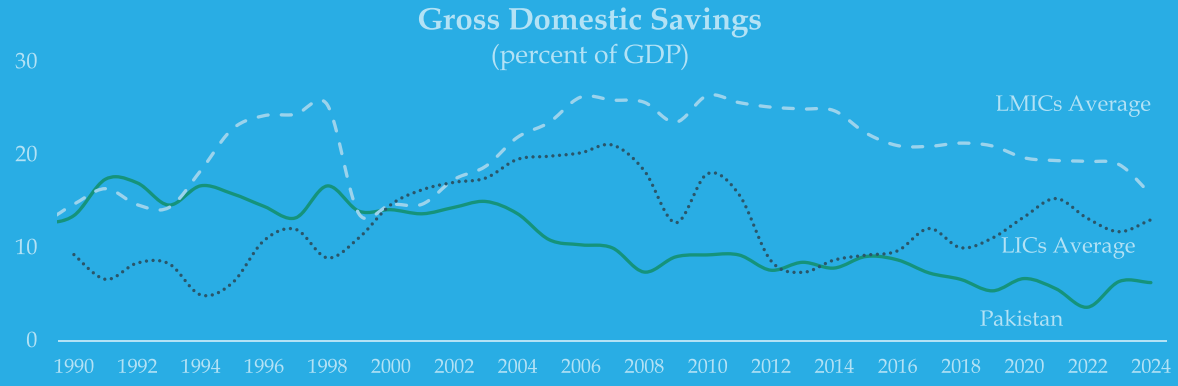
6

The Challenge of Low Savings in Pakistan

Pakistan's gross domestic savings has been on a consistent decline over the last two decades, and is one of the lowest among a cohort of peer economies. The persistently low and falling savings has undermined the prospects of sustainable economic growth. The analysis in this chapter shows that savings in Pakistan are hampered by an unfavourable macroeconomic environment characterized by low and volatile economic growth, high inflation, elevated youth dependency, and a sizeable informal economy. The analysis also shows that low and negative real returns and relatively weak financial intermediation across various financial institutions and markets – such as banking, capital markets, insurance and postal financial services – are some of the major reasons behind low savings in the country. Amid a variety of policy distortions that incentivise informal savings, the country's low savings is also affected by cultural norms, and low levels of financial literacy.



6 The Challenge of Low Savings in Pakistan

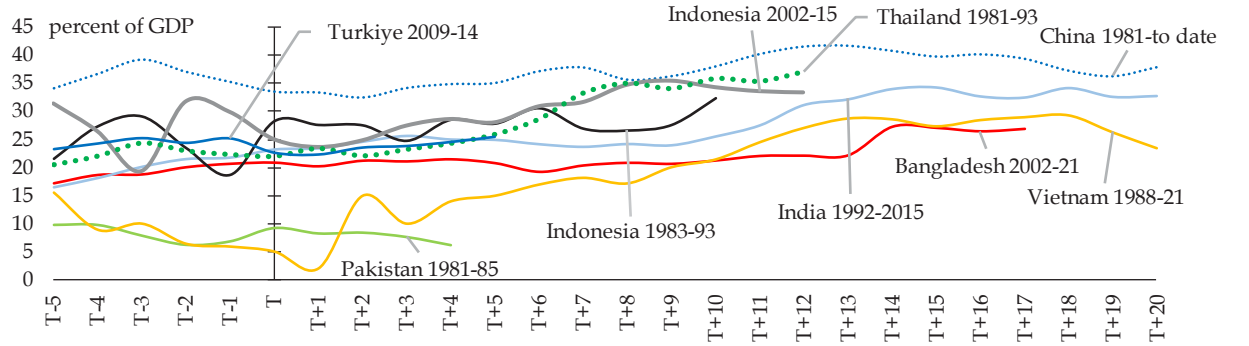
6.1 Introduction[1]

Growth theories highlight Gross Domestic Savings (GDS) as a key driver of sustained economic growth. Cross-country analysis shows a strong association between GDS and GDP growth for both industrial and developing economies. For developing economies, high domestic saving rates typically predates the take-off in GDP growth, and remains vital for maintaining it for longer periods **(Figure 6.1)**. The countries with saving rates above 20 percent have been able to sustain economic growth for longer, and large increases in GDS has been linked to economic development. This is because higher domestic savings boosts investment in infrastructure, technology and human capital, enabling capital accumulation and fostering innovation that enhance total factor productivity **(Figure 6.2)**.[2]

Moreover, higher domestic savings reduces dependence on foreign aid and external borrowing, mitigating risks related to external debt sustainability, and providing domestic resources for growth. While investment is typically financed through a mix of domestic and foreign savings, over reliance on foreign savings carries risks.[3] These foreign-origin inflows are volatile, prone to sudden reversals during global financial cycles and can put pressure on the exchange rate and increase vulnerability to external shocks. In contrast, high GDS provides a stable and predictable funding source, fostering self-sustaining growth, as it is less susceptible to external shocks.[4]

The mobilisation of GDS through the financial system can hardly be overemphasized, given its instrumental role in efficiently channeling resources into productive investments. When banks, capital markets and financial institutions (FIs) intermediate savings, they bridge the gap between savers and viable investment opportunities. This not only drives economic growth but also leads to more sophisticated markets that allocate resources efficiently. Indeed,

Gross Domestic Savings in Selected Regional Take-off* Economies **Figure 6.1**



* Following IMF (2013), take-off is defined by consecutive 5 years (or more) growth of 3.5 percent (or more) in GDP per capita (constant) PPP terms. On x-axis, T points to the first year of the take-off. The data pertaining to Vietnam's GDS prior to 1995 is fragmented and has been compiled from multiple sources.

Sources: IMF, WDI, Tran-Nam and Pham (2005), Drabek (1990), WB (1983), and SBP staff calculations.

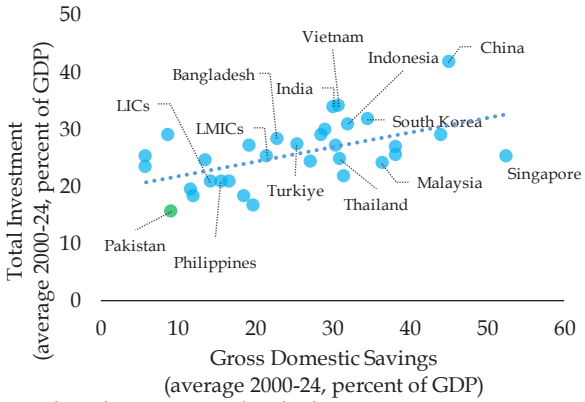
[1] This special chapter draws on background discussions with various public and private sector stakeholders including Securities and Exchange Commission of Pakistan, Pakistan Post Office Department, as well as various real estate and capital market professionals.

[2] Deaton (1999); Dabla et al. (2013); Lewis (1955); Rodrik (2000); Loayza et al. (2000); SBP (2025a); Levine and Renelt (1992); Solow (1956)

[3] In majority of countries with high investment rates, foreign savings account for less than 20 percent of total investments over long period, with most investments financed by resources raised domestically. This is because despite globalization, most savings remain invested domestically. Source: Feldstein and Horioka, (1980); Levine (2005); Rodrik (2000)

[4] Reinhart and Rogoff (2010); Feldstein and Horioka, (1980); Prasad et al. (2007)

Total Investment and Gross Domestic Savings **Figure 6.2**



Note: based on 32 regional and other EMDEs
Sources: IMF and WB

economies with high financial development and formal saving rates tend to exhibit stronger productivity growth and greater macroeconomic and financial stability.[5]

Pakistan's GDS has remained considerably low in recent years. Over the last two and half decades in particular, domestic savings have consistently fallen short of investment needs, undermining the economy's ability to sustain long-term growth; whereas historically the periods of relatively faster economic growth have coincided with high inflows of foreign savings.[6]

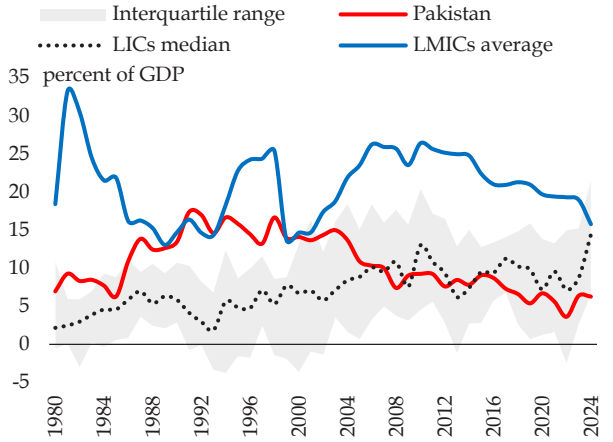
Empirical studies identify several factors that impact GDS.[7] These can be broadly categorized into economic, demographic, and institutional factors. Key economic drivers include income levels where higher per capita income correlates strongly with increased savings.[8] Consistently high inflation is another economic factor that affects GDS, as it erodes purchasing power and inhibits growth prospects, leaving less room for savings at household level.[9] Real interest rate (RiR) is also a key determinant. An increase in RiR has been generally found to incentivise savings due to the substitution effect.[10]

Among demographic factors, youth dependency ratio can have significant impact on GDS. A rise in both total dependency and youth dependency tend to lower domestic savings.[11] Two of the most common institutional factors influencing GDS are financial development and the size of informal or undocumented economy. Financial development provides formal means of financial savings, and affects the responsiveness of GDS to changes in interest rates. The informal economy suppresses productivity, economic growth, financial sector development, and public savings; it may also lead to over/under estimation of savings in the economy.[12]

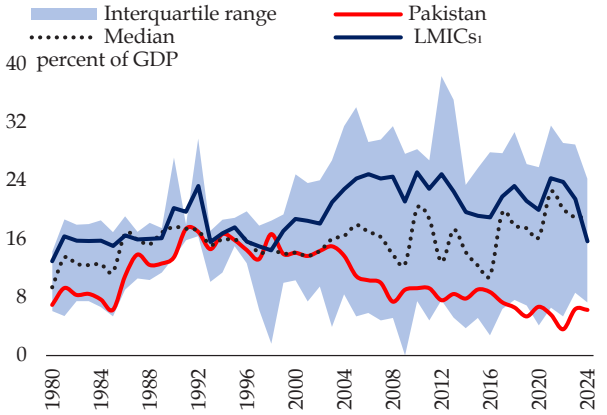
In light of these determinants,[13] **Figure 6.3** compares Pakistan's GDS with other economies that have similar characteristics. While Pakistan is categorized as a Lower Middle Income Country (LMIC) according to the per capita income, its GDS has fallen even below the median of Low Income Countries (LICs) since 2008 **(Figure 6.3a)**. Similarly, Pakistan's GDS is substantially lower than that of other high inflation countries that have had an average inflation of 8 to 15 percent in the last ten years **(Figure 6.3b)**. When compared to countries with

[5] Levine (2005); Beck et al. (2000)
[6] Ali (2016); MoF (2015-2025)
[7] Theories on determinants of GDS abound in economic literature and often surveyed in Pakistan as well. There is little need for an exhaustive listing of the same in this section; for study on macro-determinants of GDS in Pakistan see **Box 6.2**
[8] Goldsmith (1969); Loayza et al. (2000)
[9] While inflation can increase savings when central banks raise interest rates, consistently high inflation can squeeze real interest rates and raise economic uncertainty, which has a negative impact on savings. Source: Elbadawi and Mwega (2000); Masson, et al. (1998)
[10] The net effect of RiR on savings is ambiguous theoretically on account of the opposite forces of income and substitution effects. Most studies find a positive relation between RiR and saving when interest rates are not too low; some case studies suggests that RiR above 1.5 percent triggers substitution effect. Source: Khalid (2004); Aizenman et al. (2017)
[11] A cross-country study shows that a 7 percent rise in dependency lowers domestic savings by 1 percent of GDP, where total dependency and youth dependency both have similar impact on domestic savings. Masson et al. (1998)
[12] Modigliani and Brumberg (1954); Denizer and Wolf (2000)
[13] Cross-country analysis of GDS from the lens of RiR is excluded from following analyses on account of limited historical data for RiR. For comparisons based on recent RiR data, see Section 6.2.

