balagha: Wisdom 328. Retrieved November 27, 2025, from **https://ahlolbait.com/content/18570/ترجمه-و-شرح-حکمت-328-نهج-البلاغه-وظیفه-اغنیا-نسبت-به-فقرا**

Akhmadi, A., Hendryadi, S., Sumail, L. O., & Pujiwati, A. (2023). Islamic work ethics and employees' prosocial voice behavior: The multi-role of organizational identification. *Cogent Social Sciences, 9*(1), Article 2213862.

Ali, A. J. (1992). The Islamic work ethic in Arabia. *The Journal of Psychology, 126*(5), 507–519.

Alemán, J., & Woods, D. (2023). Majority religion, political regimes, and attitudes toward economic and personal freedom. *Comparative Political Studies, 57*(4), 567–598.

Barro, R. J., & McCleary, R. M. (2003). Religion and economic growth across countries. *American Sociological Review, 68*(5), 760–781.

Basedau, M., Gobien, S., & Prediger, S. (2018). The multidimensional effects of religion on socioeconomic development: A review of the empirical literature. *Journal of Economic Surveys, 32*(4), 1106–1133.

Bazley, W. J., Cronqvist, H., Mendlowitz, S., & Siegel, S. (2024). Religion and financial hardship. *Journal of Economic Behavior & Organization, 218*, 369–387.

Becker, S. O., & Woessmann, L. (2009). Was Weber wrong? A human capital theory of Protestant economic history. *Quarterly Journal of Economics, 124*(2), 531–596.

Benjamin, D. J., Choi, J. J., & Fisher, G. (2016). Religious identity and economic behavior. *Review of Economics and Statistics, 98*(4), 617–637.

Benefiel, M., Fry, L. W., & Geigle, D. (2014). Spirituality and religion in the workplace: History, theory, and research. *Psychology of Religion and Spirituality, 6*(3), 175–187.

Berggren, N., & Bjørnskov, C. (2011). Is the importance of religion in daily life related to social trust? Cross-country and cross-state comparisons. *Journal of Economic Behavior & Organization, 80*(3), 459–480.

Berggren, N., & Bjørnskov, C. (2013). Does religiosity promote property rights and the rule of law? *Journal of Institutional Economics, 9*(2), 161–185.

Bessey, D. (2024). Religion, personality, or none of them? Exploratory evidence on their correlations with economic preference parameters. *Frontiers in Psychology, 15*, Article 1361910.

Blaydes, L., & Gillum, R. M. (2013). Religiosity-of-interviewer effects: Assessing the impact of veiled enumerators on survey response in Egypt. *Politics and Religion, 6*(3), 459–482.

Cantoni, D. (2015). The economic effects of the Protestant Reformation: Testing the Weber hypothesis in the German lands. *Journal of the European Economic Association, 13*(4), 561–598.

Chapra, M. U. (2000). *The future of economics: An Islamic perspective*. Islamic Foundation.

D'Amore, R., & Iorio, R. (2025). Religion as a determinant of social capital and economic performance: An analysis of Italian data. *Prosperitas, 12*(3), 1–13.

Darakhshan Zia, M., & Nasir-Ud-Din, N. (2023). Islamic economic rationalism and distribution of wealth: A comparative view. *IOSR Journal of Business and Management, 18*(4), 43–52.

Davidson, J. C., & Caddell, D. P. (1994). Religion and the meaning of work. *Journal for the Scientific Study of Religion, 33*(2), 135–147.

Davis, N. J., & Robinson, R. V. (2006). The egalitarian face of Islamic orthodoxy: Support for Islamic law and economic justice in seven Muslim-majority nations. *American Sociological Review, 71*(2), 167–190.

Davis, N. J., & Robinson, R. V. (2012). *Claiming society for God: Religious movements and social welfare*. Indiana University Press.

Davis, L. S., & Rodríguez, J. (2024). Do religious beliefs matter for economic values? *Journal of Institutional Economics, 20*(1), 1–28.

Diwan, I., Tzannatos, Z., & Akin, T. (2018). Debunking myth: Economic values in the Arab world through the prism of opinion polls. *Middle East Development Journal, 10*(1), 31–63.

El-Gamal, M. A. (2006). *Islamic finance: Law, economics, and practice*. Cambridge University Press.

Enke, B., Rodríguez-Padilla, R., & Zimmermann, F. (2022). Moral universalism: Measurement and economic relevance. *Management Science, 68*(5), 3590–3603.

Esposito, J. L. (2003). *The Oxford dictionary of Islam*. Oxford University Press.

