Is Religion a Determinant of Financial Development?

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Abstract Studies on the determinants of financial development have been silent on the role of religion. Growing evidence in the literature about how financial development positively affects economic growth and development highlights a greater interest in understanding the determinants of financial development. Despite the growing interest in this direction, less focus has been given to the role of religion in financial development. Using data from the World Values Survey, this study explores the relationship between finance and religion. In this study, finance is modelled through different measures of financial development and religion is represented by the intensity of religiosity. Results showed that on average there is a significant negative relationship. Subsequent analysis showed that as countries become financially developed, this negative relationship becomes insignificant. The quantile regression technique was employed to capture the nature of the relationship at different levels. The analysis showed that as countries become financially developed, the negative relationship becomes insignificant to financial development. These results account for some of the differences in the level of financial development between developed and developing countries where the latter tend to be more religious than the former.

Keywords Financial development · religion · quantile regression · development

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Introduction

Economists generally agree that *financial development* is positively correlated with growth and economic development (King & Levine, 1993; Beck & Levine, 2002; Cheng et al., 2021; Asteriou & Spanos, 2019; Beck et al., 2006; Kagochi et al., 2013; Adeniyi et al., 2015). Furthermore, evidence suggests that informal factors, such as institutions and culture, affect the development of the financial sector (La Porta et al., 1997; Beck et al., 2001; Guiso et al., 2006; Acemoglu & Robinson, 2012; Dutta & Mukherjee, 2012; Arosa et al., 2014; Antonczyk & Salzmann, 2014; Aggarwal & Goodell, 2014; Beyers, 2017). Following this line of thought, this study assesses the influence of *religion* on *financial development*.

A number of Weber-like studies correlate *religion* positively with economic growth. Yet, the results of research on the nature of the relationship between *religion* and economic development were in many cases inconclusive (Blum & Dudley, 2001; Barro & McCleary, 2003). Other papers identified the negative impact of *religion* on economic performance, i.e., related *religion* to fundamental institutions (Clague et al., 2001; Baxamusa & Jalal, 2014) or attitudes that have been found to negatively affect growth (Guiso et al., 2003; Autiero & Vinci, 2016; Wang & Lin, 2014). This study attempts to add to the latter approach and fill a gap in the literature regarding the relationship between *religion* and *financial development*. The purpose of this research is to assess interdependencies between *religion* and *financial development*. This paper adds to the existing literature by providing empirical evidence that *religion* and *financial development* are related, but the impact of *religion* depends on the level of economic development.

Literature Review

Economics is a science that studies human behavior (Coase, 1998). Therefore, *religion*, which captures the element of societal embeddedness of economic actors (Williamson, 1998), can be considered a determinant of economic development. Incorporation of *religion* in the *financial development* discourse relates to the transaction costs theory. Contracts and their effectiveness depend on formal rules, completed with informal ethical and behavioral norms (Williamson, 1998; Aggarwal & Goodell, 2014). *Religion* in turn affects both the creation and execution of informal rules in a society. For that reason, *religion* may affect transaction costs both inside the economic system and in transsystemic trade. Wang and Esqueda (2014) found that cultural characteristics can explain economic decisions, such as borrowing and the tendency to increase one's debt. *Religion* as a source of norms and behaviors is expected to produce corresponding effects. For instance, Baxamusa and Jalal (2014) used division between the Protestant and Catholic religions to explain why firms have substantially different leverage and why some firms issue debt more frequently than others. Clague et al. (2001) studied the relationship between *religion* and democracy finding a negative impact of

Islam on democracy. In theory, the likelihood of opportunistic behavior of agents increases potential transaction costs. Depending on how *religion* affects attitudes, it may produce either positive or negative effects.

