

Kashmir Economic Review ISSN(P): 1011-081X, ISSN(E): 2706-9516 http://www.ker.org.pk



Does Social Capital Surge between Religiosity and Subjective Well-being? A case study of Pakistan

ABSTRACT

This paper aims to examine the relationship between religiosity, social capital, and the subjective well-being of individuals in Pakistan. Subjective well-being can be observed in self-reported health, happiness, and life satisfaction. By using Partial Least Square Structural Equation Modeling (PLS-SEM) on the data for Pakistan, taken from the seventh wave of the World Value Survey (WVS-7), the results reveal that religion and social capital contribute to an individual's well-being. Subjective well-being increases for those who are more active in religious associations. Social capital has a significant positive impact on subjective well-being. Other factors such as health status, income, marital status, and education also influence the well-being of individuals in Pakistan.

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Keywords

Happiness, life satisfaction, Partial Least Square Structural Equation Modeling (PLS-SEM), religiosity, social capital, well-being **JEL Classification** I31, I38, Z12, Z13

Please cite this article as:

Banday, M. T., Majeed, M. T., & Luni, T. (2023). Does social capital surge between religiosity and subjective well-being? A case study of Pakistan. *Kashmir Economic Review*, 32(1), 19-35.

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Author's contribution in the article: 1- Conceived and designed the analysis, 2- Reviewed and compiled the literature, 3- Collected the data, 4- Contributed data or analysis tools, 5- Performed the analysis, 6- Wrote the paper, 7- Financial support for the conduct of the study, 8-Other

1. INTRODUCTION

Earlier studies on the economics of happiness and well-being focused on the relationship between income and well-being. It was supposed that high income is a determinant of improved well-being. The terms happiness and well-being are used interchangeably in literature. The Sachs et al. (2018) revealed that the happiest country in the world is Finland since 2016, followed by Denmark and Iceland. The top ten happiest nations were all figured to be among the highest-income nations having low unemployment and low-income inequalities. Income was considered the main source of happiness and the prime determinant of well-being. However, a person's well-being or happiness cannot be determined solely by his wealth or money. Stiglitz et al. (2009) described that besides money many other socio-economic factors have a strong impact on well-being and quality of life, these factors are the nature of jobs, leisure, health, quality of institutions, and social connections networks. All these factors are important. For instance, the United States, which is regarded as the world's richest nation, does not appear in the top 10 list of happy countries.

It is also propagated by Easterlin (1974, 1995), that the levels of well-being do not seem to increase with the increase in income, which is known as the "Easterlin Paradox". Stevenson and Wolfers (2008) analyzed data from various sources over the years and found that economic growth is surely related to well-being only in the short term. An individual with a higher level of income tends to report their higher well-being but this correlation weakens over a certain point and time this is also called diminishing marginal utility of income. Various factors contribute to the diminishing correlation between income and well-being such as health, satisfaction, social comparisons, and relationships.

Well-being can be categorized into objective and subjective dimensions. Objective well-being refers to the conditions of a person's life that contribute to his overall satisfaction related to income, employment, health, education, and access to basic services like housing, food, and water (Western & Tomaszewski, 2016). Thus, objective well-being can be measured through monetary variables (income and wealth). The other aspect of well-being is subjective well-being which refers to a person's own perception of their overall well-being, including their happiness, life satisfaction, and sense of purpose and meaning in life (Diener, 1984). Subjective well-being cannot be measured or compared directly across individuals and groups, but it is important because it reflects the individual experience of well-being and can provide insight into the factors that contribute to a person's overall sense of satisfaction and happiness (Diener et al., 1985). Many factors influence subjective well-being, such as money, a healthy diet, adequate sleep, and regular exercise. However, some other factors, such as lifestyle, the pattern of faith or beliefs and practices (religiosity), social connectedness, and support (social capital), have a more significant impact but have been acknowledged with limited attention in the literature on individual and societal well-being.

Religiosity is the level of religious devotion or commitment that an individual exhibits. It includes the intensity of one's beliefs, frequency of religious practice, and involvement in religious communities (Durkheim, 1972). Furthermore, religiosity can be analyzed through, belief in God, frequency of prayer or other religious practices, participation in religious ceremonies, and involvement in religious communities, such as attending religious events or volunteering for spiritual or religious organizations. Religiosity has a strong impact on individuals and society's well-being (Newman & Graham, 2018). It can lead to a variety of outcomes such as improving mental and physical well-being and providing opportunities to increase social connectedness (social capital).