Evrensel, A. Y., & Sened, I. (2019). Does higher religiosity translate into higher institutional quality? Evidence from 98 countries. *SAGE Open, 9*(3), 1–13.

Fakhrurrozi, F. (2024). The Qur'anic perspective on wealth and its distribution. *Journal of Islamic Economics, 2*(4), 45–62.

Gokcekus, O., & Ekici, T. (2020). Religion, religiosity, and corruption. *Review of Religious Research, 62*(4), 563–581.

Gouda, M. (2025). *Religion and economic attitudes in Egypt* (Economic Development and Policies Working Paper No. EDP.2025.02). Egyptian Center for Economic Studies.

Gouda, M., & Park, S.-M. (2015). Religious loyalty and acceptance of corruption. *Journal of Economics and Statistics, 235*(2), 184–206.

Guiso, L., Sapienza, P., & Zingales, L. (2003). People's opium? Religion and economic attitudes. *Journal of Monetary Economics, 50*(1), 225–282.

Helmke, G., & Levitsky, S. (2004). Informal institutions and comparative politics: A research agenda. *Perspectives on Politics, 2*(4), 725–740.

Iannaccone, L. R. (1998). Introduction to the economics of religion. *Journal of Economic Literature, 36*(3), 1465–1495.

Kamali, M. H. (2002a). *Freedom, equality and justice in Islam*. Islamic Texts Society.

Kamali, M. H. (2002b). *Islamic commercial law: An analysis of futures and options*. Ilmiah Publishers.

Khan, M. A. (1997). The role of government in the economy. *American Journal of Islamic Social Sciences, 14*(2), 155–171.

Kirchmaier, I., Prüfer, J., & Trautmann, S. T. (2018). Religion, moral attitudes and economic behavior. *Journal of Economic Behavior & Organization, 148*, 282–300.

Kuran, T. (2010). *Islam and mammon: The economic predicaments of Islamism*. Princeton University Press.

Kuran, T. (2011). *The long divergence: How Islamic law held back the Middle East*. Princeton University Press.

Landes, D. S. (1999). *The wealth and poverty of nations: Why some are so rich and some so poor*. W. W. Norton.

Lei, L., Lu, W., Niu, G., & Zhou, Y. (2024). Religiosity and financial distress of the young. Journal of Banking & Finance, 168, 107276.

León, A., & Pfeifer, C. (2017). Religious activity, risk-taking preferences, and financial behaviour: Empirical evidence from Germany. *Journal of Behavioral and Experimental Finance, 13*, 12–25.

McCleary, R. M., & Barro, R. J. (2006). Religion and economy. *Journal of Economic Perspectives, 20*(2), 49–72.

Minarik, P. (2014). Religion and economic attitudes in post-communist countries. *Comparative Economic Studies, 56*(4), 519–538.

Nomani, F., & Rahnema, A. (1994). *Islamic economic systems*. Zed Books.

Norris, P., & Inglehart, R. (2011). *Sacred and secular: Religion and politics worldwide* (2nd ed.). Cambridge University Press.

North, C. M., Orman, W. H., & Gwin, C. R. (2013). Religion, corruption, and the rule of law. *Journal of Money, Credit, and Banking, 45*(5), 757–779.

Pepinsky, T. B., & Welborne, B. C. (2011). Piety and redistributive preferences in the Muslim world. *Political Research Quarterly, 64*(3), 491–505.

Pew Research Center. (2017). *The changing global religious landscape*. **https://www.pewresearch.org/religion/2017/04/05/the-changing-global-religious-landscape/**

Pew Research Center. (2018). *The age gap in religion around the world*. [Fact sheet].

Putnam, R. D. (1993). *Making democracy work: Civic traditions in modern Italy*. Princeton University Press.

Reda, A. (2013). Islam and markets. *Review of Social Economy, 71*(1), 20–43.

Renneboog, L., & Spaenjers, C. (2012). Religion, economic attitudes, and household finance. *Oxford Economic Papers, 64*(1), 103–127.

Rice, G. (1999). Islamic ethics and the implications for business. *Journal of Business Ethics, 18*, 345–358.

Rubin, J. (2017). *Rulers, religion, and riches: Why the West got rich and the Middle East did not*. Cambridge University Press.

Smith, A. (1759). *The theory of moral sentiments*. A. Millar.