La Porta et al. (1997) suggested that the level of trust in religious countries tends to be lower than in non-religious countries or among atheists. Since trust is considered to reduce transaction costs and stimulate cooperation between agents, this argument may suggest a negative impact of *religion* on financial market development. However, Guiso et al. (2003) found that religious beliefs were associated with economic attitudes conducive to growth. Their results implied that religious people are thought to believe more in the fairness of the market. Based on Barro and McCleary (2003), strong religious beliefs stimulate growth because they help sustain specific individual behaviors that enhance productivity.¹ Given the inconsistency in existing research, the current study attempts to examine the claim that *religion* can foster development of new (financial) markets and services, and increase the importance of financial intermediaries, especially in low- and middle-income countries. That the effect of participation in religious services on income levels was not significant (Sequeira et al., 2017) may be explained by the decreasing effect of *religion* on *financial development* in high-income countries. Barro and McCleary (2003) identified a negative effect of church attendance and a positive effect of belief in hell and heaven on economic growth.

Religion is a multivariate concept by nature, so a range of variables is required to evaluate it. Due to the complexity of *religion*, the term must be decomposed. The literature provides a decomposition into three variables. First, Weber's (2013) concept of *religion* is captured as a source of ethics and recognition of values (i.e., Protestant work ethics)² which is approximated by the importance of *religion* in one's life. The second variable, recognized by social capital theory and popularized by Durkheim and Swain (2008), suggests that *religion* is not separable from church. In this sense, *religion* unites adherents in a single moral community and can be measured by church attendance (Barro & McCleary, 2003; McCleary & Barro, 2006).³ Church attendance stands as a proxy for the influence of organized *religion* on laws and regulations which influence economic behaviors.⁴ Secularization

¹ Henrich et al. (2010) explained that norms arise because humans use evolved learning mechanisms to calibrate their behavior, motivation and beliefs to variable circumstances applied to different kinds of social interactions. Individually costly behaviors can be sustained by punishment, signaling, and reputational mechanisms which may be based on religion and be imposed by religious organizations. By sustaining certain behaviors, norms can facilitate trust, fairness, or cooperation in an array of diverse interactions, thereby allowing the most productive comportment and use of resources.

² Weberian analysis emphasized that religious beliefs, by shaping specific values and traits such as honesty, work ethic and thrift, may favor work effort, wealth accumulation and ultimately economic success (Weber, 2013).

³ Barro and McCleary (2003) called these variables inputs (church attendance) and outputs (beliefs) of the religion sector. For given beliefs, higher church attendance signifies more resources used by the religion sector.

⁴ Autiero and Vinci (2016) claimed that religion may play an important role in human and capital accumulation, as it can directly affect education by transmitting values that foster educational achievements. They considered the twofold aspect of religion, which may be either a progressive force that promotes education, or present a conservative dimension opposing the diffusion and rise of human capital. Not only by increasing financial literacy, but also general attitudes, religion via human capital development can be a determinant of financial market development. Further, based on Finke and Iannaccone (1993), government regulation and subsidies influence competition among religion providers and thereby affect the nature of religious products in the market.

of economies over time leads to a lesser role of organized *religion* in political and economic decision making (Weber, 2013). Finally, the third variable is religiousness, or the extent to which people consider themselves religious. Provided that the normative dimension of particular *religions* may have different impacts, this study tested the significance of religious denomination on *financial development*, which may implicate different attitudes towards market institutions among Catholics, Protestants, Muslims, Buddhists, and others (Guiso et al., 2003; Facchini, 2010; Wang & Lin, 2014). *Religion* is considered here as an exogenous factor of culture and attitudes. Though culture is flexible and always evolving, the norms of *religion* are given and their elasticity is limited in time. If one seeks channels that link *financial development* and *religion*, then church attendance would suggest a more institutional impact of church and *religion* on the macro environment. The importance of *religion* reflects respect for religious normative systems, while religiousness reflects attitudes of compliance with these norms.