Social capital is defined as the network of people who live and work in a society and enables that society to function effectively. Social capital refers to the networks, relationships, and social norms that facilitate cooperation and trust among individuals and groups (Coleman, 1988). Religion plays an important role in promoting social capital by forming bonds between individuals and creating shared values and beliefs. Some of the ways through which religion promotes social capital include religious institutions, shared moral

and ethical values, voluntary work, and support networks. Among religious institutions mosques, churches, and temples provide a space for individuals to come together and form relationships based on shared values and beliefs. These institutions often organize social events and activities, which can help individuals form new connections and build social capital. Religious teachings emphasize moral and ethical values such as honesty, kindness, and compassion. These shared values can help individuals build trust and cooperation, which are essential components of social capital. Religious institutions organize volunteer activities, such as free meal centers, hospitals, and charity events, which provide opportunities for individuals to serve their community and build social capital. Religious communities provide support networks for individuals and families experiencing difficulties. These networks can strengthen existing relationships and create new connections, which are both important for building social capital. Overall, religion can play a significant role in promoting social capital by creating opportunities for individuals to come together, form relationships, and build trust based on shared values and beliefs (Shapiro, 2022). People who have strong social connections tend to be happier and more satisfied with their lives. Furthermore, having close relationships with family and friends can increase positive emotions and reduce negative thoughts and feelings and thus contribute positively to individual subjective well-being.

There is a huge literature on religion and well-being and religion and social capital. None of the studies examined religiosity, social capital, and well-being altogether. The present study is unique in the sense that it is designed to analyze the impact of religiosity and social capital on the well-being of Pakistan. The direct and indirect effects of religiosity and social capital on well-being will be examined in the same model. It is the first attempt to capture these aspects together. Besides religiosity and social capital, other factors such as income, health status, marital status, and educational levels are also included in the analysis. The following hypotheses have been constructed:

- $H_{11:}$ There is a positive relationship between religiosity and well-being
- H_{21:} There is a positive relationship between religiosity and social capital.
- H_{31:} There is a positive relationship between social capital and well-being and
- $H_{41:}$ There is a positive impact of religiosity on well-being through social capital.

This paper is divided into four sections: in section 2 literature review is given; section 3 is based on data and methodology; section 4 offers a discussion of results and section 5 provides the conclusion.

2. LITERATURE REVIEW

Well-being is an important and well-researched topic. Well-being has two dimensions; one is subjective, and the other one is objective well-being. Subjective well-being incorporates 'happiness' and 'life satisfaction' where happiness is the current and unstable element, while life satisfaction is a stable and judging process that correlates with a long life (Diener, 1984; Krueger & Schkade, 2008). Life satisfaction is defined as the way people express their emotions and feelings and how they feel about their directions and options for the future (Anand, 2016). Money is not the only factor determining well-being, there are several factors including a person's natural temperament, his religious affiliations, social connections and relations, the communities they live in, and their capacity to solve their basic problems that influence subjective well-being.

2.1 Religion and well-being (SWB)

Literature suggests that religion may enhance various aspects of well-being in at least four ways through 1) social integration 2) the establishment of relations with others due to the practice of the same religion (for example; Divine interactions), 3) the provision of a system, 4) the promotion of more specific patterns of religious organization and personal lifestyle. Ellison (1991) claimed that religion has a dominant impact on the well-being of individuals. Religious practices and participation in religious activities have both direct

and indirect effects on well-being. While religious certainty has a positive, direct, and substantial effect on well-being. Individuals who have strong religious faith report higher satisfaction, happiness, and fewer psychological problems.

According to Kim-Prieto and Diener (2009), religion serves as a significant factor contributing to the diversity of emotional experiences among individuals across different countries. In their study, the authors surveyed students from 49 countries studying in the United States, representing five major religions: Christianity, Islam, Hinduism, Buddhism, and Judaism. The findings of the study revealed a significant association between religion and individuals' overall well-being. They concluded that religion has a strong positive and significant connection with well-being. Those who were highly religious were happier and more satisfied.

According to McCullough et al. (2002) and Ngamaba and Soni (2018), religious values and practices have been found to have positive effects on individual well-being. These studies suggest that religion fosters attitudes such as respect and love for interpersonal relationships, which contribute to individuals' experiences of pleasure and satisfaction. Religious values encourage the experience of certain positive and pleasant feelings or emotions. Gratitude and thankfulness are associated with the positive effects of following a particular faith. It also encourages prosocial behaviors, social capital, and spirituality. McCullough et al. (2002) and Metzl (2009) found that Protestant Christians have more positive effects of religion on their lives than Catholic Christians. The difference is due to their different worship style, community engagement, social and cultural interactions, and the influences of these interactions on their behaviors.