Steiner, L., Leinert, L., & Frey, B. S. (2020). Economics, religion and happiness. In T. Beschorner, A. Brink, B. Hollstein, M. C. Hübscher & O. Schumann (Eds.), *Wirtschafts- und Unternehmensethik* (pp. 27–43). Springer Fachmedien Wiesbaden.

Tessler, M. (2002). Islam and democracy in the Middle East: The impact of religious orientations on attitudes toward democracy in four Arab countries. *Comparative Politics, 34*(3), 337–354.

Trautmann, S. T. (2022). Religion and economic preferences. In K. F. Zimmermann (Ed.), *Handbook of labor, human resources and population economics* (pp. 1–15). Springer.

Udin, U., Dananjoyo, R., Shaikh, M., & Vio Linarta, D. (2022). Islamic work ethics, affective commitment, and employee's performance in family business: Testing their relationships. *SAGE Open, 12*(1), 1–10.

Weber, M. (1905). *The Protestant ethic and the spirit of capitalism*. Unwin.

Williamson, O. E. (2000). The new institutional economics: Taking stock, looking ahead. *Journal of Economic Literature, 38*(3), 595–613.

World Bank. (2023). *Arab world population*. **https://data.worldbank.org/region/arab-world**

World Values Survey. (2022). *World Values Survey Wave 7 (2017–2022)*. World Values Survey Association. **https://www.worldvaluessurvey.org/WVSDocumentationWV7.jsp**

Yousef, D. A. (2001). Islamic work ethic: A moderator between organizational commitment and job satisfaction in a cross-cultural context. *Personnel Review, 30*(2), 152–169.

Zafar, M. B., & Abu-Hussin, M. F. (2025). Religiosity and Islamic work ethic: A cross-cultural comparison in majority and non-majority Muslim countries. *International Journal of Intercultural Relations, 105*, Article 102115.

Zaman, A. (2013). Is development accumulation of wealth? Islamic views. *International Journal of Economics and Finance, 5*(1), 232–239.

Table 1: Descriptive Statistics

Variable	WVS Questions Description (Original Wording Preserved)	Obs	Mean	SD	Min	Max
Religiosity index	Weighted additive index constructed from three WVS items: (1) A006 "Indicate how important religion is in your life" (1 = Not at all important; 4 = Very important); (2) F028 "Apart from weddings, funerals and christenings, about how often do you attend religious services these days?" (1 = More than once a week; 8 = Never, practically never); (3) F034 "Independently of whether you go to church or not, would you say you are a religious person?" (1 = A religious person; 3 = A convinced atheist). Each item was standardized (z-score), averaged, and standardized again. All items were reverse-coded prior to standardization so that higher values indicate greater religiosity.	40,409	0.02	0.95	–4.97	1.61
Religiosity PCA	First principal component of A006, F028, and F034, standardized. Captures the main latent dimension of religiosity combining importance, attendance, and self-identification. Higher values indicate stronger religiosity.	30,978	0.01	0.97	–4.90	0.87
Income equality	E035: "Incomes should be made more equal vs. there should be greater incentives for individual effort." Scale ranges from 1 = Incomes should be made more equal to 10 = Greater incentives for individual effort. Higher values indicate more acceptance of inequality.	38,900	6.42	3.10	1	10
People responsible	E037: "The government should take more responsibility to ensure everyone is provided for vs. people should take more responsibility to provide for themselves." Scale ranges from 1 = Government should take more responsibility to 10 = People should take more responsibility. Higher values indicate preference for individual responsibility over state welfare.	39,358	7.10	2.89	1	10
Private ownership	E036: "Government ownership of business should be increased vs. private ownership should be increased." Scale ranges from 1 = Government ownership should increase to 10 = Private ownership should increase. Higher values reflect stronger pro-market attitudes.	37,955	6.17	2.99	1	10
Competition	E039: "Competition is harmful—it brings out the worst in people vs. competition is good—it stimulates people to work hard and develop new ideas." Scale ranges from 1 = Competition is harmful to 10 = Competition is good. Higher values denote stronger support for market competition.	27,495	7.82	2.65	1	10