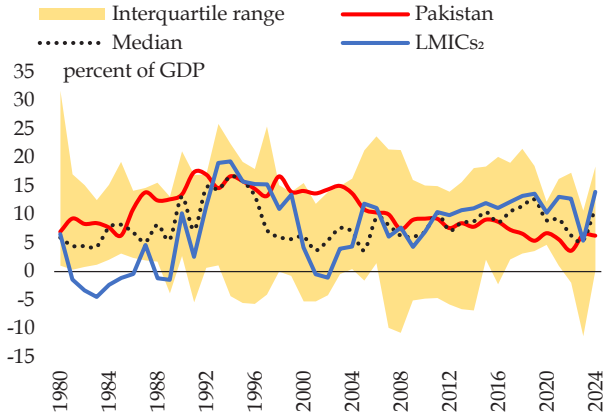
GDS: Pakistan and Low Income Countries Figure 6.3a



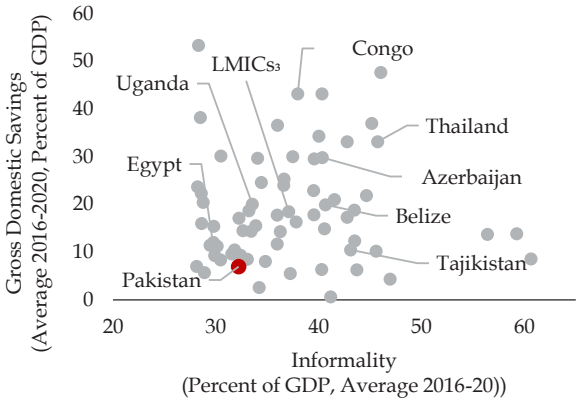
GDS: Pakistan and Other High Inflation Countries[1] Figure 6.3b



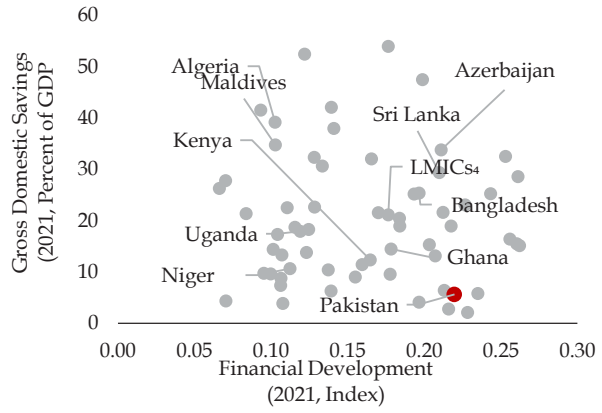
GDS: Pakistan and Other High Youth Dependency Ratio Countries[2] Figure 6.3c



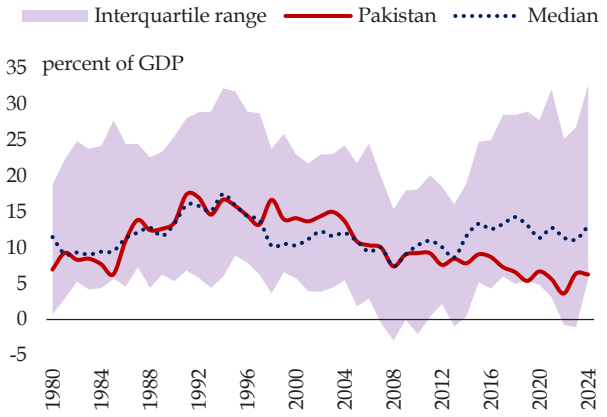
GDS: Pakistan and Other High Informality Countries[3] Figure 6.3d



GDS: Pakistan and Other Low Financial Development Countries[4] Figure 6.3e



GDS: Pakistan and Similar Economies[5] Figure 6.3f



[1]For the purpose of these analyses, high inflation countries are defined as countries with average annual inflation of 8-15% during 2015-24. This range draws on Khan and Senhadji (2001), Dornbusch and Fischer (1993), and others. $LMIC_1$ refers to LMICs with high inflation

[2]$LMIC_2$ refers to LMICs with high Youth Dependency. The income groups are based on World Bank 2025 classification.

[3]Following Ohnsorge and Yu (2022), 71 economies with above median informality of 27.1% is considered high. $LMIC_3$ refers to LMICs with high Informality.

[4]Following Ohnsorge and Yu (2022), 61 countries with financial development index lower than the median of 0.26 are included in this chart. FD index value of 1 means fully developed financial markets and institutions and vice versa. $LMIC_4$ refers to LMICs with low Financial Development.

[5]This chart compares GDS in 33 LMIC, 5 UMIC and 4 LIC countries that share any 3 or 4 of the following 5 characteristics similar to Pakistan: income level, high inflation, low financial development, high youth dependency, and high informality.

Sources: IMF, WB and SBP staff calculations

high youth dependency ratios —i.e. between 50-70 percent of the working age population[14] Pakistan's average GDS has been below the median during the last ten years **(Figure 6.3c)**. The country's GDS is also low when compared to economies with similar levels of high informality **(Figure 6.3d)**, and low levels of financial development **(Figure 6.3e)**.

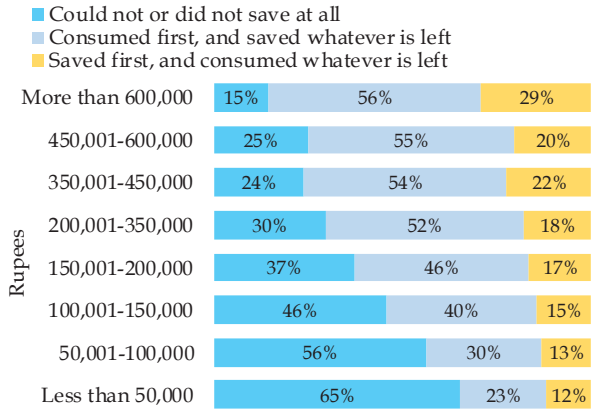
Clearly, none of the archetypical determinants of GDS discussed above offer clear identification of a single reason behind Pakistan's consistently low savings. Even when compared to the 42 countries that share any three or four of these five archetypical characteristics that determine savings, Pakistan's GDS comes out to be notably lower than the median (**Figure 6.3f)**. This unique confluence of factors — an LMIC with high inflation; high informality; high youth dependency; and low financial development - creates a particularly challenging environment for fostering formal savings.

Another likely reason stems from the notion that savings is a matter of habit and culture, and not necessarily solely influenced by income, inflation, financial development, dependency, and so forth. This is somewhat reflected in the findings of SBP Pulse Survey on Savings 2025, conducted for the purpose of informing this Special Chapter **(For details see Annexure 1)**. The survey finds that most respondents, even those with higher income, 'spend-first-and-save-later'. This is contrary to the 'save-first-and-spend-later' saving habit recommended in personal finance theory **(Figure 6.4)**.[15,16]

The analysis of economic, demographic, and institutional factors in the subsequent sections of this chapter offers the following stylized insights on the challenge of low savings in the country. First, the private sector, especially household sector, has been the main driver of GDS in Pakistan. In contrast, Pakistan's public sector has been consistently dissaving, amid persistent fiscal deficits and inefficient spending that constrains long-term economic growth, which in turn affects the prospects of savings. Second, analysis of household savings reinforces that low per capita income and a high consumption rate are major constraints to savings. In addition, high total fertility rate and youth dependency affect savings negatively, albeit large joint families save more than nuclear families due to more breadwinners. These and other macroeconomic and household factors of savings are discussed in **(Section 6.2)**.

Third, a sizeable informal economy and informal savings exist owing to regulatory and policy distortions, low real returns of formal savings, and a low levels of trust and financial literacy among the financially excluded **(Section 6.3)**. The informal economy also presents a challenge to the official measurement of savings **(Box 6.1).** Lastly, the banking and non-banking financial sector is

Savings Behaviour by Monthly Income **Figure 6.4**



Source: SBP Pulse Survey on Savings 2025

[14] Bloom et al. (2003)

[15] Lewis and Messy (2012); MoneySense (n.d.)

[16] Some habitual, psychological, and sociocultural determinants of saving include individualism (vs. collectivism), future-orientation, and uncertainty avoidance. For instance, a strand of economic literature on impact of culture and habits on household savings suggests that East Asian culture's emphasis on frugality and long term planning drives GDS in East Asian economies. Anecdotal evidence also suggests that certain ethnicities in Pakistan are more frugal than other ethnicities in the country. However, research on these factors is scant in both global and Pakistan-specific economic literature. This chapter touches upon some aspects of culture, and the idea that saving culture can be shaped by strictly implemented government policy. However, given the scope of this chapter no attempt has been made to cover detailed aspects of culture vis-à-vis saving. Source: Guiso et al. (2006); Essig and Supan (2005); Anyangwe et al. (2022); Srivisal et al. (2021)

yet to adequately attract savings into the fold of formality, or channel it efficiently **(Section 6.4)**.

6.2 Savings Landscape of Pakistan

This section reviews Pakistan's savings landscape, focusing on key macroeconomic factors and their impact on public and private savings. The section also delves into household and corporate savings trends and factors, where dominance of household savings over corporate savings is rather prominent. And finally, the section draws on Household Integrated Economic Survey (HIES) 2018-19—the latest survey available —to shed light on the factors that impact household savings in Pakistan.

Key Macroeconomic Factors

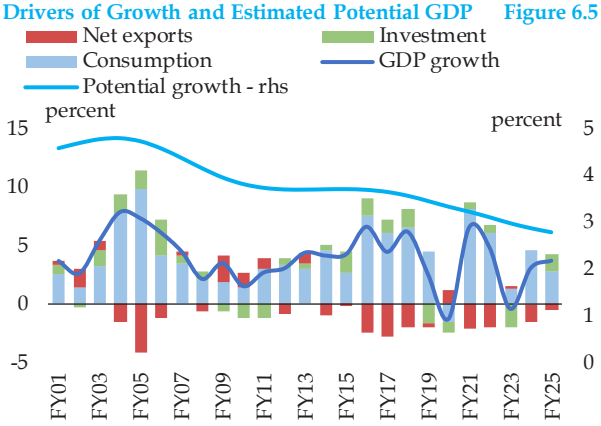
The relationship between GDP growth, per capita income, and savings is critical to understand Pakistan's savings landscape. Higher GDP growth and rising per capita income typically correlate with higher savings, as greater economic output enables more disposable income for savings (Sajid and Sarfraz, 2008; Vincelette, 2006). However, Pakistan's historically low GDP growth has constrained domestic savings. Potential GDP growth has also been on a declining trajectory over the last two decades.[17]

Alongwith declining potential GDP growth, Pakistan's economy remains predominantly consumption-oriented **(Figure 6.5)**, with private consumption consistently accounting for nearly 92 percent of GDP over the last four decades.[18] With average poverty at 44 percent in recent history,[19] and 36 percent of household income being spent on food, saving capacity is severely constrained.

The marginal propensity to save in Pakistan is much lower at 0.18 compared to neighboring countries like India (0.28) and Bangladesh (0.25) (Khalid et al., 2015). Demographic pressures, particularly a high youth dependency ratio, further increases consumption pressures and necessitates higher public spending to support an increasing dependent population (SBP, 2022; Bongaarts and Sathar, 2023).[20]

Exacerbating the impact of high consumption, a persistent high inflation environment is yet another major challenge to savings in Pakistan. Ilyas (2014) shows a negative relationship between inflation and savings in Pakistan, supporting the view that inflation affects savings by reducing real incomes. Considering that inflation in Pakistan has been higher than the threshold (SBP, 2024)[21] for two-thirds of the period between 1970 and 2023,[22] the purchasing power of households has been suppressed leaving them with less disposable income to save. While the central bank raises interest rates to counter inflation, this has not consistently translated into increased savings.

Drivers of Growth and Estimated Potential GDP **Figure 6.5**



Note: Estimated using Hodrick-Prescott Filter
Sources: PBS and SBP staff calculations

[17] SBP staff calculations
[18] WB (n.d.)
[19] Afzal and Ahsan (2021) estimates a poverty line using the Cost of Basic Need (CBN) method adjusted for CPI inflation from 1998-99 to 2018-19.
[20] SBP (2025a); Khan et al. (2015); Bongaarts and Sathar (2023)
[21] Threshold inflation is the level of inflation beyond which there exists a negative relationship between inflation and economic growth. For Pakistan, it is around 7 percent, which is line with the upper bound of the government's medium term target of 5-7 percent. (SBP, 2024)
[22] Shocks to money supply and fiscal policy stance have significantly contributed to inflation in last two decades. Similarly, inflation expectations, exchange rate depreciation, checkered political and economic environment, and climate shocks are other major drivers of high inflation (Hussain et al., 2025b).

With RiR remaining mostly negative or marginally positive between 2004 and 2023, the incentive to save in interest bearing assets has been relatively low **(Figure 6.6)**, as the return on savings is insufficient to offset inflationary losses (Vincelette, 2006; Khan and Qayyum, 2006).

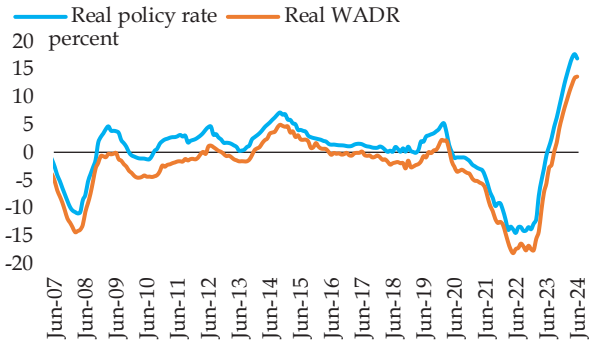
Low inflation and positive RiR play a crucial role in shaping savings behaviour, as higher returns typically incentivise individuals to save more. In the case of Pakistan, several studies —such as Awan et al. (2010); Raza et al. (2017)— have found a positive association between RiR and savings. However, Pakistan's low level of financial development confounds this relationship. When the financial system is underdeveloped, savers are less responsive to interest rate signals (Ito and Chinn, 2007). This structural weakness combined with negative average RiR contributes to persistently weak GDS **(Figure 6.7).**

Studies on determinants of savings in Pakistan are somewhat dated with limited covrage of variables. In this context, **Box 6.2** attempts to fill that gap and empirically investigate the major determinants of savings in Pakistan. Six key findings emerge from this empirical analysis. First, there is a strong positive relationship between gross national income and GDS as percent of GDP, supporting the life-cycle hypothesis. Second, increase in fiscal deficits is found to reduce GDS in the long run, implying that the Ricardian Equivalence does not hold in Pakistan.[23] Third, the increase in real interest rates improves GDS in the long run, suggesting that the substitution effect outweighs the income effect. Fourth, increase in the size of informal economy causes a decline in GDS in the long run. Fifth, improving secondary education strengthens domestic savings. Lastly, contrary to earlier studies on Pakistan and other economies, Pakistan's GDS has not been found to decrease with high youth dependency. This inconsistency with earlier empirical studies may be mainly because of the downward co-movement of dependency ratios and GDS in Pakistan,[24] which creates a confounding effect on empirical estimations.