In another study, Metzl (2009) stated that in Hurricane Katrina it was found that the recovery of religious people was faster and acted more dignified than non-religious people. Geschwind *et al.* (2011) surveyed the population of the Buddhist religion and found a link between mediation and subjective well-being. Lutz et al. (2008) also analyzed that in the Buddhist religion, mediation shows a high religiosity level of individuals and has greater positive effect on neural activation in the brain and mental health. Sahraian et al. (2013) revealed that individuals with a more religious mindset experience more happiness in the Muslim community of Iran.

According to Rozer and Kraaykamp (2013), Buddhists and Christians had greater levels of well-being than non-religious people and followers of other religions. Ferriss (2002) conducted a comparative study of Protestants and Catholics and found that Protestants were happier than Catholics because of their religious practices. Faith or religion encourages good virtues like love, gratitude, caring behavior, and charitable actions. Ellison and Flannelly (2009) and Tovar-Murray (2011) claimed that religion discourages involvement in unhealthy behaviors. Religious people are happier, less depressed, and more willing to express gratitude than non-religious people.

Fisher et al. (2010) reported a deviation in the well-being of Muslims and Christians according to their religious teachings. Their findings suggest that Muslims seek more social support from family and Christians use more intrapersonal coping strategies. Tovar-Murray (2011) stated that religious behaviors promote spiritual beliefs, marital satisfaction, health, and happiness among Jewish, Protestant, and Roman Catholics. Religiosity promotes the ability to cope with hardships. Chatters et al. (1998) stated that religious beliefs help to decrease stress depression, and suicidal thoughts thus religion leads to better mental health.

Mochon et al. (2011) claimed that passionate believers benefit from their involvement, while those with weaker beliefs seem happy and less satisfied. Ellison and Flannelly (2009) conducted a study of African-American adults. The findings showed that religious involvement is negatively associated with depression

and stress. Inglehart et al. (1992) argued that faith acts as a medical institute, provides mental peace, and offers social connections through religious attendance.

Tewari et al. (2012) stated that Hindus' participation in a long-time gathering impacts their well-being. It increases their happiness and satisfaction levels. Levin (2013) found that religious activities are significantly associated with depression and stress. Religious people were found to be happier and more satisfied (Ellison, 1991; Frey & Stutzer, 2002).

Ngamaba and Soni (2018) explored that different religious groups have different levels of satisfaction. They used six waves of World Value Surveys (WVS) from 1981 to 2014. They reported that individual subjective well-being is the function of his/her religiosity level and country-level development. Their results revealed that Muslims are less happy and satisfied as compared to other divine religions. They suggested that an individual's health status, financial satisfaction, and freedom of choice are the important sources by which religious groups and governments across the globe can improve the subjective well-being (SWB) of individuals.

Feng et al. (2021) studied the relationship between well-being and religious participation within the Chinese cultural context. This study used Chinese General Social Survey data from 2015 for empirical analysis and reported that religious people are happier and more satisfied. The level of satisfaction and happiness varies from religion to religion. They found that Muslims are happier and more satisfied than non-Muslims.

Nezlek (2022) found that there is a significant difference between the happiness and satisfaction levels of believers and non-believers. Those who are believers have better health than others. Believers can trust the people in their surroundings like family, friends, neighbors, and other believers. He suggested that belief not only causes well-being but also generates social capital.

When examining the Quran, we found that happiness and well-being are very important and deep concepts while in conventional knowledge these concepts are frequently considered as being unimportant or simple emotions that are temporary sentiments at a given time. Quran tells us that by holding feelings of pleasure or contentment, happiness can help with handling your emotions, encouraging your faith, and becoming closer to Allah. There are some sources of happiness and increasing well-being that have been at various places in the Quran. From different verses of the Quran, we can understand that true happiness lies in faith, gratefulness, valuing time, and helping others. The first source is faith. The belief in God's existence is the fundamental source of real happiness and satisfaction.

"To God belongs the future of the heavens and the earth, and all matters are controlled by Him. You shall worship Him and trust in Him. Your Lord is never unaware of anything you do" (Quran, 11:123).