Variable	WVS Questions Description (Original Wording Preserved)	Obs	Mean	SD	Min	Max
Wealth accumulation	E041: "People can only get rich at the expense of others vs. wealth can grow so there's enough for everyone." Scale ranges from 1 = Getting rich at the expense of others to 10 = Wealth can grow for all. Higher values indicate more positive views toward wealth creation and capitalism.	18,480	6.48	3.02	1	10
Work important	A005: "Indicate how important work is in your life." Scale: 1 = Not at all important; 4 = Very important. Reverse-coded and standardized to align with other attitudinal scales. Higher values denote greater work importance.	40,054	3.65	0.72	1	4
Hard work brings success	E040: "Hard work doesn't generally bring success—it's more a matter of luck and connections vs. In the long run, hard work usually brings a better life." Scale: 1 = Success depends on luck; 10 = Hard work brings success. Higher values reflect stronger belief in the value of hard work.	26,580	3.71	3.05	1	10
Humiliating to live on money w/o work	C037: "It is humiliating to receive money without having to work for it." Scale: 1 = Strongly disagree; 10 = Strongly agree. Higher values indicate stronger work-ethic orientation.	6,433	4.23	1.07	1	5
Work is duty toward society	C039: "Work is a duty toward society." Scale: 1 = Strongly disagree; 10 = Strongly agree. Higher values denote greater endorsement of work as a moral and social obligation.	14,202	4.49	0.77	1	5
Work comes first	C041: "People who don't work turn lazy." Scale: 1 = Strongly disagree; 10 = Strongly agree. Higher values indicate stronger work-centered values.	14,206	4.32	0.89	1	5
Not claiming benefits	F114A: "Claiming government benefits to which you are not entitled." Original: 1 = Always justifiable; 10 = Never justifiable. Reverse-coded so higher values = lower acceptance of corruption.	34,297	8.37	2.57	1	10
(Not) Avoiding fare	F115: "Avoiding a fare on public transport." Original: 1 = Always justifiable; 10 = Never justifiable. Reverse-coded so higher = lower justification of fare evasion.	32,933	8.80	2.21	1	10
(Not) Cheating tax	F116: "Cheating on taxes if you have the chance." Scale 1 = Always justifiable; 10 = Never justifiable. Reverse-coded so higher = lower acceptance of tax evasion.	32,131	8.93	2.07	1	10

Variable	WVS Questions Description (Original Wording Preserved)	Obs	Mean	SD	Min	Max
(Not) Accepting bribe	F117: "Someone accepting a bribe in the course of their duties." Scale 1 = Always justifiable; 10 = Never justifiable. Reverse-coded so higher = less tolerance toward bribery.	39,975	9.42	1.55	1	10
Female	X001 (Gender): 0 = Male; 1 = Female.	40,481	0.50	0.50	0	1
Age	X003 (Age in years).	40,444	37.68	14.08	15	99
Age squared	Computed as Age² to capture nonlinear age effects.	40,444	1618.14	1222.11	225	9801
Bad health	A009: "All in all, how would you describe your state of health?" Recoded: 0 = Good/Very good; 1 = Fair/Poor/Very poor.	40,410	0.28	0.45	0	1
EmployedFP	X028: 1 = Full time, 2 = Part time, 3 = Self-employed, others = not employed. Recoded as 1 for full/part-time employment.	40,527	0.37	0.48	0	1
Self-employed	X028: Self-employed = 1; others = 0.	40,527	0.11	0.31	0	1
Education	X025: Recoded into five levels — 1 = No formal education; 2 = Primary; 3 = Secondary; 4 = Post-secondary; 5 = University or higher.	26,103	2.92	1.26	1	5
Scale of incomes	X047_WVS: "Here is a scale of incomes. Where would you place your household?" Scale 1 = Lowest income decile; 10 = Highest income decile.	38,476	4.69	2.15	1	10
Social class	X045: "People sometimes describe themselves as belonging to a particular social class." Scale 1 = Lower class; 5 = Upper class. Reverse-coded so higher = higher class.	39,611	2.70	0.99	1	5
Married	X007: Married = 1; otherwise = 0.	40,527	0.64	0.48	0	1
Children	X011: "How many children do you have?"	39,753	2.18	1.93	0	5

Note: All codes are from "WVS Time Series 1981 2022- Variable Report V5.0". Version number 5-0-0 (2024-04-30). doi.org/10.14281/18241.25.