Public and Private Savings

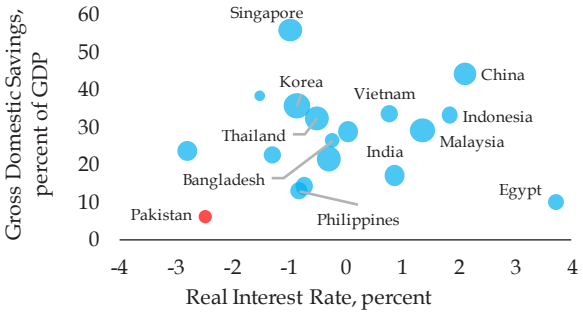
Disaggregated data on savings in Pakistan suggests that public savings has been considerably negative over the last three decades **(Figure 6.8)**. Public dissaving (i.e. negative public savings) in Pakistan exceeds and diverges from that in its peer economies **(Figure 6.9).** This mainly stems

Real Policy Rate and Weighted Average Deposits Rate (WADR) **Figure 6.6**



Note: Based on 12-month ahead inflation; WADR excludes zero markup and interbank
Sources: SBP, PBS and SBP staff calculations

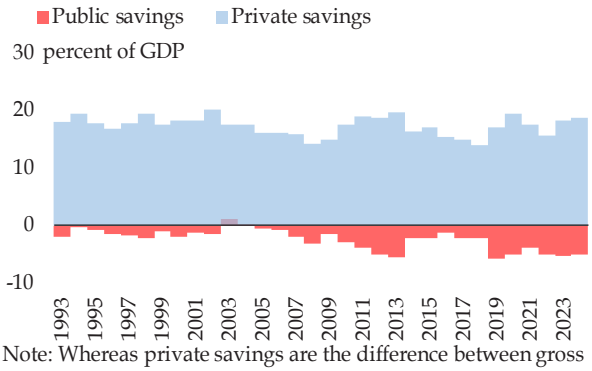
Gross Domestic Savings and Real Interest Rate (2017-21 average) **Figure 6.7**



Note: The size of the bubble show Financial Development Index 2021. Real interest rates are calculated on forward looking basis (12-month ahead inflation).
Sources: WB, IMF and SBP staff calculations

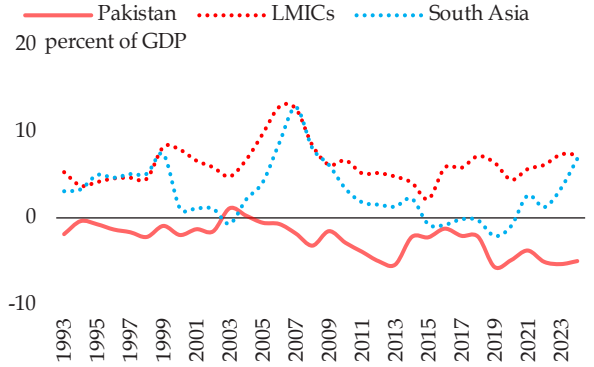
[23] Ricardian Equivalence suggests that government borrowing increases household savings. This is because households anticipate higher future taxes, and resultantly increase precautionary savings to pay for future taxes. (Zahid, 2018)
[24] Pakistan's youth dependency ratio, currently at 62 percent in 2024, is classified as "high" as per Bloom et al. (2003); however, it has been reducing since the year 2000 prior to which it averaged 83 percent during the preceding two decades.

Breakdown of National Savings **Figure 6.8**



Note: Whereas private savings are the difference between gross national savings, and public savings, the latter is the sum of public GFCF and fiscal balance
Sources: WDI, IMF and SBP staff calculations

Public Savings **Figure 6.9**



Note: Public savings is derived from the sum of public GFCF and fiscal balance as per commodity balance methodology
Sources: WDI, IMF and SBP staff calculations

from the persistent fiscal deficit that, until recently, has been growing over the last two decades. This has also been weighing on public and private investment, and as a result on long-term economic growth.[25] In the context of domestic savings, two related concerns are worth highlighting.

First, large government borrowing and misaligned tax policies hinder household and corporate savings. Contrary to Ricardian Equivalence, Pakistani households do not save more in response to government deficits. Instead, studies find that government deficits crowd out private savings in Pakistan (Waqas and Awan, 2012; Saeed and Khan, 2012; Kazmi, 2001). It does so by eroding disposable income via higher anticipated tax burdens, and by soaking up bank deposits, diverting loanable funds away from households and firms. This reduction in available credit lowers the prospects of credit-led income growth, which in turn affects the prospects of savings.[26]

The second concern relates to the idea that efficient channelisation of savings in investment is an important determinant of savings in long-run.

Literature on the nexus of financial development, economic growth and savings suggests that (a) formal financial savings are critical for economic growth, which in turn also stimulates domestic savings;[27] and (b) that the efficient allocation of financial savings in productive investments is as important as the quantum of it.[28] In consideration of this, the fact that a substantial portion of financial savings is channelled to government treasuries **(Table 6.1),** mostly via government bonds and other saving instruments, presents a concern.

This is because of the inefficiency of public expenditure, which is a major obstacle to fostering long-term economic growth.[29] Indeed, a large share of spending is rigid —such as interest payments, salaries, pensions, and running of the government — contributing to persistent fiscal deficit, whereas public spending on drivers of long-term economic growth and productivity— such as education, research and development, and institutional development—remains wanting.[30]

In light of this, inefficient public spending in Pakistan is not only depressing public savings but

[25] WB (2023)
[26] Waqas and Awan (2012); Saeed and Khan (2012); Kazmi (2001); Barro (1974)
[27] This concept also motivates the discussion on informal savings in **Section 6.3**
[28] Gregorio and Guidottim (1995); Estrada et al. (2010); Honohan (1999)
[29] Waliullah and Ahmad (2025). AGP (2025) points to recurring lapses in budget management, with significant procurement-related irregularities and unspent allocations. Weak public financial management diverts funds from productive investment, leaving development projects idle and reinforcing a pattern of inefficient, tick-box budgeting that hampers public savings.
[30] SBP (2025a)

Financial Savings in Government Instruments **Table 6.1**

Financial Savings Avenue	Description
National savings schemes[a]	The stock of household investment in NSS instruments stood at Rs 3.3 trillion as of March 2025. This is equivalent to 5.5 percent of domestic debt and 21 percent of banking sector's saving deposits as of March 2025.
Mutual funds[b]	The mutual funds industry's asset allocation to government securities averaged 34 percent of total assets (excluding cash) between FY20 to FY25, with the share of government securities standing at 53.3 percent in FY25.
Bank deposits[c]	Average sovereign exposure between December 2015 and March 2025 exceeded 85 percent of banking sector deposits in the last decade.
Insurance[d]	Non-life insurance companies, the larger segment of the industry, allocated an average of 80 percent of their assets to government securities over the past five years, while life insurance companies maintained an average exposure of nearly 20 percent.
Employee Old-age Benefits Institution (EOBI)[e]	Latest numbers on EOBI's investment allocation is not available but various reports from FY99 to FY06 and FY16 suggest that EOBI's exposure to government securities was between 68 to 92 percent of its total investments during these periods.

Note: Different periods have been used in this table due to data limitations. Based on discussions with industry experts, there is sufficient reasons to believe that while numbers may change over the years, varying with interest rate cycle, the overall narrative remains unchanged.
Sources: [a]MoF and SBP; [b]MUFAP AUM Data; [c] SBP Statistical Bulletins (Dec 2015 to Mar 2025); [d] SBP, 2020-24; [e]SBP, 2003 and FoP, 2016

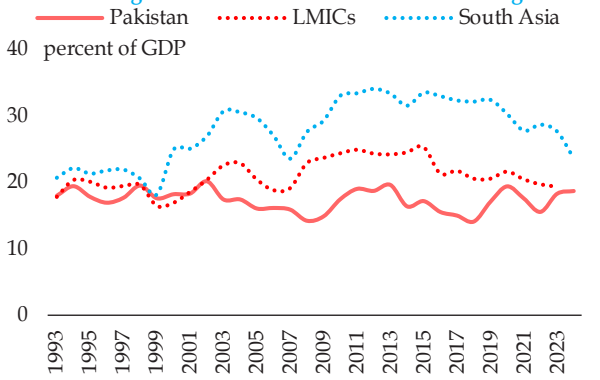
also affecting the saving capacity of the private sector—comprising corporates and households—perpetuating the country's cycle of low aggregate savings. Private savings are also negatively affected by a high, complex and inconsistent tax structure that encourages both informal economy and informal savings **(See Section 6.3)**. In addition, household savings are impacted by several socio-economic factors, including misaligned tax policies that also affect corporate savings. Corporate savings are also impacted by lack of structured management practices that constrain its earnings growth. (SBP, 2025; Bilgrami and Nisha, 1990).

Private savings in Pakistan have remained somewhat stagnant over the last two decades, and notably lower compared to the average of regional and income group peer economies during the same period **(Figure 6.10).** The sectoral breakdown of private savings shows that household savings form the bulk of the country's private savings, whereas corporate savings remains neglible **(Figure 6.11).** The share of corporate savings in Pakistan is in line with several slow-growth developing economies. However, it is much lower when compared to the fast-growing economies of East Asia, and especially to China and South Korea (Athukorala, 2025; Vincelette, 2006).

Household savings

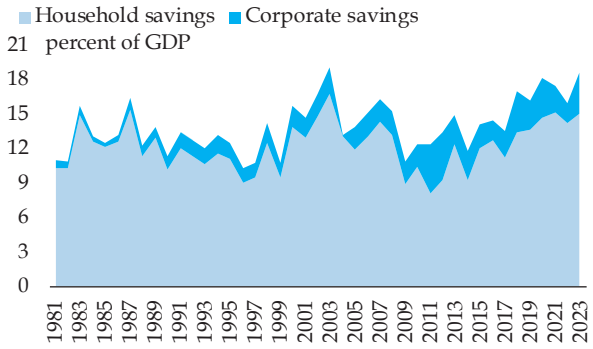
In light of the central role of household savings in driving private savings in Pakistan, this sub-section relies on HIES 2018-19 to analyse

Private Savings **Figure 6.10**



Note: Private savings are estimated as the difference between gross national savings and public savings
Sources: WDI, IMF and SBP staff calculations

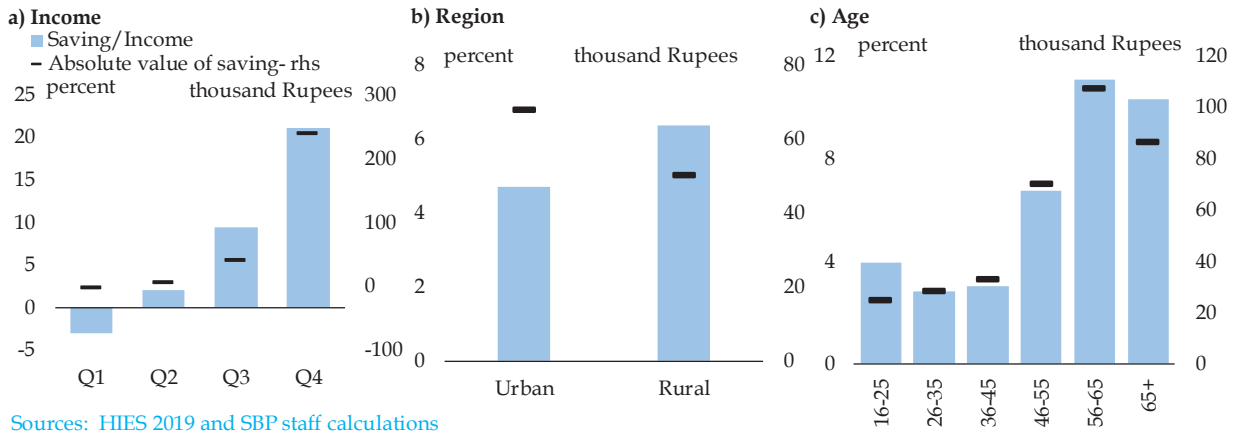
Breakdown of Private Savings: Household and Corporate Savings **Figure 6.11**



Note: Household and corporate savings are SBP staff estimates in the absence of official disaggregated savings data.
Source: SBP, PBS, and SBP staff calculations

Saving Ratio by Income, Region and Age

Figure 6.12



Sources: HIES 2019 and SBP staff calculations

household saving behaviour.[31] The analysis shows that household savings are positively related to income and education levels, and negatively related to dependency ratio. These stylised facts suggest that transition to higher GDS in Pakistan requires deliberate and sustained policy interventions, given the slow-moving nature of these drivers of household savings.

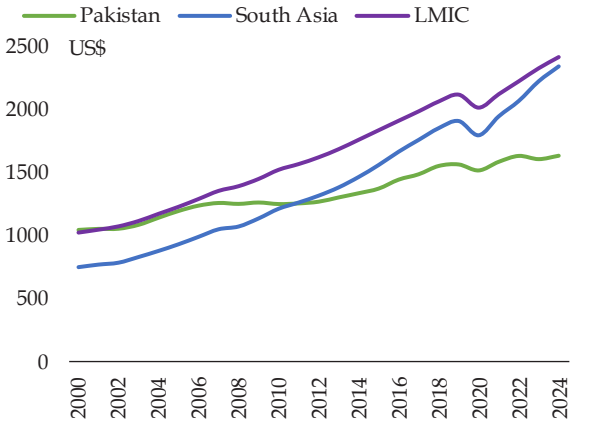
Analysis of HIES 2018-19 shows that income is a major driver of savings growth (**Figure 6.12a**). Households in the fourth income quartile save substantially more, with a 12-percentage point difference from the third quartile. This echoes the findings of earlier research (Khalid, 2023) that shows household income as the major determinant of household savings in both urban and rural areas. The country's GDP per capita has lagged behind peer economies for the last two decades (**Figure 6.13**), whereas wage growth has not kept pace with inflation in recent years.[32] Without turning this situation around, the prospects of household savings remain dim.

As a percentage of income, rural households manage to save more when compared to urban households (**Figure 6.12b)**, which could be due to lower costs associated with rural areas.[33] However, in absolute terms, urban households save significantly higher amounts on average when compared to rural households due to their higher income level.

The relationship of savings and age follows established theory on the ability of the middle-aged working population to save more.[34] The younger population is unable to save substantially due to lower incomes and higher propensity to consume. In light of this, Pakistan's current age structure and slow pace of decline in total fertility rate (TFR) does not augur well for household savings. About 79 percent of the country's

GDP Per Capita - Constant 2015 USD

Figure 6.13



Source: WB

[31] Given the structure of HIES 2018-19, analysis for household savings has been conducted at the level of household head.
[32] SBP (2025a)
[33] Khan et al. (2016)
[34] SBP (2024)

working age population is currently between the ages of 16 to 45 years—i.e. age cohorts that save the least (**Figure 6.12c)**—and is currently projected to remain at more than 60 percent until the turn of the century.[35] This requires urgent measures to reduce TFR to grow household savings.