Data Description & Methodology

Religion was the main explanatory variable. Data for *religion* were taken from Waves 5 and 6 of the World Values Survey (WVS) database (Inglehart et al., 2018a, 2018b). The database is known to be reliable and has universal acceptability (La Porta et al., 1997; Guiso et al., 2003). The WVS is an international research platform that provides global data on human beliefs and values. The data are comparative, cross-sectional, and collected in five-year intervals. The data are representative including 94.5% of the world population (World Values Survey, 2019). The use of a multi-stage sampling design which involves a stratified probability sampling technique ensures that all members of the population have an equal chance of being selected, an important characteristic for a robust data collection process (Firth & Bennett, 1998). More importantly, the database provides detailed information for many countries on religious beliefs, values and how they motivate individual decision making regarding a wide range of day-to-day engagement within the community. Hence, this data set may be used in research that seeks to gain a deeper understanding of how individual decisions affect the economy. WVS information on values, beliefs and attitudes towards *religion* were employed, following other studies (Zemo & Nigus, 2021; Bolcan, 2020; Ngamaba & Soni, 2018; Lee et al., 2018). An index was created for 72 countries based on waves from 2005–2014 by identifying variables in the database related to the religiosity level of the country.⁵

The dependent variable in the study was *financial development*, which measures the level of financialisation in the economy and the degree of development in the financial system. This includes the depth of *financial development* capturing the size of the financial sector for both financial institutions and financial markets. *Financial development* also captures the extent of the

⁵ The following variables from the WVS were used: how religious the person is; how important religion is to that person; and how often the person attends religious activities. An index variable was created using principal component analysis.

services provided by financial institutions and markets, and engagement with these services (Cihak et al., 2012). Data on *financial development* were taken from the World Bank's Financial Development and Structure Dataset (World Bank, 2017).

The primary indicator used in the study was private credit as a percentage of gross domestic product (*GDP*) (World Bank, 2018) because it provides a measure of the depth of the financial system. The private credit by deposit money banks and other institutions variable was used as an alternative measure for *financial development*, providing broader coverage, especially for less-developed countries where alternatives to banks' capital sources may be more important than in high-income countries. The liquid liability indicator was used as a measure of *financial development* for a robustness check. To capture the role of the financial market in financial system development, stock market capitalisation was employed to measure *financial development*.

Other indicators from the literature that were relevant to the determination of *financial development* included *GDP*, *inflation*, *institutions*, *legal origin*, and *trade*. These variables were included as controls, motivated by their inclusion in similar studies on determinants of *financial development* (Huang, 2011). *GDP* captured the level of economic activity. Substantial economic activity will grow the financial environment as most of these activities require support from the financial environment in terms of raising funds, either through financial institutions or financial markets, for start-ups, expansions, innovation and management of external or internal business shocks. This variable was taken from the World Development Indicators (WDI) (World Bank, 2018). For *inflation*, the inflation rate variable from the WDI was employed. When very stable, *inflation* will promote smooth transactions as there is clarity to make investments and financial decisions. This would increase demand for the services of the financial system. POLITY2 was the indicator of *institution* (Marshall et al., 2013). This variable is an index of democracy that ranges from -10 to 10 where 10 is a stronger democratic environment. This index reflects how the legal environment is devoid of external and illegal influences. A stronger democratic environment creates a good business environment as transactions are perceived to be secure. Any contractual issues can be resolved through enforcement of laws. This will influence *financial development* positively. *Legal origin* data were from La Porta et al. (1997). *Legal origin* influences how countries set up their financial environment. Trade was measured by *trade openness*. For countries to engage in trade, especially in sectors that require financial support to permit participation in exporting, a strong financial sector is required (Manova, 2008). This will positively influence the financial environment. Trade data were from the WDI database (World Bank, 2018).

Following Dutta and Mukherjee (2012),⁶ the following cross-country model was estimated to capture the relationship between *financial development* and *religion*:

$$FD_j = \beta_0 + \beta_1 religion_j + \beta_2 Controls_j + \epsilon_j, \quad (1)$$

where *FD* is *financial development* at the country level, *religion* is the key independent variable, *Controls* represent all the other determinants of *financial development* and ϵ is the error term. Ordinary least squares and quantile regression were used to test Eq. (1). Quantile regression provides a robust approach to dealing with outliers through the use of the median instead of the mean (Cameron & Trivedi, 2010). In addition, it provides a detailed and complete picture about the relationship between *financial development* and *religion* at different points in time.

Table 1 presents the correlation coefficients between the main independent variable, *religion*, and the different dependent variables used in the subsequent estimation model. This highlights the relationship between *financial development* and *religion*.