Table 2: Religiosity and market attitude (Independent Variable: Religiosity index, OLS)

	(M1a) Income equality		(M1b) People responsible		(M1c) Private ownership		(M1d) Competition is good		(M1e) Wealth accumulation	
	b	se	b	se	b	se	b	se	b	se
Religiosity index	0.018	0.023	0.115***	0.021	0.040*	0.023	0.217***	0.026	0.077***	0.029
Female	0.049	0.049	0.014	0.045	0.241***	0.049	-0.070	0.049	0.074	0.061
Age	-0.032***	0.012	0.003	0.011	-0.010	0.011	0.012	0.011	0.003	0.014
Age squared	0.000***	0.000	-0.000	0.000	0.000	0.000	-0.000	0.000	0.000	0.000
Bad_health	-0.149***	0.053	0.154***	0.046	0.185***	0.051	-0.132**	0.055	0.067	0.070
EmployedFP	0.088	0.057	-0.125**	0.053	0.129**	0.055	-0.092	0.057	-0.050	0.071
Self_employed	-0.063	0.082	-0.110	0.073	-0.199**	0.084	-0.103	0.086	0.025	0.108
Education	0.080***	0.019	-0.030*	0.017	-0.068***	0.019	0.128***	0.019	0.017	0.024
Income	0.105***	0.013	-0.111***	0.012	-0.019	0.013	-0.050***	0.014	0.007	0.018
Social class	0.065**	0.028	-0.082***	0.025	-0.122***	0.027	0.091***	0.030	-0.011	0.037
Married	-0.099	0.063	0.109**	0.055	0.083	0.062	0.028	0.064	0.177**	0.078
Children	0.102***	0.019	-0.018	0.019	0.032*	0.018	-0.002	0.018	0.007	0.024
Country FE	Yes		Yes		Yes		Yes		Yes	
Survey-Wave FE	Yes		Yes		Yes		Yes		Yes	
r2	0.096		0.101		0.047		0.056		0.083	
rmse	2.882		2.662		2.848		2.389		2.883	
N	23,313		23,573		22,951		14,758		14,159	

Robust SEs; weighted by survey wave; country & wave FE included. * $p < .10$, ** $p < .05$, *** $p < .01$

Table 3: Religiosity and attitude towards hard work (Independent Variable: Religiosity index, OLS)

	(M2a) Work important		(M2b) Hard work brings success		(M2c) Humiliating to live on money w/o work		(M2d) Work is duty toward society		(M2e) Work comes first	
	b	se	b	se	b	se	b	se	b	se
Religiosity index	0.086***	0.006	-0.282***	0.03	0.093***	0.026	0.047***	0.015	0.046**	0.019
Female	-0.213***	0.010	0.191***	0.059	-0.073	0.045	-0.111***	0.025	-0.137***	0.03
Age	0.006**	0.002	0.002	0.013	-0.003	0.009	0.003	0.005	0.006	0.007
Age squared	-0.000***	0.000	0	0	0	0	0	0	0	0
Bad_health	-0.044***	0.012	-0.04	0.063	0.07	0.045	-0.02	0.029	-0.012	0.032
EmployedFP	0.277***	0.011	0.176***	0.066	0.045	0.054	0.003	0.033	0.014	0.036
Self_employed	0.225***	0.014	0.278***	0.102	0.128	0.103	-0.072	0.084	-0.047	0.09
Education	0.028***	0.004	-0.051**	0.022	0.038**	0.017	0.021**	0.01	0.004	0.012
Income	0.002	0.003	0.004	0.017	0.020*	0.011	-0.01	0.006	-0.005	0.008
Social class	-0.028***	0.006	-0.136***	0.036	-0.011	0.025	0.02	0.014	0.001	0.018
Married	-0.037***	0.014	-0.038	0.074	-0.038	0.053	0.011	0.031	0.04	0.036
Children	-0.008**	0.004	-0.006	0.023	-0.026	0.017	-0.015*	0.009	-0.021**	0.01
Country FE	Yes		Yes		Yes		Yes		Yes	
Survey-Wave FE	Yes		Yes		Yes		Yes		Yes	
r2	0.15		0.085		0.048		0.028		0.035	
rmse	0.65		2.772		1.08		0.631		0.746	
N	23726		14490		3784		3780		3786	

Robust SEs; weighted by wave; country & wave FE included. * $p < .10$, ** $p < .05$, *** $p < .01$

Table 4: Religiosity and attitude towards illegal activities (Independent Variable: Religiosity index)