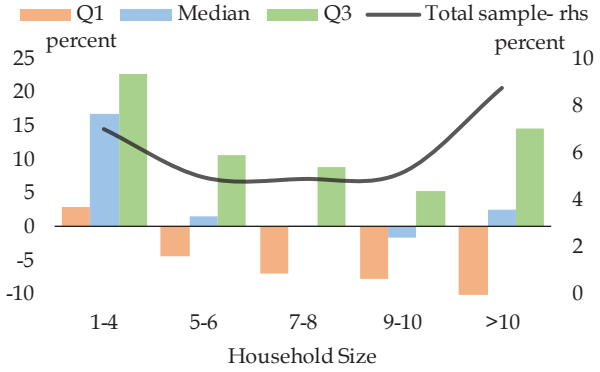
The need for policy interventions to control high population growth and reduce dependency is also evident from the differences in saving rates of different household sizes. There is clear evidence that savings rates decline with an increase in household size within nuclear family sizes (**Figure 6.14),** albeit household sizes with more than 10 members save more due to more breadwinners in joint family systems that typically have higher saving rate compared to nuclear families.[36] For median income households, 5 children seem to be the tipping point after which a household becomes a dis-saver. For low-income households, even having one child may move them towards dissaving (**Figure 6.15**). This, and the fact that Pakistan's youth dependency is not projected to fall below 50 percent until 2048,[37] also underscores the urgency and importance of reducing the pace of population growth.

Lastly, the impact of education on savings is also evident across households. A household head with a postgraduate degree has the highest saving ratio, with a 5-percentage point difference from undergraduate degree holders (**Figure 6.16a)**. Similarly, a household head with an undergraduate degree has a saving ratio that is 4 percentage points higher than the household head with intermediate degree. The saving returns to investing in human capital are thus evident with a clear upward trajectory. This relationship also holds when household size is taken into account. At both higher and lower household sizes, household heads with high levels of education tend to save more in comparison to household heads with relatively less education **(Figure 6.16b)**. This reinforces the need to invest in education. Current education levels do not bode well for savings, as Pakistan's primary, secondary and tertiary education rates are closer to LICs rather than peers.[38]

6.3 Informal Savings[39]

The size of informal savings in Pakistan is widely understood to be large. Although precise

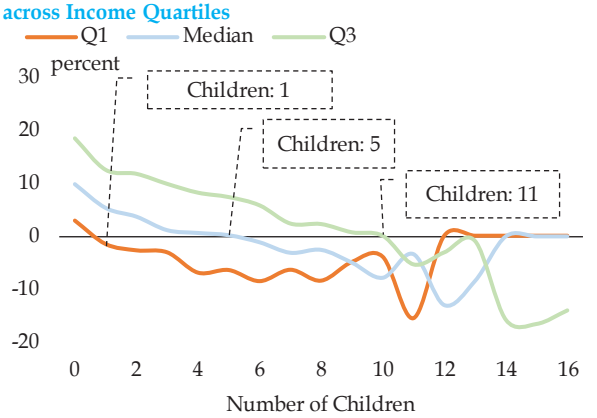
Saving Ratio by Income Quartile and Household Size* **Figure 6.14**



*Simple average of saving ratios

Sources: HIES 2019 and SBP staff calculations

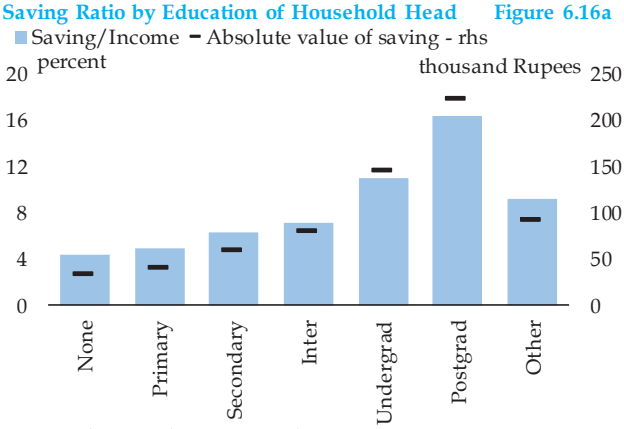
Point of Dissavings by Number of Children across Income Quartiles **Figure 6.15**



Sources: HIES 2019 and SBP staff calculations

[35] SBP staff calculations based on UN Population Division, medium fertility projections 2024-2100.
[36] Khan et al. (2016)
[37] SBP staff calculations based on UN Population Division, medium fertility projections 2024-2100.
[38] SBP (2025a)
[39] It is difficult to provide an exact definition of informal savings, so for the purposes of this section, informal savings refer to savings in undocumented or largely under-documented channels of saving. For example, Qadir (2005) and Afghan (2023) show that undocumented savings include cash and the largely under-documented savings into real estate and gold.

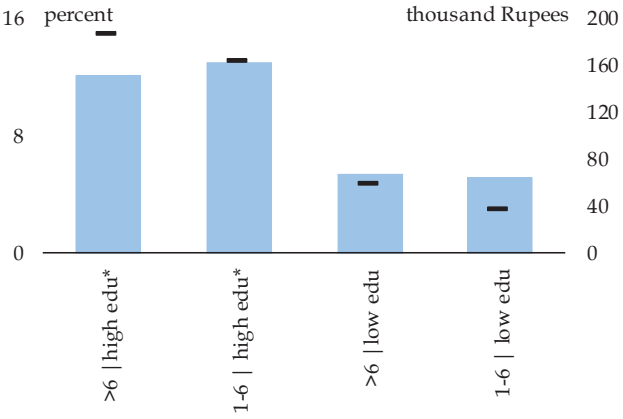
Saving Ratio by Education of Household Head **Figure 6.16a**



*Respondents with university degrees

Sources: HIES 2019 and SBP staff calculations

Saving Ratio by Household Size and Education of Household Head **Figure 6.16b**



estimates of informal savings are not available, a crude sense of the size may be obtained from various surveys, estimates and anecdotal evidence.[40] SBP staff estimates show that depending on the methodology used, informal savings could be between 3-11 percent of formal real GDP, and 2-7 percent of estimated real GDP, inclusive of estimated informal GDP (**Box 6.3**). This finding is consistent with past surveys that suggest a strong preference for informal savings.[41]

Informal savings are detrimental to an economy in several ways. First, undocumented savings reduce the potential collection of tax revenue, thereby reducing public income. Second, informal savings deprive the banking system of loanable funds, inhibiting credit creation and investment. Third, these are often channelled towards non-productive assets, creating speculative bubbles. Fourth, these weaken the effectiveness of monetary policy, and increases interest rate insensitivity. Fifth, informal savings can directly impact households with lower real returns (when kept in cash). Finally, lack of regulations and recourse in case of fraud or theft create greater risks for vulnerable groups.[42] This can be further exacerbated by the possibility of group-wide shocks in localized modes of savings.[43]

Economic literature suggests a number of reasons why informal savings seem to thrive in Pakistan. One major reason that compounds the issue of informal savings in the country is its large informal economy.[44] Although, as **Section 6.1** shows, Pakistan's GDS is lower even when compared to economies that have similar levels of informality, the underlying nature of the informal economy — rather than its size — may be the driving force behind informal savings. To understand this, a brief review of the informal economy and its linkages with informal savings is warranted.[45]

[40] Estimating informal economy and savings is challenging due to sparse data, and undocumented nature of the informal economy.
[41] SBP's Household Saving Behaviour in Pakistan 2021 survey reported that the most used modes of savings were 'Savings at home or with family members' (55 percent) and 'Participation in an informal saving club i.e., Committee' (37 percent), compared to 18 percent of savers who reported using an FI or mobile wallet. Similarly, SBP's Access to Finance Survey 2015 found that only 12 percent of the population used formal saving and investment avenues, as opposed to 58 percent that reported saving at home.
[42] For example, there have been instances where false real estate listings; ghost housing societies; sham real estate firms; and illicit trade of plot files have defrauded individuals of their savings. Source: Hassan and Qaiser (2025).
[43] Qadir (2005); SBP (2019); Asad (2023); Carpenter and Jensen (2002)
[44] Various studies estimate informality in Pakistan to be roughly between 20 to 30 percent in the 2000s. Source: Arby et al. (2010); Ahmed and Hussain (2008); Vincelette (2006)
[45] Informal productive activities are defined as all productive activities carried out by persons or economic units that are – in law or in practice – not covered by formal arrangements as established by regulations and laws. This lack of formal coverage includes various aspects such as regulations, commercial laws, fiscal obligations, labour laws and access to institutional infrastructure including financial institutions. Source: UNSD

Informal economies typically stem from the presence of micro-sized firms or a strategic navigation by firms to stay partially or fully outside the documented economy. Micro or very small firms are typically unregistered businesses having informal workers with low skills and low wages. As a result, such businesses and their workers do not have substantial savings due to their low income and because forced saving mechanisms like pension and insurance schemes are often not applicable. On the other hand, enterprises above a certain size and income, which have workers with relatively higher wages and skills, maintain a certain level of informality to evade high taxes and avoid regulations deemed to be burdensome. This contributes to low public savings and suppresses overall economic competitiveness, which in turn impairs growth in per capita income.[46]

In Pakistan, both micro/small enterprises with constrained income, and bigger enterprises that evade taxes and remain undocumented are common. Past surveys have revealed that small enterprises with an employment size between 1 to 4 employees make up 94 percent of economic establishments in Pakistan.[47] Relatively bigger and profitable industries also have substantial informality, as evidenced by the size of informal employment in manufacturing and wholesale/retail trade, which was estimated to be 20 and 31 percent of employed people in 2021.[48] Savings from these enterprises are thus likely to be invested in undocumented channels in order to mask actual incomes from business activities. This leads to savings in informal or non-financial avenues, such as real estate, gold and foreign currency.

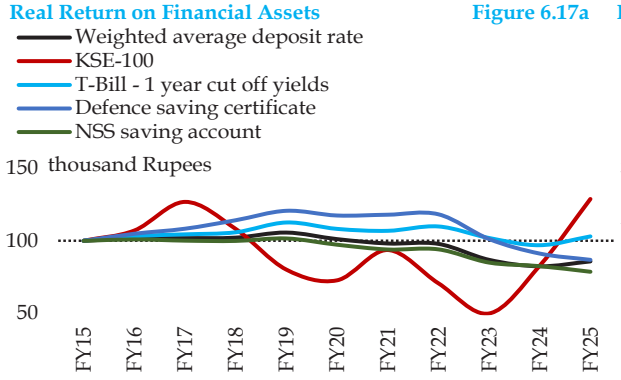
Regulatory and policy related distortions also encourage informal savings. The real estate sector has often been used as a means of tax avoidance, benefiting from incentives such as tax amnesty schemes. The inflows into the sector have been speculative in nature, rather than productive. A lack of regulation, transparency and an undervaluation of property by the government leads to under documented/undocumented transactions. This is in contrast to well-functioning real estate markets where there are centralized land registries, regulatory authorities and formal disclosures.[49]

The gold market similarly suffers from policy-related distortions. Stringent limits on formal imports leads to smuggling of gold into informal local markets. This also inhibits the growth of formal gold and jewellery markets and structures e.g. standards and certifications. Moreover, withholding tax (WHT) on banking transactions has encouraged cash holdings, promoting informality and savings outside the banking system. Earlier research also posits that some economic agents may have permanently moved away from using banking channels after the imposition of WHT, leading to financial exclusion.[50]

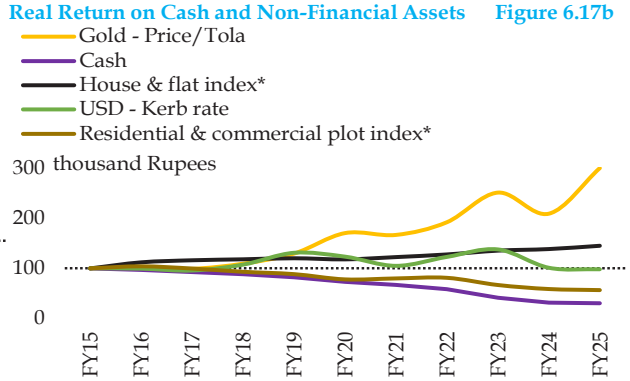
Another key reason why private sector savings is channelled into non-financial avenues is that they seem to offer higher real returns. Gold and real estate yielded better returns compared to financial savings between 2015 and 2025 (**Figure 6.17a and 6.17b**).[51] Whilst the USD is popularly perceived as a lucrative mode of saving, in reality it has not yielded positive returns in real terms during this period. Considering that high returns and safety are rated as the most important attributes by households,[52] the preference for saving in USD and cash might be driven by short-term motives of speculation, hoarding, and tax evasion.
In comparison to gold and real estate, real return on bank deposits remained negative during 2015-2025, with small positive returns in some years

[46] WB (2022a); Dabla-Norris et al. (2019)
[47] Source: Economic Census (2005); SBP (2025a)
[48] Source: Labour Force Survey 2021
[49] CCP (2019)
[50] Afghan (2023); SBP (2019); SBP (2025a); SBP (2017)
[51] Real returns are calculated using end of period values for each asset.
[52] SBP Household Saving Behaviour in Pakistan 2021; Mohammed and Burki (2008)

Real Return on Financial Assets **Figure 6.17a**



Real Return on Cash and Non-Financial Assets **Figure 6.17b**

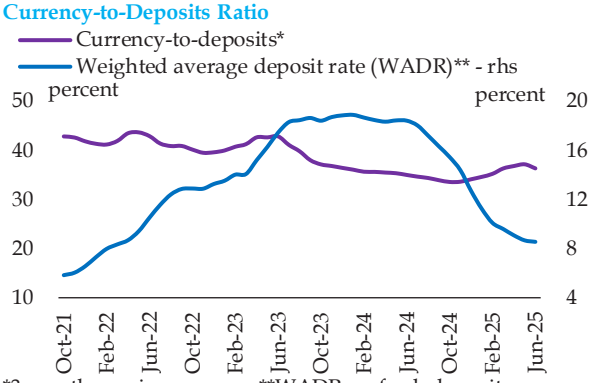


Note: Real (pre-tax) returns assuming initial saving of Rs 100,000 with returns (where applicable) reinvested every year.
*Zameen Index for Karachi, Lahore and Islamabad; 4.5% rental yield assumed for houses & flats.
Sources: Haver Analytics, PBS, SBP, MoF, Zameen.com and SBP staff calculations

during this period. However, despite this trend, higher returns on bank deposits have attracted savings into the banking system, and led to a decline in currency-in-circulation **(Figure 6.18)**. This echoes past research, which shows a strong positive relationship between domestic savings, and low inflation and positive RiR.[53]

Similarly, challenges in financial inclusion, such as difficulty of access and gender gaps, are major concerns. The SBP's Pulse Survey 2025 on Savings shows that 45 percent of non-financial savers found it easier to save in cash, gold or property and found the charges associated with FIs too burdensome.[54] These issues are compounded by low levels of financial literacy that impact the level of trust in financial institutions and markets among those who are financially excluded.