There is a negative relationship between all four variables used as measures of *financial development* and *religion* (Table 1, rows 2-5). These relationships are statistically significant ($p < 0.01$) as indicated by the asterisks. These results indicate that higher levels of religiosity lead to a decrease in *financial development*. *PrivateCredit/GDP*, *LiquidLiability*, *PrivateCredit/GDPall* and *StockMarketCap* were used as different proxies for the measure of *financial development*. The high correlation among these variables confirms their suitability as indicators for *financial development*. *PrivateCredit/GDP* is used in the first regression as the dependent variable. The robustness of *PrivateCredit/GDP* as a good dependent variable is confirmed by using the other three variables (*LiquidLiability*, *PrivateCredit/GDPall* and *StockMarketCap*) as proxies for the dependent variables in the results in Table 2.

The results from Table 1 also show a positive relationship among the *financial development* variables, confirming their robustness in the estimation of the baseline model and quantile regression. Table 2 presents summary statistics for the variables used in the estimation.

Results and Discussion

There is a significant ($p < 0.01$) negative relationship between *financial development* and *religion* for the different indicators of *financial development* (Table 3). Table 3 column 2 estimates the model without the controls. A significant ($p < 0.01$) negative coefficient of 0.976 was obtained. The other columns include controls that were added to confirm the robustness of the estimated model in Table 3 column 2. Results remained significant ($p < 0.1$) and negative for *religion* in all cases where different indicators of *financial development* were used in the estimation (Table 3, columns

⁶ Dutta and Mukherjee (2012) focused on how culture can influence the level of financial development. The use of culture is related to the current study as it is also an indicator that has links to an individual's behavior. However, the current study focuses on religion to provide a stronger evaluation of values and belief systems (Bonney, 2004; Beyers, 2017).

Table 1 Correlation coefficients between dependent variables and *religion*: Country-level analysis

Variables	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)
(1) <i>Religion</i>	1.00									
(2) <i>LiquidLiability</i>	-0.35***	1.00								
(3) <i>PrivateCredit/GDP</i>	-0.48***	0.84***	1.00							
(4) <i>PrivateCredit/GDPall</i>	-0.48***	0.81***	0.94**	1.00						
(5) <i>StockMarketCap</i>	-0.07***	0.33***	0.44**	0.50*	1.00					
(6) <i>GDP</i>	-0.23*	0.27***	0.26***	0.45***	0.12***	1.00				
(7) <i>Trade</i>	-0.09*	0.16*	0.17**	0.10*	0.20**	-0.38*	1.00			
(8) <i>Inflation</i>	-0.43**	0.38*	0.50*	0.53*	0.23*	0.19*	0.01	1.00		
(9) <i>Institution</i>	-0.36*	0.24**	0.35***	0.38***	0.06**	0.21**	-0.11*	0.51*	1.00	
(10) <i>Legal Origin</i>	0.17*	0.11*	0.14*	0.19***	0.30*	0.15*	0.07*	0.10*	0.22*	1.00

Notes: *** p<0.01, ** p<0.05, * p<0.1. Data span 1970-2014 with an average of 2,406 observations. The four *financial development* indicators are identified in rows (2)-(5). Source: Authors' computations based on data from World Bank (2018), World Values Survey (2019), POLITY2 (Marshall et al., 2013) and La Porta et al. (1997)

Table 2 Summary statistics: Country-level analysis

Variable	Obs	Mean	Median	Std. Dev.	Min	Interquartile range	Max
<i>Religion</i>	2,608	4.40	3.89	1.31	1.42	0.98	4.63
<i>LiquidLiability</i>	2,610	50.05	40.59	32.37	12.35	39.64	173.27
<i>PrivateCredit/GDP</i>	2,629	41.03	29.52	29.67	4.71	43.85	135.87
<i>PrivateCredit/GDPall</i>	2,629	45.13	41.87	33.36	4.71	51.23	153.67
<i>StockMarketCap</i>	2,309	3.42	3.18	1.10	0.35	3.80	5.10
<i>GDP</i>	2,648	11.91	10.05	1.65	8.79	8.22	16.07
<i>Trade</i>	2,608	4.05	3.67	0.52	2.96	1.01	5.84
<i>Inflation</i>	2,648	10.04	11.12	0.49	-2.21	9.40	39.99
<i>Institution</i>	2,622	2.08	5.00	7.43	-10.00	2.00	10.00
<i>Legal origin</i>	2,648	0.26	1.2	0.44	1.00	1.11	5.00