Here, the Quran gives us a lesson that we should have a firm belief in the oneness of Allah almighty Allah and that having true faith and true submission to Allah means that we will be content, and therefore happy, about everything in life because we know it to be from Allah alone. If a person has faith in the oneness of Allah and His control over everything, then he/she will be satisfied with every event and happening. This verse also acts as a reminder that Allah is fully aware of every action of individuals so a person can never do wrong deeds due to accountability fear and will remain kind and fair with others.

"If you express gratitude, I shall certainly give you more, and if you are ungrateful, then My punishment is severe" (Quran, 14:7).

Gratitude is the key to much of our achievement and well-being. God has promised in this verse that if we will be thankful to God for His blessings, He will surely bless us more which increases satisfaction and

happiness. By being grateful to Allah, we can learn to understand that everything we receive here on earth is a blessing and that Allah is the One behind everything we experience in life. The third important source of well-being is to be wary of time. The Quran says that if a person takes time as an asset, he must be successful and his well-being will be high.

"By the time, surely man is in loss, save those who believe and do good deeds, and enjoin on each other truth, and enjoin on each other patience" (Quran, 103:1-3).

The Qur'an makes it clear that we must make the most of our time to properly live as the highest of all creatures to the fullest extent possible. Time is of the essence, the Qur'an says. We will succeed in this life and the one beyond it if we use our time wisely. The fourth important source of well-being that will bring Happiness is social interactions that generate social capital.

"Indeed, Allah enjoins justice, and the doing of good to others, and giving like kindred, and forbids indecency, and manifest evil, and wrongful transgression. He admonished you that you may take heed" (Quran, 16:91).

The Qur'an warns us that we must strive hard to be pleasant to people if we want to feel good about ourselves. Being nice to people will only make you happier. We can perhaps become nice and trustworthy individuals by following what Allah has commanded in the Quran. By being courteous to others and doing good deeds, we can build social capital. The Quran emphasizes the need for successful relationships with other individuals. We must make sure that we are not surrounded by such people who have these attributes. We should be linked with those who are leading a life as true Muslims. We can get true happiness by leading a life that is genuinely committed to Allah and from those human beings who try to achieve nearness to God.

2.2 Social Capital and Well-being

Bourdieu (1986) defines social capital for the first time as an indicator of an individual's success. The author argued that social capital is a resource that is connected with group membership and social networks. The volume of social capital possessed by a given agent depends on the size of the network of connections that he can effectively mobilize. Coleman (1988) stated that on a micro-level social capital is the resources available to an individual embedded in social structures. These resources include including teamwork, protection, inspiration, and authority, are used by actors to achieve their interests (Portes, 1998), while the macro-perspective views social capital as the features of social organizations (i.e., networks, norms, social trust) that keep its members from pursuing individual rather than collective goals (Putnam, 2002). The advantages of social capital to society as a whole are emphasized from a macro perspective; all members of society should gain, not just a small group of people (Putnam, 2002; Scholz, 2003). Within macro and micro perspectives, social capital has further been conceptualized as informal (socializing with coworkers) versus formal (attending a club meeting), and bonding means having close social ties with diverse others (Putnam & Goss, 2002).

In another study, social capital is also defined as the resources available to individuals living in a social structure for example information through networks and characteristics of social organization e.g., norms, and social trust through which members can take advantage (Scholz, 2003; Kritsotakis & Gamarnikow, 2004).

Social capital has a strong impact on individual and societal health, satisfaction, happiness, and well-being (Scholz, 2003). For example, on an individual level, social capital may promote positive health outcomes by providing health and well-being resources through social networks and social support (e.g., information

about the importance of preventative screenings, support to practice healthy behaviors, *etc.*) while at a societal level, social capital may enable collective action to foster safe communities with well-designed educational and health care systems, which would encourage health through lower crime rates, economic growth, and increased contact to health care services (Kawachi et al., 1999).

Social capital is distinct from social support in that social capital cannot be conceptualized as an individuallevel variable but can also be conceptualized as a structural, contextual variable. In contrast, social support is solely an egocentric, individual-level variable. As an individual-level variable, social capital has been conceptualized as the resources available, including the frequency of socialization with work colleagues (Veenstra, 2000) and the extent an individual participates in community events (Almedom, 2005).

Social capital has been hypothesized as the features of social organizations that enable harmonization and cooperation for the benefit of all members of the organization, including the democratic distribution of income and wealth in a country (Islam et al., 2006) and membership of voluntary associations in a state (Kawachi et al., 1999). Social capital, in part, takes in the collective dimension of social ties that influences an individual's social networks and social support (Kawachi & Berkman, 2001). For example, a community is categorized by an integrated social structure that may facilitate high levels of social support among those individuals integrated into that community. Whether social capital was conceptualized as an individual or contextual level variable reviews of the social capital and well-being literature have confirmed social capital's positive relationship with individual mental and physical health, happiness, and well-being (Carlson & Chamberlain, 2003; Islam et al., 2006).