Monetary Tightening Cycle and Currency-to-Deposits Ratio **Figure 6.18**



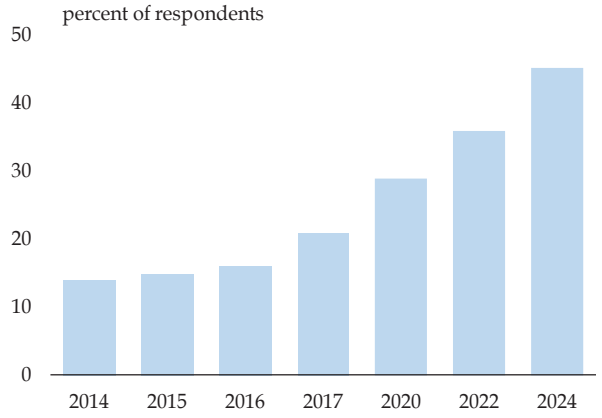
*3-month moving average; **WADR on fresh deposits excluding zero mark-up and inter-FI deposits
Source: SBP

The SBP's Pulse Survey on Savings 2025 shows that around 34 percent of respondents, who majorly save in non-financial avenues, cited low trust in the financial system as a major reason for saving mostly in non-financial avenues.[55] Literature suggests that financial illiteracy perpetuates people's weak trust over formal institutions,[56] leading them to channel their savings in informal non-financial avenues instead. Furthermore, the SBP Pulse Survey 2025 shows that the respondents with lower education (below matric) have stronger preferences to save in cash and Rotating Savings and Credit Association (ROSCAs) compared to those with higher education (matric or above). This signals a need to step up efforts towards access and literacy to further financial inclusion **(Figure 6.19a and 6.19b).**

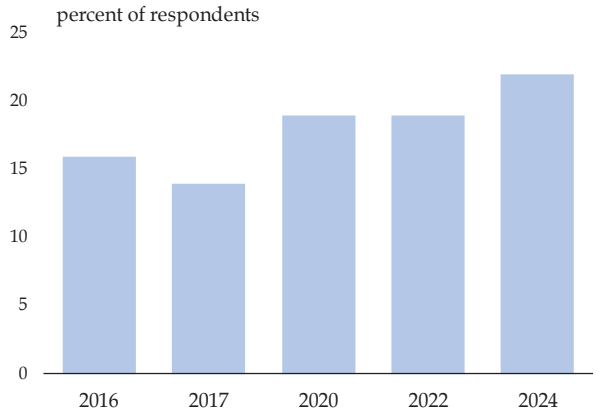
Lastly, there are complex and multidimensional reasons, such as cultural and gendered factors, behind preferences of informal saving avenues like gold, ROSCAs, and real estate.[57] Purchasing

[53] Vincelette (2006)
[54] SBP Pulse Survey on Savings, 2025
[55] SBP Pulse Survey on Savings, 2025
[56] Di Giannatale Menegalli and Roa (2016); Mohammed and Burki (2008)
[57] ROSCAs are informal saving mechanisms through which a group of individuals pool money in regular intervals and assign turns for each member to receive a lump sum; it is colloquially known as 'Committees' or '*Beesees*'.

Access to Financial Institutions Figure 6.19a



Financial Literacy Figure 6.19b



Source: Karandaaz K-FIS Survey; Various Issues

gold has deep cultural connections to marriage and female social security, especially in times of emergency. This security stems from greater autonomy and control over gold and jewellery, increasing its value in the context of social relations. Similarly, ROSCAs provide accessibility to women due to its use of social networks and reduced need for mobility. Informal savings function as safety nets, insurance products, and pension schemes in the absence of formal developed institutions for the same. For instance, research suggests that real estate may also be used as a means of securing an implicit assurance that children will stay and take care of parents in exchange for intergenerational transfer of property.[58] Liquidity at a short notice during emergencies are also a key motivation, which may drive demand for savings in livestock, cash, and ROSCAs, acting as informal substitutes for insurance products.[59]

6.4 Weak Financial Intermediation

Financial sector development is critical for sustained macroeconomic growth through enhanced formal financial savings, as it transforms dormant capital into productive investments. Developed financial systems reduce transaction costs, offer diversified saving instruments (deposits, bonds, insurance, etc.) and mitigate financial risks through regulatory oversight and deposit insurance, which further incentivises households and firms to save formally. Moreover, different financial institutions cater to a variety of needs and preferences of savers and investors and offer a number of financial services and products.[60]

Literature suggests that different types of financial institutions and financial markets complement each other. For instance, while savings through postal financial institutions help develop saving habit and culture, the banking sector provides foundational liquidity by attracting risk-averse savers through insured deposits and saving accounts. Banks then intermediate these funds into loans, fostering capital formation. Similarly, bond markets can enable long-term savings mobilisation for even up to 30 years. This funds necessary infrastructure and largescale industrial capacity enhancement while offering investment avenues for insurance and pension sector that has to plan for long-term payoffs. Finally, stock markets cater to high return seeking savers willing to absorb volatility. Together, these institutions and markets create a resilient and diverse system from which savers and investors of varying needs can benefit.[61]

[58] Kanth and Joubert (2025)
[59] Zulfiqar (2022); Mohammed and Burki (2008)
[60] Zhuang et al. (2009)
[61] Haini (2019); Levine (2005)

This section highlights the structural weaknesses in Pakistan's financial sector that hampers its intermediation role. The banking sector struggles with low savings mobilisation due to a number of economic constraints, whereas its credit function is affected by crowding out by government borrowing and an overall unfavourable macroeconomic and policy environment. Capital markets have a shallow base, limited investor participation, and governance issues, constraining long-term financing. The penetration of insurance and pension funds remains low mainly due to historical lack of policy focus, whereas the discontinuation of Pakistan Postal Savings Bank despite its vast rural outreach reflects missed opportunities for inclusion, unlike successful postal models in peer countries.

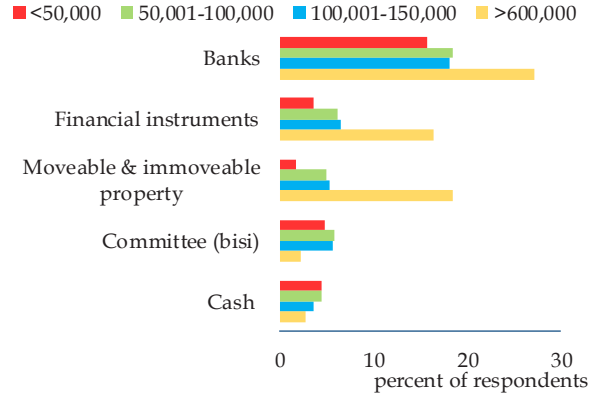
Banking Industry: Facing Barriers to Mobilising Savings

The banking industry dominates Pakistan's financial sector in terms of assets and liabilities, which makes it the largest mobiliser of domestic savings. It is also the most preferred financial institution for formal savings across income levels **(Figure 6.20)**. Over the last 40 years, the country's banking sector has seen significant infrastructural, policy and regulatory developments as well as digitization efforts that took place in the early 2000s.[62] However, there is still substantial room for improvement in the sector to become a vibrant conduit of financial intermediation.

On the deposit side, the number of bank accounts have more than doubled over the last ten years.[63] However, this growth has not notably increased the country's bank deposit-to-GDP ratio, which remains the lowest among peer economies **(Figure 6.21)**. In fact, bank deposits to GDP has been declining since FY21, which suggests that the growth in banking deposits does not commensurate with economic growth, and that the newly opened accounts may be for transactional purposes rather than savings.

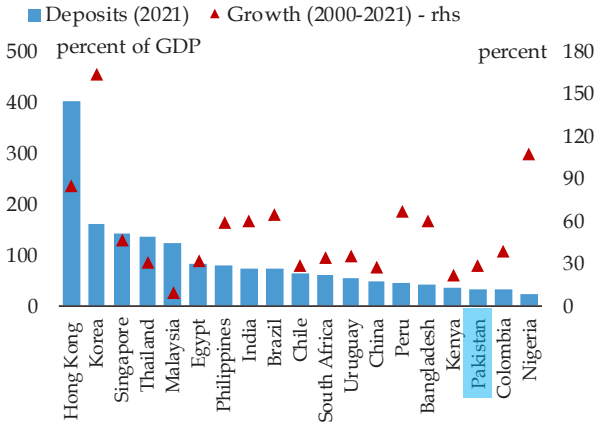
Moreover, the shifts in bank deposits' tenor composition reveal underlying changes in saving preferences and perceived economic risks. Recent data indicates a concerning decline in the proportion of term liabilities with tenures exceeding three years within the banking system's deposit mix **(Figure 6.22)**.[64] This signals a shortening of savings horizon, likely driven by economic uncertainty and unattractive returns. This trend has negative implications for the availability of stable, long-term funding necessary for fixed investment loans and gross fixed capital

Saving Avenue Preferences - Low to High Monthly Rupee Income Categories **Figure 6.20**



Source: SBP Pulse Survey on Savings 2025

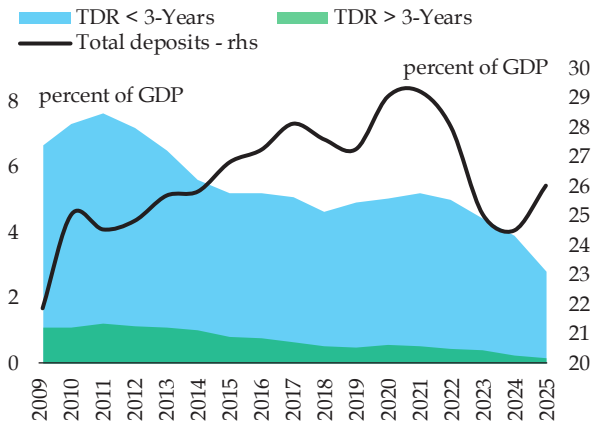
Bank Deposits by Country **Figure 6.21**



Source: WDI

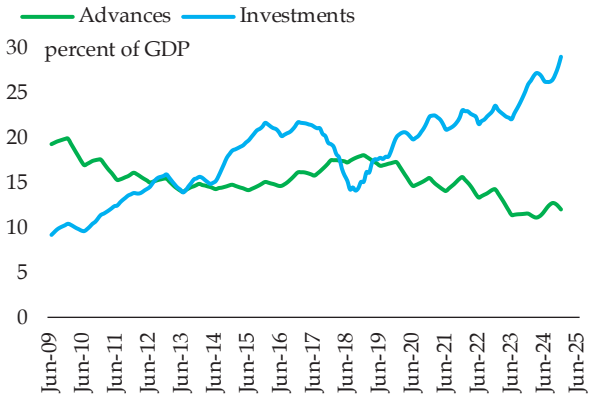
[62] Pakistan underwent interest rate liberalization, removed quantitative controls, privatized public financial institutions and introduced market-based securities in early 1990s and began its digitization journey in the early 2000s.
[63] The share of adult population with bank account rose from 16 percent in 2015 to 64 percent in 2023. Source: SBP (2025b)
[64] The proportion of longer-term savings within the overall GDS structure serves as an indicator of household and business commitment to long-term savings goals and reflects confidence in future economic stability. Source: Husain (2005)

Bank Deposits by Tenor **Figure 6.22**



Source: SBP

Advances and Investments of Scheduled Banks* **Figure 6.23**



* 6-month moving average

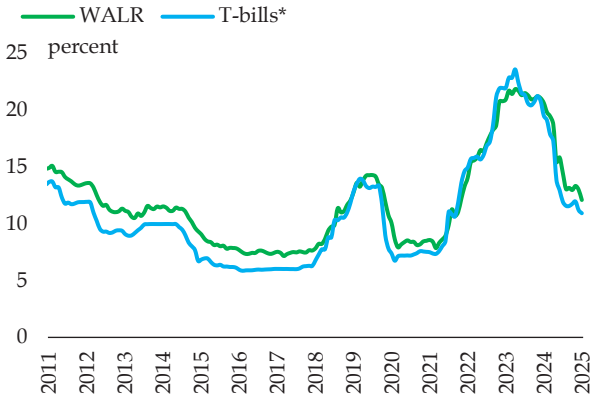
Source: Haver Analytics

formation, potentially constraining future productive capacity, limiting growth in income and savings.[65]

From the perspective of use of funds, it is clear that banks' asset allocation is overwhelmingly skewed towards risk free and high-yielding government securities **(Figure 6.23)**.[66] The risk-free returns on government securities have fundamentally altered bank incentives. This is evident from disappearing spread between weighted average lending rate (WALR) and the rate on treasury bills in recent years **(Figure 6.24)**. On the other hand, banks' advances-to-GDP ratio has been on a consistent decline since June 2019 and remains one of the lowest among peer economies.[67] On the whole, the banking sector has a significant intermediation gap, visible across agriculture, services and industrial sectors **(Figure 6.25)**. This lends credence to the view that whilst the banking industry's problems may be driven by sector-specific issues, they are also rather structural in nature.