Notes: Data span 1970–2014 with an average of 2,406 observations. Source: Authors' computations based on data from World Bank (2018), World Values Survey (2019), POLITY2 (Marshall et al., 2013) and La Porta et al. (1997)

Table 3 Religion as a determinant of financial development: Country-level analysis

VARIABLES	<i>PrivateCredit/ GDP</i>	<i>Private Credit/GDP</i>	<i>Private Credit/GDPall</i>	<i>LiquidLiability</i>	<i>StockMarketCap</i>
<i>Religion</i>	-9.76*** (1.89)	-6.87*** (2.02)	-6.36*** (2.29)	-4.97** (2.31)	-6.78* (3.82)
<i>GDP</i>		4.39** (1.84)	5.98*** (2.06)	3.45* (2.01)	15.60*** (3.64)
<i>Trade</i>		17.04*** (5.90)	14.12** (6.93)	14.79* (8.39)	-5.62 (17.44)
<i>Inflation</i>		6.51 (8.31)	10.70 (9.79)	7.50 (9.71)	-23.87 (17.74)
<i>Institution</i>		0.185 (0.53)	0.102 (0.54)	-0.268 (0.57)	-1.842 (1.77)
<i>Legal origin</i>		Yes	Yes	Yes	Yes
<i>Constant</i>		94.82*** (11.67)	-29.62 (41.42)	-15.08 (45.96)	-3.62 (2.44)
Observations	66	64	64	63	55
R ²	0.27	0.67	0.67	0.51	0.42
RESET test (p-value)		0.36	0.23	0.74	0.51
VIF (<10)		3.68	3.68	3.70	1.97
Linktest(_hatsq- P-value)		0.546	0.255	0.78	0.18

Notes: Robust standard errors in parentheses. *** p<0.01, ** p<0.05, * p<0.1. Data span 1970–2014. The indicators for financial development used in each column are displayed in the column headers of the table. Source: Authors' computations based on data from World Bank (2018), World Values Survey (2019), POLITY2 (Marshall et al., 2013) and La Porta et al. (1997)

3-6). This includes indicators for financial institutions and markets. The increase in religiosity had an inverse effect on the level of *financial development*, supporting the general *religion*-financial sector nexus noted by Klein et al. (2017).

This result indicates a low level of commitment to work, which is incongruent with what is expected to happen in an environment with a high level of religiosity (Guiso et al., 2003; Autiero & Vinci, 2016; AlAwadhi, 2021). The model estimation robustness was checked using three model specification tests. First, the Ramsey regression specification-error test (RESET) was implemented. All the p-values were above the 5 percent level of significance indicating that there were no omitted variable issues in the estimated model. Second, multicollinearity tests were run through the variance inflation factor (VIF). A VIF of less than 10 indicates no multicollinearity. Third, the linktest command was used to examine the model for specification error. The p-values from all the estimations rejected the hypothesis of a problem with the functional form of the conditional mean of this model (Cameron & Trivedi, 2010).

The expectation of a highly religious environment is that it will be driven by high self-commitment given the strong morals required by the religion. This should translate into a high work ethic as the perception of work as a divine calling is expected to be an imperative in such societies (Emmons, 2003; Wrzesniewski et al., 1997; McCullough & Willoughby, 2009; Mahoney et al., 2005). Yet, this outcome is not reflected in the current study's results. This may be attributed to the divergence between Christian goals and goals in the workplace. The impact of secularization deviating from values upheld by religions could drain individual commitment to work (Becker et al., 2021), corroborated by Mersland et al. (2013). They focused on the microfinance industry and showed how Christian microfinance institutions underperform in a secular setting in the case of financial profit indicators (Mersland et al., 2013).