2.3 Religion and Social Capital

Religious organizations (mosques and churches *etc.*) are known in the social capital literature as creators and facilitators of social capital. Churches have a history of volunteerism (Wuthnow, 1991), advocate teachings of care and love for others (Park & Smith, 2000), and play a dominant role in many communities (Eng et al., 1985; Eng & Hatch, 1991). This may facilitate the production of social capital, not only within the religious organizations but also outside of the church into the larger community. Being a member of a religious organization may facilitate membership in other organizations, and participation in religious activities (e.g., church attendance) and also motivate participation in other social institutions, including political institutions. Religious belief may also produce social capital by providing a spiritual rationale for community involvement (Regnerus, 2003), encouraging the value of civic engagement, and upholding customs for being involved in broader society (Muller & Ellison, 2001). Thus, believing that religion is important and being committed to religious faith (e.g., through volunteering, or donating money) attachment to society may also increase, which may be evidenced through electoral and non-electoral participation, group involvement, and giving and volunteering (Regnerus, 2003).

Religious organizations can help believers develop social networks and social interactions beyond religious settings (Muller & Ellison, 2001). Religious institutions through religious sittings and religious occasions offer an atmosphere for social interaction. When combined with the support provided by religious institutions, religious values emphasizing the role of forgiveness, hope, and thankfulness in interpersonal relationships and social networks have the potential to encourage a sense of social trust and well-being among their followers (Krause, 2008).

According to a large body of research, religion has a positive effect on both church-related and secular volunteers (Becker & Dhingra, 2001; Ruiter & De Graaf, 2006). Among churchgoing Protestants, participation in church activities was significantly associated with community volunteerism through a church program, through a non-church organization, and with general community volunteerism, even after controlling for background characteristics (Park & Smith, 2000). Having a greater number of religious and spiritual social networks was also related to overall community volunteerism (Park & Smith, 2000). Dimensions of religious participation (e.g., attendance, membership, prayers), religious affiliation, and

religious beliefs were associated with voluntary association participation in a North American sample (Lam, 2002). Ruiter and De Graaf (2006) reported that those residing in more religious countries were nearly four times more likely to have volunteers than those residing in secular countries. Ecklund & Park (2007) argued that religious participation other than worship, religious giving, and religious volunteerism was positively associated with community volunteerism among Asian Americans.

Trusty and Watts (1999) explored that in national samples of youth, positive perceptions of religion, and higher levels of self-reported religiousness were associated with more volunteer work and participation in community service, respectively. Youniss et al. (1999) also stated that religion has a positive relationship with other aspects of social capital. In a national sample of youth, he found that religious involvement, participation in religious activities, and self-rated religiousness were positively associated with the provision of values and norms that encouraged positive behaviors like parental expectations, friend's hopes and values with intergenerational social networks (between youth and parents, between youth's parents with youth's friends' parents) (Muller & Ellison 2001). In another study, Trusty & Watts (1999) found that positive perceptions of religion were associated with higher levels of engagement in extracurricular activities.

Despite the body of literature linking religion and social capital religion and well-being studies have not adequately examined social capital as a potential mediator in the religion and well-being relationship. Active participation in a faith community may increase social capital, leading to improvement in well-being. Researchers have offered that something essential in being actively involved in a faith community may be accountable for the relationship between religion and well-being, particularly the association between religious attendance and individual well-being (Oman & Reed, 1998; Brown et al., 2003; Oman et al., 2005). Feng et al. (2021) highlighted that religious participation has a significant impact on happiness by providing a social network to people so they can get many direct and indirect benefits. These are sources of reducing stress and risk.

Given that social capital includes the resources available to individuals through their involvement in groups such as faith groups and the social features of those groups, social capital may be a powerful mediator in the religion–happiness and well-being connection. Assumed the previous literature on religion, social capital, and well-being, we supposed that greater religiosity is related to well-being, with social capital as a mediator in the religion and well-being relationship. From the review of existing literature, it seems that no study explores such type of relationship for Pakistan.