	(M3a) (Not) Claiming benefits		(M3b) (Not) Avoiding fare		(M3c) (Not) Cheating tax		(M3d) (Not) Accepting bribe	
	b	se	b	se	b	se	b	se
Religiosity index	0.126***	0.023	0.146***	0.021	0.131***	0.021	0.109***	0.014
Female	-0.018	0.045	0.078*	0.041	0.139***	0.039	0.040*	0.024
Age	0.014	0.01	0.02	0.013	0.006	0.008	0.004	0.005
Age squared	0	0	0	0	0	0	0	0
Bad_health	-0.139***	0.048	-0.140***	0.043	-0.115***	0.041	-0.055**	0.025
EmployedFP	-0.076	0.051	-0.022	0.052	-0.01	0.042	-0.031	0.027
Self_employed	-0.143*	0.081	-0.117	0.073	-0.161**	0.072	-0.044	0.043
Education	0.047***	0.017	0.091***	0.015	0.032**	0.015	0.024***	0.009
Income	-0.008	0.011	0.002	0.011	-0.039***	0.009	-0.017***	0.006
Social class	-0.021	0.025	-0.054**	0.023	0.025	0.022	-0.006	0.014
Married	0.047	0.056	0.027	0.047	0.114**	0.046	0.034	0.028
Children	-0.007	0.017	-0.008	0.022	0.003	0.013	0.012	0.008
Country FE	Yes		Yes		Yes		Yes	
Survey-Wave FE	Yes		Yes		Yes		Yes	
r2	0.09		0.083		0.094		0.081	
rmse	2.425		2.115		2.003		1.41	
N	19511		19731		17409		23746	

Robust SEs; weighted by wave; country & wave FE included. * $p < .10$, ** $p < .05$, *** $p < .01$

Appendix

Table A1: Religiosity and market attitude (Independent Variable: Religiosity PCA, OLS)

	(M1a) Income equality		(M1b) People responsible		(M1c) Private ownership		(M1d) Competition is good		(M1e) Wealth accumulation	
	b	se	b	se	b	se	b	se	b	se
Religiosity PCA	-0.006	0.024	0.106***	0.024	0.018	0.025	0.167***	0.03	0.039	0.034
Female	0.05	0.052	-0.058	0.051	0.189***	0.054	-0.099*	0.059	0.026	0.072
Age	-0.028**	0.013	0.013	0.013	0.005	0.012	0.031**	0.013	0.014	0.017
Age squared	0.000**	0	0	0	0	0	-0.000*	0	0	0
Bad_health	0.006	0.053	0.200***	0.049	0.265***	0.053	-0.129**	0.063	-0.03	0.079
EmployedFP	0.034	0.061	-0.198***	0.061	0.004	0.06	-0.151**	0.067	-0.008	0.084
Self_employed	0.005	0.086	-0.189**	0.081	-0.246***	0.089	-0.13	0.099	0.012	0.124
Education	0.151***	0.02	-0.062***	0.019	-0.097***	0.021	0.132***	0.022	-0.009	0.028
Income	0.070***	0.014	-0.084***	0.014	-0.042***	0.014	-0.053***	0.017	0.039*	0.022
Social class	0.02	0.029	-0.072**	0.028	-0.100***	0.029	0.077**	0.036	-0.02	0.043
Married	0.157**	0.066	0.075	0.061	0.126*	0.067	0.083	0.076	0.103	0.092
Children	0.044**	0.021	-0.02	0.023	0.015	0.02	-0.026	0.022	0.005	0.031
Country FE	Yes		Yes		Yes		Yes		Yes	
Survey-Wave FE	Yes		Yes		Yes		Yes		Yes	
r2	0.125		0.096		0.054		0.065		0.097	
rmse	2.713		2.596		2.738		2.266		2.809	
N	17286		17471		17042		9318		9206	

Robust SEs; weighted by wave; country & wave FE included. * $p < .10$, ** $p < .05$, *** $p < .01$

Table A2: Religiosity and attitude towards hard work (Independent Variable: Religiosity PCA)

	(M2a) Work important		(M2b) Hard work brings success		(M2c) Humiliating to live on money w/o work		(M2d) Work is duty toward society		(M2e) Work comes first	
	b	se	b	se	b	se	b	se	b	se
Religiosity PCA	0.083***	0.006	-0.210***	0.033	0.141***	0.037	0.067***	0.023	0.047*	0.024
Female	-0.202***	0.012	0.175***	0.066	-0.043	0.057	-0.083**	0.036	-0.067*	0.039
Age	0.005*	0.003	-0.004	0.016	-0.009	0.011	0.003	0.007	0.001	0.008
Age squared	-0.000**	0	0	0	0	0	0	0	0	0
Bad_health	-0.034***	0.013	-0.072	0.068	0.102**	0.051	-0.017	0.034	0.006	0.037
EmployedFP	0.286***	0.012	0.092	0.075	0.053	0.062	0.005	0.039	0.055	0.041
Self_employed	0.244***	0.015	0.277**	0.112	0.194	0.17	-0.133	0.142	0	0.143
Education	0.032***	0.004	-0.044*	0.025	0.076***	0.019	0.030**	0.013	0.023*	0.014
Income	0.000	0.003	0.011	0.02	0.011	0.015	-0.006	0.01	0.015	0.01
Social class	-0.036***	0.007	-0.121***	0.04	-0.033	0.031	-0.001	0.02	-0.042**	0.021
Married	-0.023	0.016	-0.150*	0.085	0.004	0.06	0.005	0.041	0.090**	0.041
Children	-0.006	0.004	0.02	0.027	-0.019	0.019	-0.005	0.012	-0.019	0.012
Country FE	Yes		Yes		Yes		Yes		Yes	
Survey-Wave FE	Yes		Yes		Yes		Yes		Yes	
r2	0.151		0.084		0.03		0.029		0.038	
rmse	0.649		2.559		1.023		0.66		0.706	
N	17564		9409		2349		2352		2353	