On the demand side, Mersland et al. (2013) showed Christian values provide some commitment to honor loan repayments. In relation to the supply-side focus of the *financial development* indicators used in the study, the negative relationship between private credit to GDP and religiosity means a low level of outreach and engagement with financial services (Burzynska & Berggren, 2015). This disengagement could reflect a drop in general trust, hence the negative effect. This erosion of trust will enhance the asymmetric information problems and negatively affect the financial environment.

Quantile regression was employed to test model robustness, providing insight into the possibility of a non-linear relationship between *financial development* and *religion*. Due to the sensitivity of this relationship to secularization, it is necessary to test for non-linearity (Becker et al., 2021). The limited literature in this area of study mostly used ordinary least squares and the instrumental variables techniques. While these estimates can explain the effect of the various independent variables (e.g., culture, institutions) on *financial development*, they fail to provide information on the effect of variations in the level of the dependent variable (*financial development*). Also, these approaches do not engage the full range of data through the conditional mean estimates produced based on the dependent variable used (Altunbaş & Thornton, 2019). These mean-based models have been found to be overly sensitive

Table 4 *Financial development and religion: Quantile regression (100%), Country-level analysis*

VARIABLES	<i>Private Credit/GDP</i>	<i>Private Credit/GDP</i>	<i>Private Credit/GDPall</i>	<i>LiquidLiability</i>	<i>StockMarketCap</i>
<i>Religion</i>	-4.42*** (1.48)	-5.84*** (1.58)	-5.00** (1.95)	-4.59*** (1.14)	-0.27* (0.13)
<i>GDP</i>		2.99* (1.54)	6.67*** (1.79)	4.94*** (1.28)	0.36** (0.17)
<i>Trade</i>		15.92*** (5.49)	18.92** (7.22)	19.58*** (4.02)	0.35 (0.33)
<i>Inflation</i>		7.37 (7.03)	11.08* (6.58)	-2.08 (7.48)	-0.567 (0.47)
<i>Institution</i>		0.59 (0.47)	0.45 (0.47)	-0.12 (0.31)	0.01 (0.04)
<i>Legal origin</i>	Yes	Yes	Yes	Yes	Yes
<i>Constant</i>	-97.72*** (32.28)	-71.88* (39.72)	-109.57** (45.90)	-100.469*** (26.41)	-2.46 (3.01)
Pseudo R ²	0.37	0.46	0.45	0.38	0.37
Observations	64	64	64	63	56

Notes: Robust standard errors in parentheses. *** $p < 0.01$, ** $p < 0.05$, * $p < 0.1$. Data span 1970–2014. The indicators for *financial development* used in each column are displayed in the column headers of the table. Source: Authors' computations based on data from World Bank (2018), World Values Survey (2019), POLITY2 (Marshall et al., 2013) and La Porta et al. (1997).

to small changes in model set up. This includes changes to the type of data used to proxy the variables of interest (Cicccone & Jarociński, 2010). Henderson et al. (2013) showed how linear models are likely to yield incorrect estimates and hence inferences made from such estimates are misleading. They argued that variables can enter a model as linear, but this can change given that the variables interact with the sample and other variables.

This study used non-linear quantile regression which helps to address the issue of how high and low levels of religiosity in different countries affect *financial development*. Table 4 confirms the earlier result of a substantially negative relationship between *religion* and *financial development*. Furthermore, different phases of the relationship between *religion* and *financial development* were investigated given the possibility of a nonlinear relationship. The outcome indicated a significant ($p < 0.05$) negative relationship at the lower quantile (25%) (Table 5) and the median quantile (50%) (Table 6). At higher quantiles (75%) (Table 7), the relationship becomes insignificant. These results suggest that as countries become highly financially developed, the negative effects of *religion* become insignificant. The role of *religion* in the development of the financial sector is substantially less. A similar result was observed by Aghion et al. (2005) whose research indicated a non-linear relationship between finance and economic growth. Their results showed that the depth of the relationship was different, indicating a threshold effect.