3. ECONOMETRIC METHODOLOGY

3.1 Theoretical background

According to Frankl (1967), individual good deeds and practices enhance individual happiness levels. Diener et al. (1984) introduced subjective well-being as a combination of happiness and life satisfaction. Donahue (1985) stated that religious practices create a social network by improving individual behavior and positively affecting subjective well-being. Similarly, according to Pargament (1992), religious practices act as a coping mechanism and affect individual mental health through spirituality. Batson et al. (1993) introduced faith as a social institution that causes individual satisfaction and happiness, religiosity improves psychological well-being by providing a sense of meaning and purpose in life. Ellison (1991) and Ellison & Levin (1998) elaborated on religion's impact on physical health such as mortality rates and psychological well-being. Chatters et al. (2008) stated religious services help to reduce mental disorders and improve mental health as well as physical health by improving individual social networks within religious institutions (for example churches), and Diener et al. (2011) suggest that religiosity has, direct and indirect, effect on the mental and physical well-being of the individual and improves the quality of life. Thus, it can be concluded that religious practices increase faith and improve social networks thereby

boosting individual satisfaction and happiness. This results in improved physical and mental health and reduced mental disorders thereby improving quality of life.

3.2 Data

We used the data from the seventh wave of the World Values Survey (WVS-7) for Pakistan to analyze the impact of religiosity on social capital and well-being. The number of observations is 1995. After filtration of missing observations, we get only 365 observations. The questionnaire consists of a complete module on religiosity, social capital, happiness, and well-being. The questionnaire has a section regarding the demographic variables including age, gender, marital status, education, population density (urban and rural), and income which is also used for the analysis.

This study used the Partial Least Square Structural Equation Modeling Technique (PLS-SEM) based on its ability to resolve measurement errors in variables (Chen, 2001). PLS SEM is a non-parametric technique and has extensive applications in administrative difficulties, specifically, where human association is found. PLS-SEM has been applied in social sciences, for example, in marketing and family business by Sarsted et al. (2014), in accounting by Lee et al. (2011), in tourism by Rasoolimanesh and Ali (2018), and in health economics by Yeary et al. (2012). PLS-SEM works well with the formative measures and answering the research questions. According to Babin et al. (2008), SEM's success is ascribed to its ability to measure latent variables and their relationships. It is a beneficial technique to investigate complete theories and understand concepts (Ridgon, 1998). Also, when the phenomenon under research is relatively new or changing, or when the theoretical model or measures are not well-formed, a PLS approach is often more suitable than the CB approach (Chin & Newsted, 1999).

The dependent variable in the current study is well-being. Three indicators are used to measure well-being including feelings of happiness, life satisfaction, and self-reported health.

3.2.1 Religiosity

Religion is a subjective, multidimensional, and complex concept, and there is no "gold standard" on how religion should be hypothesized. Considering the limitations of the data set, religion was conceptualized via dimensions based on religion and health literature (Ellison & Levin, 1998). Having faith in a divine self is one dimension of religion and it was assessed through beliefs (religious beliefs are assessed by four variables including belief in God, hell, heaven, and life after death) while other dimensions are religious attendance, and the importance of religion in life. According to Glock (1972), religious attendance was assessed by asking respondents about how often they pray, and how often they attend religious events. By using the approach of George et al. (2002) and Harding et al. (2005) importance of religion is assessed by three questions including i) Do you think you are a religious person? ii) Is the religion most important factor in your life? iii) Whenever science and religion conflict, religion is always, right.

3.2.2 Social capital

The conceptualization of social capital as it relates to well-being is still undergoing refinement (Carlson & Chamberlain, 2003). Thus, the theorized components of social capital (Putnam & Goss, 2002) and the previous literature using the Social Capital Community Benchmark Survey SCCBS (Kim & Kawachi, 2006) were used to hypothesize social capital for the present study through the variable Trust. The variable is measured through Trust your family, Trust your neighborhood, Trust people you know (friends), Trust people you meet for the first time and Trust people of another religion.

The initial model design has two exogenous latent variables (i.e. Religiosity and Social Capital). The path model shows the relationship between the three hypotheses with well-being. The inner model displays the relationship between the constructs, while the outer model displays the relationship between the construct and the indicator variables.