From the perspective of demand side of funds, the government's budgetary borrowing to finance its frequently large budget deficits crowds out the private sector. Sovereign exposure between December 2015 and March 2025 averaged at 85 percent of scheduled banks' total investments.[68]

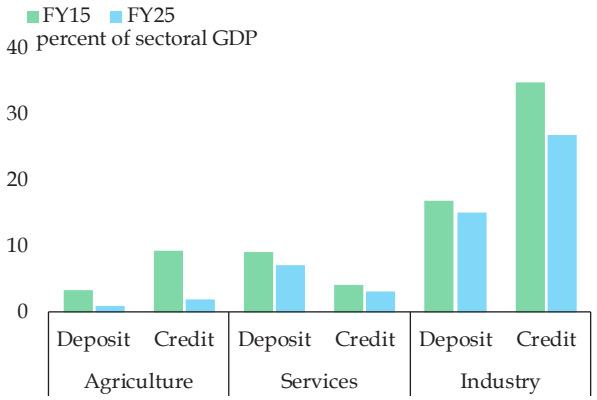
WALR and Return on Risk-Free Investment **Figure 6.24**



*Average cut-off rates of 3, 6 and 12 month T-bills

Source: SBP

Sectoral Deposits and Credit **Figure 6.25**



Note: GDP at current market prices

Sources: SBP and PBS

[65] SBP (2023); Khan and Qayyum (2006)

[66] Share of government securities averaged about 85 percent of total banks' investments between 2015-2025.

[67] Pakistan's private sector credit to GDP ratio has averaged around 14 percent in last 10 years compared to LMICs' average of 44 percent and LICs' 12 percent.

[68] SBP Statistical Bulletins (Dec 2015 to Mar 2025)

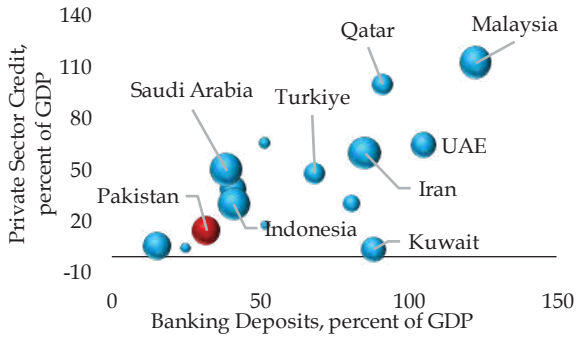
However, that is only one side of the picture. Historical data of loan applications suggest that the loan amount demanded by would-be borrowers is not substantially higher than the amount actually loaned.[69]

Credit demand for long-term investment is also constrained by an unfavourable macroeconomic environment amid declining potential GDP growth, uncertainty, and overall governance inefficiencies. In addition, there are some sectoral issues, such as those related to agriculture and housing loans that are affected by various supply-side concerns, including issues related to collateral, land titles /registry, land management, etc.[70]

On the deposit side, as **Section 6.2 & 6.3** showed, consistently low or negative real returns have disincentivised savings and eroded the real value of financial savings. As a result, households and businesses shift savings towards inflation-hedging assets like gold and real estate. In addition, the imposition of WHT on non-cash banking transactions between 2015-2020, and on cash withdrawals since 2023, penalizes the usage of the banking channel, especially for lower-income individuals and small cash-based businesses that are already sensitive to banking fees and charges.[71]

Lastly, a host of surveys suggest that religious reservations about conventional interest-based banking affect both credit and deposits of a sizeable segment of the population. For instance, the Knowledge, Attitude and Practices (KAP) survey conducted in 2015 found that around 7.5 percent of respondents had reservations about conventional banking products on religious

Banking Penetration and Islamic Finance **Figure 6.26**



Note: Based in 2021 data; size of the bubble reflects Islamic Finance Country Index with 1 being the lowest and 100 being the highest score.
Sources: Edbiz Consultancy and WB

grounds. Similarly, the Household Saving Behaviour in Pakistan (2021) found that 13 percent of respondents quoted religious concerns for voluntary exclusion from the banking system. Moreover, the SBP Pulse Survey on Savings 2025 showed that 35 percent of respondents saved informally due to religious concerns.[72] The country's Islamic banking has gained significant grounds in terms of its share in total assets and deposits of the banking industry, and is expected to continue doing so in the wake of the ongoing transition to a Riba-free banking system. However, Pakistan's low bank deposits to GDP ratio among Muslim majority countries with varying degrees of financial sector development suggests **(Figure 6.26),**[73] that habit formation may also be key to further financial inclusion in Pakistan.

Underdeveloped Capital Markets

A well-developed capital market plays a vital role in mobilising public and private savings, raising capital for non-financial and financial firms, and

[69] The difference between loan amounts demanded and accepted averaged about 0.26 percent of GDP during the last seven years. Even if one assumes that 50 percent of that were from technically sound loan applications (with acceptable credit risk profile) but were rejected in favour of government securities, the country's credit to GDP ratio would still have remained substantially lower than peer economies.
[70] SBP (2025a); SBP (2021a)
[71] Husain (2023); Kemal (2022); SBP (2025a); and SBP Survey (2021)
[72] Among other factors Lack of Awareness contributed 4 percent, 1.5 percent quoted Cost of Commuting to Banks, Cultural reasons were identified by 3 percent and Other reasons had a 2 percent share (Saleemullah et al. (2015); Zaman et al. (2017); Awan and Bukhari (2011); Household Saving Behaviour in Pakistan 2021; SBP Pulse Survey on Savings 2025
[73] The Islamic Finance Country Index incorporates number of institutions in Islamic finance industry, outstanding Sukuks, central Shari'a supervisory regime, regulatory and legal infrastructure.

channelling savings into productive uses. Capital market development can contribute to economic growth, with the primary channel being the efficient allocation of investment, enabling higher economy-wide productivity. It also complements the banking and insurance industries by enabling them to raise capital, allocate funds, and diversify risks. Moreover, a developed bond market for government securities can help reduce debt-service costs over the medium to long term.[74]

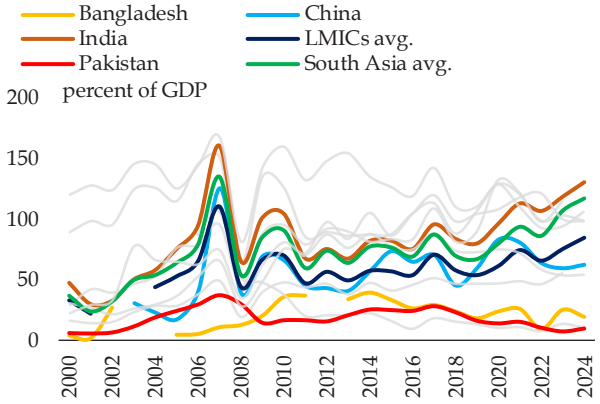
Pakistan's capital markets remain underdeveloped, and face a host of structural, regulatory and policy challenges amid concerning trends in market depth and access.[75] The capital markets' depth has declined, reaching levels on par with LICs average and falling below EM average.[76] For instance, the total market capitalization of Pakistan Stock Exchange (PSX) is significantly lower than that of regional and peer economies **(Figure 6.27).**

Similarly, stock trading in Pakistan is significantly lower compared to regional peers and countries with similar income levels **(Figure 6.28).** While market access —the ability of individuals and companies to access capital market services— has improved over time, it remains limited compared to EMs and LICs, suggesting high barriers to entry for investors, businesses and foreign entities.[77]

The primary markets for equities remain resource-constrained due to fewer yearly Initial Public Offerings (IPOs). The number of listed companies has declined from 725 in 2002 to 525 as of December 2024 (SBP, 2003; PSX, n.d.). Furthermore, from 2014–2023, only 43 companies raised capital at the PSX, compared to 76 IPOs last year alone in India (KPMG, 2024). Chaudhry (2019) notes that firms are averse to public listing due to fears of taxation, audits and disclosure requirements. This aversion, coupled with the cost of IPOs, has hampered the number of IPOs and the growth in amount of capital raised **(Figure 6.29).**

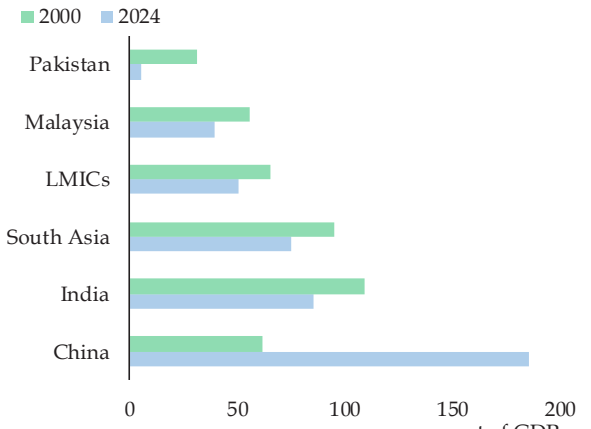
In the case of bonds, government-issued papers dominate the bond issuances, with corporate bond issuances remaining limited in comparison to peer economies **(Figure 6.30)** (ADB, 2022). Owing to lack of a vibrant bond exchange, the government is also unable to finance its budget deficit through the market, and instead mainly relies on banks.[78]

Market Capitalization of Select Regional Economies **Figure 6.27**



Sources: WB and MoF

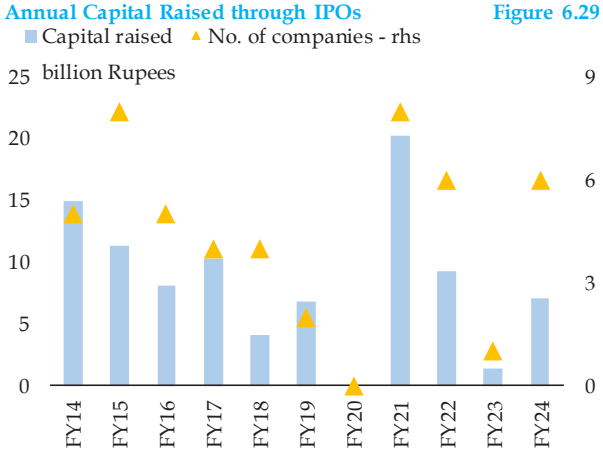
Stock Traded - Total Value **Figure 6.28**



Source: WB

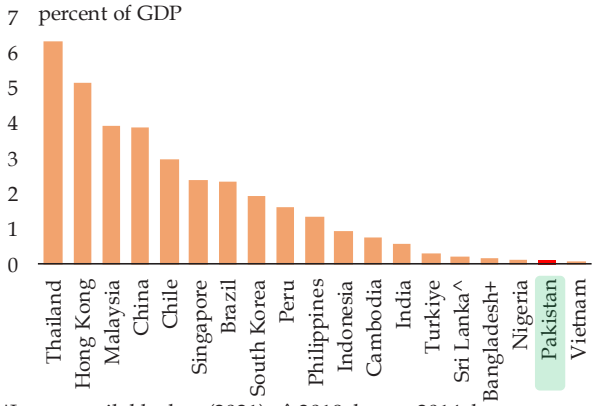
[74] Gregorio and Guidottim (1995); Estrada et al. (2010); IMF (2001)
[75] PIDE (2020)
[76] Market depth is assessed through market size and liquidity indicators such as stock market capitalization, stocks traded, international public debt securities, total debt securities of financial and nonfinancial corporations to government as percent of GDP.
[77] Capital market access is composed of the percent of market capitalization outside of top 10 largest companies; and total number of issuers of debt.
[78] WB (2023); WB (2022b); Uppal (2011)

Annual Capital Raised through IPOs **Figure 6.29**



Source: SECP Annual Reports

Corporate Bond Issuance Volume* **Figure 6.30**



*Latest available data (2021) ; ^ 2019 data; + 2014 data

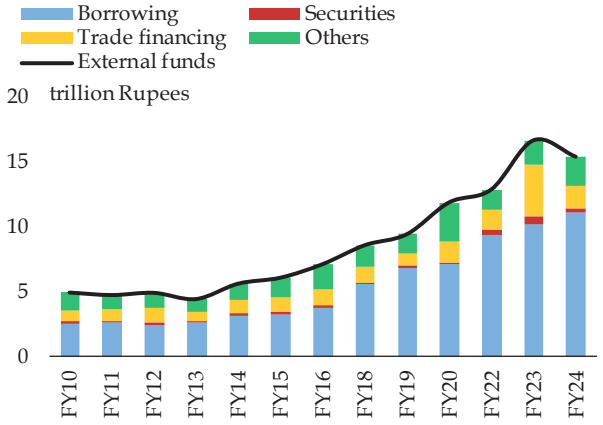
Source: WB

Firm level data also suggests that the bond market remains shallow, as companies predominantly prefer bank borrowing over the issuance of corporate debt securities, such as Term Finance Certificates (TFCs) and commercial papers **(Figure 6.31).** This preference is primarily driven by the high transaction cost associated with the primary issuance of corporate debt and the availability of funds from banks at favourable rates, particularly for firms maintaining long-term banking relationships. Additionally, the secondary bond market of TFCs is shallow due to a small number of issues; hesitancy among investors due to a lack of experience in trading bonds; and an absence of competition (Rehman and Khilji, 2017).

Moreover, in high-interest rate environment the preference for corporate debt as well as equities wanes in favour of government securities. Recent data on mutual funds' assets-under-management indicates that during periods of elevated interest rates, investments in government debt significantly overshadow those in corporate debt and equities **(Figure 6.32)**. The pronounced responsiveness of corporate bond and equities to interest rate movement underscores the critical role of macroeconomic stability in fostering capital market development.