Table 5 *Financial development and religion: Quantile regression (median-25%), Country-level analysis*

	<i>PrivateCredit</i>	<i>PrivateCredit all</i>	<i>LiquidLiability</i>	<i>StockMarketCap</i>
<i>Religion</i>	-8.237*** (1.393)	-8.099*** (1.835)	-2.509 (1.910)	-0.251*** (0.069)
<i>Constant</i>	-32.40 (29.92)	-151.61*** (28.34)	-62.49* (35.21)	-5.74*** (1.91)
Controls	<i>Legal origin, GDP, Trade, Inflation, Institution</i>			
Pseudo r^2	0.39	0.38	0.28	0.44
Observations	67	67	66	60

Notes: Robust standard errors in parentheses. *** $p < 0.01$, * $p < 0.1$. Data span 1970–2014. Source: Authors' computations based on data from World Bank (2018), World Values Survey (2019), POLITY2 (Marshall et al., 2013) and La Porta et al. (1997)

Table 6 *Financial development and religion: Quantile regression (median-50%), Country-level analysis*

	<i>PrivateCredit</i>	<i>PrivateCredit all</i>	<i>LiquidLiability</i>	<i>StockMarketCap</i>
<i>Religion2</i>	-3.511** (1.568)	-4.717** (2.070)	-4.210*** (1.444)	-0.169 (0.115)
<i>Constant</i>	-83.29*** (21.37)	-72.03* (41.73)	-116.74*** (38.40)	-2.21 (2.54)
Controls	<i>Legal origin, GDP, Trade, Inflation, Institution</i>			
Pseudo r^2	0.45	0.45	0.36	0.34
Observations	67	67	66	60

Notes: Robust standard errors in parentheses. *** $p < 0.01$, ** $p < 0.05$, * $p < 0.1$. Data span 1970–2014. Source: Authors' computations based on data from World Bank (2018), World Values Survey (2019), POLITY2 (Marshall et al., 2013) and La Porta et al. (1997)

Table 7 *Financial development and religion: Quantile regression (median-75%), Country-level analysis*

	<i>PrivateCredit</i>	<i>PrivateCredit all</i>	<i>LiquidLiability</i>	<i>StockMarketCap</i>
<i>Religion</i>	-3.574 (2.942)	-4.300 (3.685)	-2.980 (3.348)	-0.005 (0.144)
<i>Constant</i>	-51.32 (69.28)	-150.60** (71.19)	-36.92 (93.92)	-0.02 (3.54)
Controls	<i>Legal origin, GDP, Trade, Inflation, Institution</i>			
Pseudo r^2	0.53	0.51	0.43	0.28
Observations	64	64	63	57

Notes: Robust standard errors in parentheses. ** $p < 0.05$. Data span 1970–2014. Source: Authors' computations based on data from World Bank (2018), World Values Survey (2019), POLITY2 (Marshall et al., 2013) and La Porta et al. (1997)

Conclusion

While some countries follow the path of deepening secularization, the importance of *religion* in others is either rising or remaining strong. Beckford (2003) recognized that individual human beings are expected to exercise their autonomous judgement in choosing what to believe and how to implement their beliefs in practice, which often leads to the process of de-traditionalisation, especially in industrial societies. The crisis of democracy and liberal institutions calls for reflection on this phenomenon and its implications for the financial sector, which requires reevaluation in light of financial crises.

Recognition of *religion* as a driving force may stimulate different approaches towards economic systems, which either favor development mechanisms or hinder structural transformation (Patterson, 2014). It would be interesting to assess whether *religion*, once found in Weber's work to be at the core of cultural patterns stimulating economic behavior, is similarly influential today. However, this problem is more complex than a simple dichotomy of support or rejection. It seems plausible that rational inclusion of *religion* in political processes in certain regions of the world could in fact have a positive impact on development as it had on Protestant Europe in the past, according to Weber. This research suggests that religiousness does not contribute to the development of the financial sector at a certain stage of its development, but that does not hold true when the institutional framework is well established. This implies that the impact of *religion* on financial sector development may depend on the region, income, and development phase, which requires further investigation.

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