Sr	Category	Abbreviations	Variables				
1	Religiosity	R1	Believe in God				
2		R2	Believe in Hell				
3		R3	Believe in Heaven				
4		R4	Religion is Important in life				
5		R5	Importance of God				
6		R6	Believe in life after death				
7		R7	Whenever science and religion conflict, religion is always right				
8		R8	How often do you attend religious services?				
9		R9	How often do you pray				
10		R10	The only acceptable religion is my religion				
11		R11	The meaning of religion is to follow religious norms and ceremonies vs to do good to other people				
12		R12	Meaning of religion: To make sense of life after death vs to make sense of life in this world				
13		R13	Religious person				
14	Social Capital	s 1	Trust Your Family				
15		s2	Trust Your Neighborhood				
16		s3	Trust People you know personally				
17		s4	Trust people you meet for the first time				
18		s5	Trust People of another religion				
19		s6	Trust people of another nationality				
20	Well-being	W1	Happiness Level				
21	C	W2	Life Satisfaction				
22		W3	Self-reported health				
23		w21	Frequency your family's last 12 months gone without enough food				
24		w22	Frequency your family the last 12 months felt unsafe from criminals				
25		w23	The frequency you & family have last 12 months gone without needed medical treatment				
26		w24	The frequency you & family have last 12 months gone without cash				
27		w25	Frequency of the last 12 months how often have you or your family remained shelterless?				

Table 1: List of Variables	Table	1: List	of Va	riables
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3.3 Proposed Model

WB = f(SC, Rl, Gend, Edu, Inc, Age, MS)	(1)
SC = f(RL)	(2)

Where *Gend* represents the gender of the respondent, *Edu* represents the education level of respondents, *Inc* represents the income level of the respondent, *Age* represents the age of the respondent, *MS* represents the marital Status of the respondent, *SC* represents the social capital, *RL* represents the religiosity Level of the respondent, and *WB* represents the subjective Well-being

i. Structural Model

Wellbeing =
$$\alpha_0 + \alpha_1 SC + \alpha_2 RL + \alpha_3 Gend + \alpha_4 Edu + \alpha_5 Inc + \alpha_6 Age + \alpha_7 Ms + \varepsilon_1$$
 (1)'

Social Capital =
$$\delta_0 + \delta_1 RL + \varepsilon_2$$
 (2)

In Figure (1) H_1 is the relationship between religiosity and well-being, H_2 represents the relationship between religiosity and social capital, H_3 represents the relationship between social capital and well-being and H_4 represents the relationship between religiosity, social capital, and well-being.

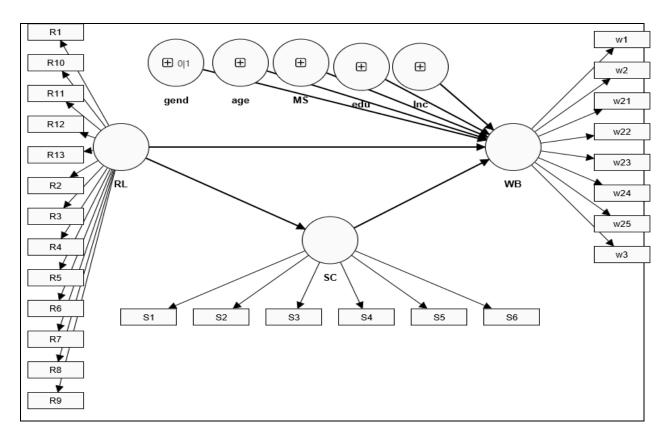


Figure 1: Proposed model of religiosity, social capital, and well-being

4. RESULTS AND DISCUSSION

The results depict that some of the religiosity constructs have loadings less than 0.7. Items having a loading less than 0.7 should be removed (Nunnaly, 1978). R_7 , R_{10} , R_{11} , R_{12} , and R_{13} constructs of religiosity are less than 0.5 while all other items show loading greater than 0.7, positive, and statistically significant. Similarly, items of the construct social capital, s_1 to s_4 are significant, however, loadings of s_1 , s_2 , s_3 , and s_6 appear with positive signs and loading greater than 0.7.

Well-being has three main items $W_1 W_2$, and W_3 , where W_2 is life satisfaction and it is further subdivided into five more items w_{21} , w_{22} , w_{23} , w_{24} , and w_{25} (Diener, 1985). Factor loadings of W_2 , w_{22} , w_{24} , and w_{25} are greater than 0.7 and show a strong relationship with well-being. The religiosity construct shows a strong path coefficient with well-being. Thus hypothesis 1 is accepted that religiosity has a positive and significant effect on well-being. The findings are in line with Ellison (1991), Aman et al. (2019) and Villani et al. (2019) results that religious beliefs and practices increase individual happiness and life satisfaction. It can be inferred that the significance of religion helps to improve well-being. Therefore, having religious beliefs and focusing on the teachings of religion cope admirably during crises and hard times of life, thus positively ensuring well-being.