Robust SEs; weighted by wave; country & wave FE included. * $p < .10$, ** $p < .05$, *** $p < .01$

Table A3: Religiosity and attitude towards illegal activities (Independent Variable: Religiosity PCA)

	(M3a) (Not) Claiming benefits		(M3b) (Not) Avoiding fare		(M3c) (Not) Cheating tax		(M3d) (Not) Accepting bribe	
	b	se	b	se	b	se	b	se
Religiosity PCA	0.061**	0.025	0.128***	0.025	0.122***	0.024	0.092***	0.016
Female	-0.05	0.049	0.089*	0.047	0.180***	0.044	0.033	0.028
Age	0.025**	0.011	0.031*	0.017	0.008	0.009	0.006	0.005
Age squared	0	0	0	0	0	0	0	0
Bad_health	-0.171***	0.05	-0.116**	0.046	-0.095**	0.045	-0.009	0.026
EmployedFP	-0.113**	0.055	-0.046	0.063	0.033	0.048	-0.025	0.03
Self_employed	-0.083	0.086	-0.092	0.082	-0.079	0.081	0.003	0.044
Education	0.049***	0.018	0.080***	0.017	0.034**	0.016	0.022**	0.01
Income	-0.025**	0.012	0.002	0.014	-0.037***	0.011	-0.006	0.007
Social class	0.015	0.028	-0.028	0.027	0.026	0.025	-0.006	0.016
Married	0.017	0.06	-0.001	0.055	0.111**	0.054	0.057*	0.032
Children	-0.012	0.019	-0.02	0.03	-0.006	0.015	0.004	0.009
Country FE	Yes		Yes		Yes		Yes	
Survey-Wave FE	Yes		Yes		Yes		Yes	
r2	0.09		0.083		0.094		0.081	
rmse	2.425		2.115		2.003		1.41	
N	19511		19731		17409		23746	

Robust SEs; weighted by wave; country & wave FE included. * $p < .10$, ** $p < .05$, *** $p < .01$

Table A4: Religiosity and market attitude (Independent Variable: Religiosity index, Ordered Logit)

	(M1a) Income equality		(M1b) People responsible		(M1c) Private ownership		(M1d) Competition is good		(M1e) Wealth accumulation	
	b	se	b	se	b	se	b	se	b	se
Religiosity index	1.027**	0.014	1.087***	0.015	1.028**	0.014	1.192***	0.022	1.058***	0.018
Female	1.038	0.031	1.009	0.03	1.160***	0.035	0.942	0.036	1.052	0.04
Age	0.981***	0.007	1.003	0.007	0.996	0.006	1.015	0.009	1.004	0.009
Age squared	1.000***	0	1	0	1	0	1	0	1	0
Bad_health	0.926**	0.03	1.106***	0.034	1.136***	0.035	0.901**	0.039	1.072	0.046
EmployedFP	1.03	0.036	0.897***	0.031	1.075**	0.036	0.889**	0.041	0.969	0.044
Self_employed	0.959	0.048	0.900**	0.044	0.891**	0.045	0.853**	0.056	1.003	0.066
Education	1.056***	0.012	0.987	0.011	0.964***	0.011	1.114***	0.017	1.007	0.015
Income	1.059***	0.009	0.920***	0.007	0.981**	0.008	0.959***	0.011	0.996	0.012
Social class	1.058***	0.018	0.954***	0.016	0.931***	0.016	1.088***	0.026	0.992	0.023
Married	0.955	0.037	1.077**	0.04	1.056	0.04	1.002	0.05	1.102**	0.053
Children	1.062***	0.013	0.988	0.012	1.016	0.011	0.992	0.016	1.006	0.016
Country FE	Yes		Yes		Yes		Yes		Yes	
Survey-Wave FE	Yes		Yes		Yes		Yes		Yes	
ll	-49936		-47907		-50705		-26178		-30530	
chi2	2425.83		2315.01		1023.86		793.819		1034.02	
N	23313		23573		22951		14758		14159	