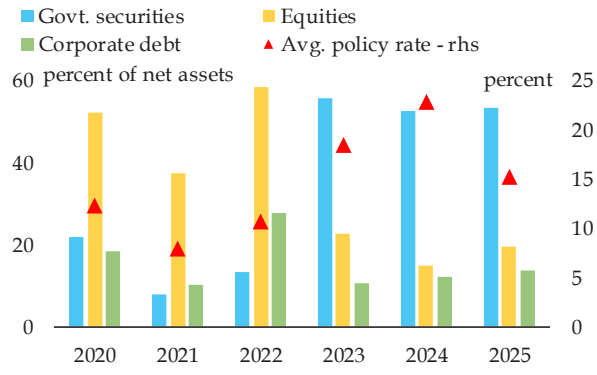
The capital market is also underdeveloped due to narrow investor base that hinders market liquidity. Low capital market penetration is striking, with only 5 retail investors per 1000 adults in Pakistan compared to Malaysia's 105, Thailand's 48, India's 33, and Bangladesh's 25 (SECP, 2020). While the mutual funds industry has seen notable growth in active unique investors, it still represents a relatively small

Sources of Corporate Funds **Figure 6.31**



Source: SBP Flow of Funds

Asset Allocation of Mutual Fund Industry by Asset Classes **Figure 6.32**



Note: Allocation ratio excludes cash from net assets

Sources: MUFAP and SBP

segment of the country's overall financial sector. Institutional investors, such as mutual funds and insurance companies, dominate the investor base. They exhibit a buy-and-hold strategy, stifling liquidity in the secondary market.[79]

Moreover, the investor base is thin amidst low levels of awareness and capital market literacy.[80] Pakistan's capital markets lack independent financial advisors who can guide investors effectively and impartially. Globally, independent advisors play an important role in expanding outreach and enhancing investor awareness.[81]

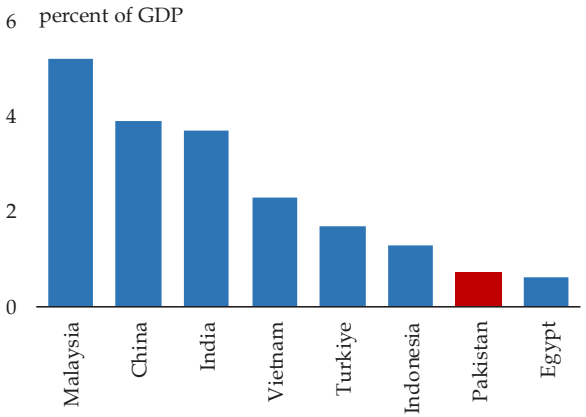
Governance and transparency issues have also dampened investor confidence in capital markets, further undermining its effectiveness and inclusivity (Khan and Rehman, 2021). Institutional investors and high net worth individuals have low trust in the market due to the legacy reputation issues, stemming from fraudulent broker activities, including defaults during 2000-2010. The stock market is dominated by a few large brokerage houses and their actions have substantial effect on the performance of the capital market. There is a perception that despite the demutualization of the stock exchange, a few big brokers still have significant influence. Moreover, insider trading is not properly regulated, leading to retail investors being at a disadvantage.[82]

Low Uptake of Insurance and Pension

The insurance and pension industry is an integral part of the formal financial system given its strong links with banks, capital markets, public and private sector borrowers, as well as individuals and corporations. Their large and often long-term investments make them a source of stability for the financial system, and a source of deficit financing for governments. They are also important for banks as sources of equity and long-term debt capital. For individuals and corporations, the insurance and pension industry act as a means of forced savings, protection against business/operational risks, personal health shocks, and income support for post-retirement years.[83,84]

In Pakistan, the insurance industry has low penetration. The country's insurance premium as percentage of GDP, at around 0.7 percent, is one of the lowest among peer economies (**Figure 6.33**). Insurance density also presents a similar picture, at around US$ 14 per capita in 2022, compared to US$ 82 in India and US$ 134 in Turkiye. The percentage of insured vehicles is also very low at 3 percent, compared to 89 percent in Uganda, 73 percent in Sri Lanka, 43 percent in India and 36 percent in Bangladesh.[85] Because of this underperformance, a vital source of long-term

Insurance Premium in 2023 **Figure 6.33**



Source: Swiss Re Institute Sigma 03/24

[79] Abbas and Badshah (2017)
[80] Despite the SECP's Jamapunji awareness program and the establishment of PSX Knowledge Center, which provides investment courses, awareness webinar, and invaluable insights from market experts, the number of unique investor remains small.
[81] SECP (2020)
[82] PIDE (2020)
[83] ECB (2009)
[84] For most of human history, support of elderly was through intergenerational family assistance as well as joint and extended family systems. However, owing to economic and social transformation, the support for elderly is gradually waning even in countries like Pakistan, having collapsed in Europe, and other highly developed economies much earlier. Longer life span and fewer children is also contributing to this trend, thus furthering the importance of insurance and pension schemes. Source: Mamun and Hossain (2022)
[85] CCP (2025); SECP (2025)

savings is negligible, impairing the growth of investments at a macro level, and leaving households susceptible to shocks.

There are several reasons behind the current state of insurance and pension in Pakistan, the foremost of which relates to the regulatory environment. Countries that have succeeded in insurance reforms have done so by making insurance and pension mandatory.[86] For instance, in several countries around the world, driving a vehicle is not possible without motor insurance. In Pakistan, the law on third party motor insurance exists but is not adequately implemented, owing to which the percentage of insured vehicles is negligible.[87]

Similarly, labour insurance is only compulsory for relatively larger businesses, whereas literature suggests that a bulk of businesses that are liable to insure labour through EOBI or provincial Employees' Social Security Institutions (ESSIs) evade that responsibility due to ineffective implementation. The coverage of mandatory health insurance is also not sufficiently wide, nor implemented across the board.[88]
With the exception of some recent state level programmes, such as the Sehat Sahulat Program, insurance and pension has lacked government focus, and is still not sufficiently embedded in macroeconomic policy. For instance, policy to curb informality is primarily seen from the lens of taxation, rather than insurance or social security i.e. protecting millions of workers that remain susceptible to a variety of shocks such as health and income shocks, accidents of moveable or immovable property, etc.[89,90]

From an institutional perspective, the industry lacked government policy focus in the past. Until 2000, the industry was governed by the Controller of Insurance at the Ministry of Commerce, leading to fragmentation, and operational inefficiencies. In 2000, regulatory authority of insurance was transferred to SECP, which has since issued various rules, regulations, guidelines and directives.[91]

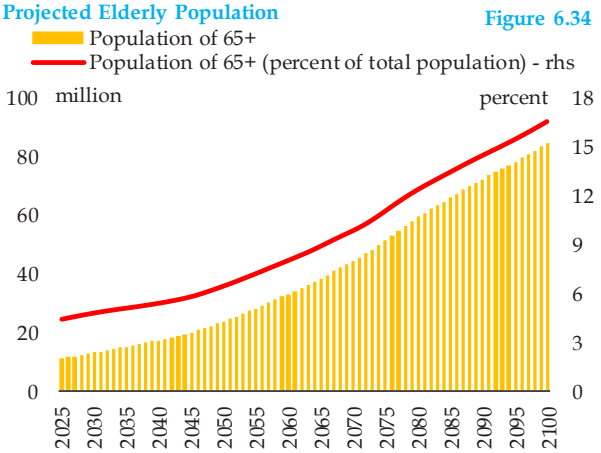
Another reason for the low penetration of insurance and pension is a lack of awareness. For instance, a majority of vehicle owners consider motor vehicle insurance as an unnecessary expense and have disregard for financial and legal consequences, especially if they have never been in an accident.[92] Moreover, fatalistic mind-set prevails in large segments of society, which along with religious concerns, is major constraint to the take up of insurance and pension.[93]

Insurance and pension is not necessarily a product that people desire. It is something that they need.[94] The state will eventually have to provide for those needs. It should do that by developing a

[86] The bulk of non-life insurance in Pakistan is driven by banks (which require borrowers to insure their cars, plants, etc.) and exporting companies whose foreign buyers often demand labour insurance under fair purchase policies. Therefore, since bank lending is concentrated in large enterprises, small scale enterprises are not forced to seek insurance.
[87] Mahmood and Nasir (2008); SECP (2023a); Mamun and Hossain (2022)
[88] Ibid.
[89] According to LFS 2021, 72.5 percent of non-agricultural workers employed in the country are in the informal sector, with informality of labour in urban areas standing at 68.5 percent. Source: PBS (2021)
[90] An important evidence for low embeddedness of insurance in public policy is in the case of disaster management and agri-insurance. The cost of largest natural disasters is retained on government books and only negligible disaster risk insurance instruments has been set up. The limited insurance is not even inclusive with most of the premiums coming from corporate sectors, which remain the largest beneficiary of disaster risk insurance coverage (UNDP, 2024). Moreover, high level of unpredictability of disasters creates unwillingness on insurers' part, while the lack of certainty around insurance pay-out particularly in agri-insurance remains to be the key challenge in the development of disaster insurance market.
[91] CCP (2024); This transfer of regulatory authority to non-banking financial regulatory authority is in line with institutional practises in Asia. However, some economies, such as India, Bangladesh and Sri Lanka have created independent insurance development and regulatory authorities. Source: NRF (2024)
[92] SECP (2023a)
[93] Waheed (2009)
[94] According to SBP Pulse Survey 2025, 67 percent of respondents who saved said their main purpose of saving was precautionary for income/health shocks, and 42 percent said they were saving for retirement. This suggests a latent demand for insurance and pension products.

well-planned insurance and pension industry, rather than through public charity and social safety nets. The bulk of Pakistan's population is currently young, and given its current growth trend, it may continue to be so in the future. However, in 30 years, the share of individuals who are 65 years or older is projected to rise from 4.3 percent of the total population to 7.2 percent (**Figure 6.34**).[95] This would equal around 28 million people.[96] Given annuity accumulation is a relatively long-term process, Pakistan's insurance and pension industry needs active development to be able to cope with these projections.

Projected Elderly Population **Figure 6.34**



Source: UN Population Division

A host of legal and regulatory reforms are required, foremost of which is the expansion and enforcement of compulsory insurance and pension. Country experiences show that such measures require close coordination with provincial governments, because of their key role in implementation. For example, India, which had relatively low motor vehicle insurance in 2018, saw a significant rise when State and Union territories started periodical checks for insurance cover, and detained non-compliant vehicles.[97] Similar reforms are needed in other insurance and pension markets, such as the EOBI and provincial ESSIs.

These reforms need to be complemented with a vibrant bond market for both government and private sector debt securities of longer tenors. This is important because insurance and pension industries have lifetime pay-outs, which require investments in bonds with long time horizons. This may also be a good opportunity for the government's debt office, as around 85 percent of the insurance industry's investments were in government paper as of 2023.[98]

The industry's development also requires awareness campaigns to address cultural and religious misconceptions and raise public knowledge about the benefits of insurance and pension products. In this regard, Takaful's growth in the last 19 years appears to be promising. Having started in 2006, general Takaful already has an 11 percent share in the non-life insurance industry, and following the Federal Shariah Court Decision and Economic Transformation by 2027, the SECP is making efforts to further expand Takaful's share in the market.[99]

Postal Financial Services: Missed Potential in Financial Inclusion

Postal networks continue to play a vital role in enhancing financial inclusion and mobilising household savings globally, particularly among rural, low-income, and traditionally underserved population. The effectiveness of postal banks lies in several common traits: government-backed security, widespread accessibility, low-cost entry, and public trust. Even when their contribution to a country's total financial savings is low, postal financial services play a key role in promoting the habit and culture of saving. In countries like Japan, India, China, and France, postal savings institutions do not only mobilise large-scale public

[95] SBP staff calculations based on UN Population Division.
[96] For context sake, the old age population in 30 years is expected to be more than entire current population of Sri Lanka, and around thrice the current number of BISP beneficiaries (9.87 million beneficiaries up to 31st March, 2025). Source: UN Population Division; MoF (2025).
[97] SECP (2023a)
[98] SECP (2023b)
[99] SECP (2025)

Postal Saving Bank (PSB) Models in the World **Table 6.2**

Name of PSB Model	Banking Powers	Ownership/oversight	Role of Post Office (PO)	Credit Function	Example Countries
Postal Savings department/ Bureau	No	Postal Dept.	Full operational base	No	China (pre-PSBC)
National Savings Org + PO Savings Bank	Partial	Govt. & Postal Dept.	PO provides operational base and outreach to National saving organization	No	Pakistan (till 2021-22), India
National Savings Bank Model	Yes	Independent from Post office	PO works as agent for PSB	Yes	Sri Lanka
New Postal Start-ups in Transition	Limited	Transitional (various arrangements are being made under government or Post offices)	Currently evolving	Rare	Mongolia, Laos
Post Bank Model	Yes	Banking corporation with an independent board under the central bank regulations	Provides full banking services	Yes	Japan, Korea, Germany, China (after PSBC)

Source: Scher and Yoshino (2004)

savings but also supports economic development in rural and underserved areas.[100]

For instance, Japan Post Bank (JPB), one of the world's largest postal savings institutions, holds about 20 percent of Japan's household deposits through a combination of liquid and term saving products backed by government guarantees. In China, the Postal Savings Bank of China (PSBC)—institutionalized in 2007 but rooted in a legacy of postal savings since 1919—manages an estimated 10.7 percent of household personal deposits. In France, La Banque Postale—Postal Saving Bank operating under La Poste— had 10.8 percent of its household saving deposits in the country in 2024. India Post Payments Bank mobilised an estimated 2 percent of India's household savings deposits held with all scheduled commercial banks in 2023, despite having an upper cap restriction on one of its Regular/Premium savings account. Nevertheless, it has played a key role in habit formation.[101]

Globally, various postal financial service models have been adopted, and have evolved over time. For instance, Japan and China initially operated under postal service departments with limited mandates—primarily collecting deposits without offering credit. However, both countries restructured their postal financial models in 2007, transitioning their postal organizations into fully licensed banks under central bank regulation, enabling them to provide both savings and credit services **(Table 6.2)**.

In Pakistan, the Pakistan Post Savings Bank (PPSB) worked as a department of the Pakistan Post prior to its closure in 2021–22. The PPSB played a significant role in advancing financial inclusion and mobilising national savings, particularly for underserved populations. At the time of its closure, PPSB had around 1.9 million individual savings accounts, compared to the average of 5.7 million (savings accounts) of 35 scheduled banks.[102] It held around Rs 108 billion in deposits, and an additional Rs 12 billion in savings certificates.[103] While this was below the scheduled banks' average savings deposit of Rs 234 billion, it still reflects sizeable resource mobilisation, considering that PPSB was able to garner this amount from diverse and underserved segments and geographies.

In 2021, PPSB was offering both account-based and certificate-based saving products only through its 2,783 main branches/sub-offices—in

[100] Ahmed et al. (2020); UPU (2023); WB (2021); WB (2006); ADB (2018)
[101] JPB (2024); PSBC (2024); La Poste Group (2024) and BdF (2024); RBI (2023); MoF (2024)
[102] PP (2022); SBP (2021b)
[103] Pakistan Post managed Rs 108 billion in savings bank deposits for the Government of Pakistan, while Rs 12 billion in savings certificates were held on behalf of CDNS.

mainly urban clusters—of Pakistan Post. These main branches/sub-offices were more than the branch network of any scheduled bank in 2021, or even today. This extensive reach positioned PPSB as a key instrument for promoting savings. These main branches/sub-offices are a part of Pakistan Post's large physical infrastructure comprising of 13,419 branches, 87 percent of which are located in rural and semi-urban areas. This gives Pakistan Post the most extensive geographic footprints in the country. The size of its entire branch network was equivalent to the combined branch network of Pakistan's 15 largest banks in 2021.