Social capital construct loadings s_2 , s_3 , and s_6 show a high relationship, s_1 has a moderate relationship while s_4 and s_5 show a weak relationship. Our results show that religiosity has a positive and significant impact on social capital. Results are in line with Kerri et al. (2013) and Muller & Ellison (2001) reported that religious involvement is consistently and positively associated with various forms of social capital and with each adolescent outcome. They determined that religious involvement remains modestly but significantly linked with desirable outcomes even controlling the effects of social capital.

Variables	Items	Loadings	(P-Values)	AVE	Cronbach's	Composite
					Alpha	Reliability
Religiosity	R1	0.89	0.000	0.530	0.620	0.783
	R2	0.75	0.050			
	R3	0.60	0.010			
	R4	0.76	0.000			
	R5	0.82	0.000			
	R6	0.83	0.000			
	R7	0.51	0.005			
	R8	0.75	0.000			
	R9	0.71	0.000			
	R10	0.21	0.078			
	R11	-0.03	0.065			
	R12	-0.05	0.091			
	R13	0.12	0.005			
Social Capital	s1	0.61	0.000	0.610	0.612	0.762
_	s2	0.89	0.000			
	s3	0.95	0.000			
	s4	0.13	0.000			
	s5	0.29	0.020			
	s6	0.81	0.086			
Well-being	W1	0.63	0.056	0.560	0.702	0.719
-	W2	0.72	0.009			
	W3	0.62	0.006			
	w21	-0.30	0.000			
	w22	0.82	0.021			
	w23	0.29	0.000			
	w24	0.74	0.000			
	w25	0.80	0.000			

Table 2: Outer Loadings, Cronbach's Alpha, and Composite Reliability Values

Well-being construct items are W_1 , W_2 , W_3 , w_{21} , w_{22} , w_{23} , w_{24} and w_{25} . Factor loadings of w_2 , w_{22} , w_{24} , and w_{25} are significant and above 0.7 suggesting a high relationship with the construct. The social capital has a positive and significant effect on well-being. The findings align with Islam et al. (2006) and Yeary et al. (2012) who found that social capital has an indirect positive impact on the health and subjective well-being of individuals living in a society. This is because it enhances the ability of communities to collaborate and address health issues collectively. Social capital promotes collective efforts for the betterment of society, but it can also lead to social exclusion. Individuals with higher levels of social capital tend to experience greater happiness and have improved job prospects.

5. CONCLUSION AND POLICY IMPLICATIONS

The study investigated the relationship between religiosity, social capital, and well-being. The study applied PLS-SEM to 1996 observations for Pakistan from the seventh wave of the world value survey. Both the processes of identifying the ratios and the most significant parameters were completed by using the PLS-SEM methodology.

The most significant construct for well-being is religiosity. Religiosity has a direct and indirect, positive, and significant impact on well-being. Social capital also has a positive significant impact on well-being. As religiosity is a subjective construct and cannot be measured accurately, therefore, there is always room for further improvement in defining this variable. A lack of complete understanding of religious teachings does not contribute to well-being, as it can promote rigid thinking, overdependence on laws and rules, an emphasis on guilt and sin, and disregard for personal individuality and autonomy. To benefit from religion, a deep understanding of religion along with the application of religious teaching is required that can enhance well-being at both the individual and aggregate level. Religious organizations can play a key role in the promotion of social capital that enhances well-being.

Religiosity, social capital, and well-being are subjective concepts and it is hard to quantify them. The results obtained from different proxies vary according to the situation. Therefore, a detailed survey should be designed to capture all subjective and objective aspects of social capital, religiosity, and well-being. As this study is based on the seventh wave of the world value survey, it does not capture obligatory factors including prayers, and Zakat (obligatory and non-obligatory donations) which can be explored by future studies. The sample size should be increased to see the generalized effects of religiosity and social capital on well-being. Furthermore, as the present study only considered a Muslim country (Pakistan) this can be extended by comparing it with the well-being of individuals in other countries practicing divine religions. Though results cannot be generalized due to a limited sample still it can be inferred that by promotion of religious teachings and institutions well-being of individuals of society can be enhanced through religious social capital.

Acknowledgment

The authors acknowledge the comments made by the reviewers and members of the editorial board on the earlier version of this manuscript.

Funding Source:

The author(s) received no specific funding for this work.

Conflict of Interests:

The authors have declared that no competing interests exist.

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