Odds ratios reported; Robust SEs; weighted by wave; country & wave FE included. * $p < .10$, ** $p < .05$, *** $p < .01$

Table A5: Religiosity and attitude towards hard work (Independent Variable: Religiosity index, Ordered Logit)

	(M2a) Work important		(M2b) Hard work brings success		(M2c) Humiliating to live on money w/o work		(M2d) Work is duty toward society		(M2e) Work comes first	
	b	se	b	se	b	se	b	se	b	se
Religiosity index	1.408***	0.026	0.822***	0.014	1.200***	0.052	1.162***	0.056	1.164***	0.053
Female	0.447***	0.018	1.135***	0.044	0.840**	0.067	0.676***	0.056	0.650***	0.052
Age	1.030***	0.009	0.991	0.009	0.997	0.017	1.001	0.019	1.007	0.019
Age squared	1.000***	0	1	0	1	0	1	0	1	0
Bad_health	0.862***	0.038	0.979	0.041	1.203**	0.104	1.026	0.097	1.042	0.096
EmployedFP	2.966***	0.141	1.172***	0.054	1.035	0.104	1.03	0.114	1.021	0.107
Self_employed	2.472***	0.211	1.297***	0.085	1.331	0.312	0.953	0.23	0.994	0.238
Education	1.118***	0.018	0.956***	0.015	1.092***	0.034	1.097***	0.037	1.038	0.034
Income	0.992	0.009	1.013	0.012	1.033	0.021	0.973	0.021	0.984	0.02
Social class	0.898***	0.021	0.903***	0.021	0.969	0.045	1.037	0.051	1	0.049
Married	0.929	0.046	0.99	0.05	0.956	0.091	1.047	0.107	1.139	0.112
Children	0.975*	0.014	1.006	0.016	0.947*	0.029	0.956	0.03	0.942**	0.028
Country FE	Yes		Yes		Yes		Yes		Yes	
Survey-Wave FE	Yes		Yes		Yes		Yes		Yes	
ll	-15858		-27113		-4399.1		-3058.3		-3460.7	
chi2	2904.3		1046.35		158.343		80.698		124.808	
N	23726		14490		3784		3780		3786	

Odds ratios reported; Robust SEs; weighted by wave; country & wave FE included. * $p < .10$, ** $p < .05$, *** $p < .01$

Table A6: Religiosity and attitude towards illegal activities (Independent Variable: Religiosity index, Ordered Logit)

	(M3a) (Not) Claiming benefits		(M3b) (Not) Avoiding fare		(M3c) (Not) Cheating tax		(M3d) (Not) Accepting bribe	
	b	se	b	se	b	se	b	se
Religiosity index	1.124***	0.018	1.157***	0.019	1.169***	0.021	1.218***	0.023
Female	0.967	0.035	1.069*	0.041	1.118***	0.046	1.061	0.047
Age	1.015*	0.009	1.017	0.011	1.005	0.009	1.009	0.01
Age squared	1	0	1	0	1	0	1	0
Bad_health	0.871***	0.033	0.835***	0.034	0.829***	0.036	0.850***	0.04
EmployedFP	0.922*	0.039	0.98	0.046	0.954	0.044	0.914*	0.046
Self_employed	0.880**	0.055	0.933	0.062	0.856**	0.059	0.946	0.071
Education	1.048***	0.015	1.117***	0.017	1.048***	0.017	1.090***	0.019
Income	0.981**	0.009	0.985	0.011	0.942***	0.01	0.959***	0.01
Social class	1.005	0.021	0.979	0.022	1.042*	0.024	1.014	0.026
Married	1.032	0.047	1.02	0.048	1.077	0.056	1.003	0.055
Children	0.991	0.015	1	0.019	1.025	0.016	1.048***	0.017
Country FE	Yes		Yes		Yes		Yes	
Survey-Wave FE	Yes		Yes		Yes		Yes	
ll	-28945		-25092		-20673		-17424	
chi2	2013.5		1761.63		1946.31		2137.45	
N	19511		19731		17409		23746	

Odds ratios reported; Robust SEs; weighted by wave; country & wave FE included. * $p < .10$, ** $p < .05$, *** $p < .01$