With adequate policy support, targeted investment, and institutional restructuring to transform PPSB into the Postbank Model, this vast branch network could have been strategically leveraged to offer savings products all across the country. However, it was unable to evolve to that stage, due to concerns by the Financial Action Task Force (FATF) regarding AML/CFT compliance, citing the lack of digitised financial transactions within the PPSB. In response, and to mitigate the risk of remaining on the grey list, the Government of Pakistan decided to phase out PPSB and directed Pakistan Post to transfer depositors' savings to the Central Directorate of National Savings (CDNS). [104]

Building on PPSB's historical role and extensive outreach, its operational discontinuation underscores critical institutional and regulatory gaps that demand targeted reform. Chief among these is the digitalization of Pakistan Post's vast branch network. This will help address the long-standing compliance concern by FATF. For this, Pakistan Post (in 2015) had initiated a project for its automation with the support from a loan provided by the EXIM Bank of Korea obtained in 2022.[105] In this regard, it might be worthwhile to consider complementing Pakistan Post's digitalization with a shared KYC portal to help streamline processes and offer greater ease to consumers across all financial sector touchpoints.

However, digitalization efforts need to be complemented by structural governance reforms. This may include restructuring of the PPSB itself, such that it leverages Pakistan Post's physical infrastructure, but reports to the Ministry of Finance instead of Ministry of Communications. The latter may help anchor PPSB within a more relevant and credible policy and regulatory framework. Over time, with focused efforts, such as digitalization and improved governance, PPSB may also be transformed as a dedicated banking or non-banking financial institution under respective regulations.

6.5 Final Remarks

Pakistan's low domestic savings has been a consequence of an unfavourable macroeconomic environment, market and policy distortions, and inadequate focus on development of financial markets. Pakistan's per capita income has not grown consistently, with frequent episodes of high inflation eroding existing savings. This has been exacerbated by market distortions and an underdevelopment of the formal financial sector, which have inhibited the growth of financial savings, leading to mushrooming informal markets that have been largely speculative and unproductive. In the absence of strong domestic savings, Pakistan has been over-reliant on foreign savings, fuelling periods of high but unsustainable consumption-led growth.

Pakistan's domestic savings is the lowest among the cohort of countries with similar macroeconomic characteristics— such as low middle income, low levels of financial development, and high inflation, youth dependency and informal economy. This reflects both an interplay of these macroeconomic

[104] Pakistan was placed on the FATF grey list in June 2018, with over 40 recommendations—14 of which concerned Pakistan Post. To avoid FATF grey list, the Government of Pakistan in November 2020, decided to close the Savings Bank operated by Pakistan Post and initiated its transfer to the Central Directorate of National Savings (CDNS).
[105] MoF (2023)

characteristics as well as a weak culture and habit of savings. Either way, it is important that the state takes holistic and urgent policy measures to increase savings. The growth in savings can be driven by a consistent rise in per capita income, stable prices, and greater public sector savings. These must be complemented with key structural measures, such as slowing the pace of population growth, reducing youth dependency and investing in human capital.

In addition to these socio-economic factors, a policy focus toward formalising the economy, and savings is paramount. Anecdotal evidence and estimates indicate the presence of a sizable informal economy, with a commensurate pool of informal savings. These are the result of various perverse incentives and policy distortions that drain the formal economy of key drivers of growth, such as loanable funds to the private and public sector. To channelize these funds into the formal sector many interventions are needed, chief of which are enhancing the presence and penetration of financial sector.

Policy focus is needed to improve the attractiveness of financial savings in terms of returns, accessibility and ability to adapt to the needs and motivations of diverse working age population. As things stand, a lack of agility and innovation is illustrated through a low and falling bank deposit to GDP ratio that has not kept pace with peer economies. Similarly, capital markets remain shallow with a small investor base and a limited number of equity and debt financing activities. Likewise, low insurance premium to GDP, compared to peer economies, also showcases the lack of penetration of formal financial saving institutions.

Formal financial savings can be increased through systematic reforms and innovations in each of these financial markets. For example, postal banking illustrates great potential in tapping into underserved areas for formal saving. The past record of PPSB, along with successful models of postal saving institutions in many countries should provide the impetus to accelerate GDS growth, and develop a habit of savings. Cross-country examples also show the importance of forced savings —such as compulsory insurance and pension schemes —to promote a culture of savings in the economy.

Moreover, there is a need to develop a market for financial advisors and planners who consult on financial planning decisions across asset classes. Additionally, the banking sector must move away from lazy banking, and instead work towards credit, and deposit mobilisation. Both of these areas require greater real returns offered by the banking sector and an expansion of banking services/products. Tax policy distortions, such as WHT on the banking sector, also have to be rolled back to accelerate financial inclusion.

Ensuring a consistent growth in savings requires a concerted policy effort, underpinned by deeper understanding about saving behaviours. In addition to resolving the multiple distortions that combine to hamper savings in Pakistan, attention should also be paid to qualitative factors that underlie saving culture and behaviours. In the context of Pakistan's informal economy, there is a need to reconsider the policy mind set. Instead of mainly focussing on punitive measures, market distortions and disincentives to formal economy must be removed.

It is equally crucial that facilitative steps are taken to incentivise formal savings, rather than increasing the appeal to save or speculate in informal non-financial markets. To this end, key policy and regulatory reforms in real estate and gold markets can reap dividends. This can be aided by innovations, such as fractionalised instruments for gold and real estate (e.g. Real Estate Investment Trust (REIT) and gold funds). In this regard, it is important that a holistic savings roadmap is created which details key long-term steps to grow domestic savings. This must be supported by micro-interventions to raise financial literacy, create saving culture, improve accessibility, and trust in formal financial services, to be able to consistently enhance domestic saving in Pakistan.

Box 6.1: Official Measurement of Savings in Pakistan: Methods, Challenges and Peer Practices[106]

Measuring savings is conceptually straightforward but empirically challenging. The difference in institutional capacity; data limitations; and classification practice across countries make cross-country comparison difficult. For this reason, this Box compares various methodologies to compute savings, while identifying the challenges to its measurement. It also identifies best practices in peer economies, consideration of which can improve the data generating process.

There are two main methods of computing national savings in any economy. The first, is called Commodity Balance Methodology (CBM), which measures aggregate savings based on national and current accounts; and the second method is Capital and Financial Balance Methodology (CFBM) which, as the name suggests, computes savings as the change in net wealth derived from the Flow of Funds Account (FFA). Theoretically, final estimates from both methods ought to reconcile. However, in practice, in several economies, the estimates from both methods differ—sometimes by wide margins—as capital transfers and capital gains and losses from inflation and exchange rate remain unaccounted for in CFBM method in many cases.

Commodity Balance Methodology**:** The CBM method relies on two saving identities. As per the first identity, gross savings is measured as per the System of National Accounts (SNA 2008), which defines gross national savings as the proportion of disposable income not spent on final consumption.[107] As per the second identity, gross national savings are measured as gross capital formation minus foreign savings (the reverse of current account balance),[108] with the latter taken from balance of payments data. The domestic savings are then calculated by subtracting net factor income from abroad (NFI) from national savings. Public savings is the addition of public investment (i.e. GCF minus gross private capital formation) and overall fiscal balance.[109] Finally, private savings is just the residual between gross domestic savings and public savings. Therefore, the way in which public savings is estimated is of crucial importance.

Capital and Financial Balance Methodology: This method is based on the notion that any sector's net savings must be reflected in the accumulation of some capital and financial assets; thus the aggregate savings can be computed by tracking the sectoral accumulation of the assets. Relying on FFA, this method imposes significant data requirements and costs, including detailed information on balance sheets of households, the non-financial sector, financial corporations, the general government, and the rest of the world.[110]

The FFA presents each sector's accumulated financial assets and liabilities, the balance of which is the sector's net lending and borrowing.[111] The capital account presents the accumulation of non-financial assets that makes up the difference between a sector's net lending and borrowing and its savings. Thus net lending based on financial account coupled with data from the capital account, provides an independent estimate of sectoral savings.

Key challenges to measuring savings in Pakistan: The measurement of macro variables such as national income, consumption and investment is beset with various challenges, which cause underestimation of income and, as a result, underestimation of national savings. This is despite recent improvement in compilation and estimation techniques of national income accounts.[112] In practice, Pakistan measures production directly, and then estimates final consumption as a residual. Because total consumption is a large item, the residual approach to measure

[106] The box draws heavily on Schmidt-Hebbel, K., & Servén, L. (1999). Developing detail methodology for measuring savings, it discusses both conceptual and practical challenges in estimating savings in typical developing economies such as Pakistan.
[107] UN (2009)
[108] The current account balance reflects the saving–investment gap in an economy. When investment exceeds national savings, the shortfall is financed through foreign savings. Thus, the current account balance is equal in size but opposite in sign to foreign savings: a deficit signals a net outflow of resources matched by foreign financing inflows, while a surplus indicates the reverse.
[109] The implication of public savings identity is if the levels of public investment or gross public capital formation remains the same, the increase in fiscal deficit will erode the savings; in some peer economies, public savings are directly computed using current government receipts minus current outlays. MoSPI (2007)
[110] Schmidt-Hebbel, K., & Servén, L. (1999)
[111] Flow-of-Funds accounts (FFA), as typically produced by central banks, distribute savings (estimated by PBS) across sectors. The FFA has two accounts: financial and capital.
[112] PBS (2023)

consumption materially affects measured savings. Moreover, since direct estimates of savings are lacking in Pakistan, unlike in India, a double residual approach is employed for gross national savings. First, national savings is estimated as a residual (using CBM) after subtracting final consumption from disposable income. Subsequently, another residual is calculated to arrive at private and household savings by subtracting public savings (which is a known number) from national savings.

There are also various limitations to practicing the CFBM in Pakistan. In the financial account, corporate and government savings are estimated from banking sector and data of public listed companies, and fiscal data, whereas household savings — which forms the largest share of Pakistan's GDS—continue to be measured indirectly as a residual between gross national savings estimates and corporate and government savings estimates from financial accounts, highlighting the limitations of the current statistical infrastructure. Additionally, the capital account is made to be consistent with the savings data from the commodity balance accounts, due to the absence of independent estimation of non-financial assets flows.[113]

Beyond statistical limitation, the measurement of savings is further complicated by deep-rooted structural challenges. The presence of large informal economy in Pakistan; inadequate public sector coverage; tax-evasion; and illegal activities cumulatively lead to substantial under-estimation of income and, thus, savings. Moreover, the unreported large-scale outflow of private capital adds to measurement problems of private and national savings, as does the misinvoicing[114] of imports and exports (Kazmi, 2001). In some periods, the official statistics on corporate savings have also relied on fixed assumption, such as setting corporate savings at 2 percent of GDP, constraining accuracy.[115]

Comparative insights from peer countries: Experience from peer countries offer useful lessons for improving Pakistan's approach. India, with a more robust framework, splits the responsibility for estimating savings between India's National Statistical Office (NSO) and the Reserve Bank of India. The division of responsibility across agencies reduces administrative burden on any single institution. Moreover, Indian agencies track sectoral transactions to directly estimate savings as against the indirect method used in Pakistan. For instance, household savings are independently estimated as the sum of financial savings.[116,117]

Similarly, New Zealand's approach to measurement of savings relies heavily on the regular use of surveys that complement national income accounts. This includes the triannual Household Economic Survey that provides detailed micro-level data on income, expenditure, assets, and liabilities, which help refine and validate national saving estimates. In addition, New Zealand's Annual Enterprise Survey, and Population Census (conducted every 5 years) gauges sectoral corporate performance and household physical assets respectively, which translates into more accurate corporate and household savings estimates (Gorman et al., 2013).

Despite the limitations of Pakistan's approach, savings estimates remain indispensable. They provide the only official measure to capture the capacity to mobilise domestic resources and savings-investment gap. These statistics are central to policy analysis and offer crucial insights into determining how much of national investment is financed domestically as against foreign capital inflows.

* *The contribution of Abdul Jabbar is acknowledged in writing this box.*

[113] Schmidt-Hebbel, K., & Servén, L. (1999)
[114] Qureshi & Mahmood (2015) finds that under-invoicing of imports is mainly motivated by the desire to evade import tariffs, whereas over-invoicing is mainly for the purpose of flight of capital. Similarly, under-invoicing of exports is mainly to shift taxable income out of the country, whereas over-invoicing of exports is mainly for the purpose of availing export subsidies and tax credits from the government.
[115] SBP (2013)
[116] The investment in financial savings comprises currency, net deposits, shares and debentures (including mutual funds), net claims on the government in the form of small savings, investment in central and state government securities, life insurance funds and provident & pension funds.
[117] MoSPI (2007)

Box 6.2: Drivers of Savings in Pakistan

Several past studies[118] identify gross national income – growth or income per capita— real interest rate, dependency ratio, financial intermediation, fiscal stance, etc. as the major determinants of domestic savings in Pakistan.[119] Some studies have also examined the roles of terms of trade, trade openness, uncertainty, income inequality, and remittances. However, most of these studies were based on static analysis, exploring a limited number of variables as determinants of savings in Pakistan. Furthermore, almost all the studies are dated; the latest study — Akram and Akram, (2016) —relied on data until 2020.

In this backdrop, this Box attempts to explore the determinants of gross domestic savings (GDS) in Pakistan using the Auto-Regressive Distributed Lag (ARDL) approach on annual data spanning from 1980 to 2024.[120] The estimation model also attempts to control for the impact of literacy – number of students in secondary education (SST), income inequality (GINI), and informality measured by currency-in-circulation to M2 ratio (CCM2), besides examining standard macro determinants of savings. The macro factors include gross national income (GNI), real interest rate (RINT), fiscal policy stance (FDGDP), financial development is proxied through broad money to GDP ratio (M2GDP), Young Dependency Ratio (YDPR) and uncertainty measured by Uncertainty Index (UNCTY).

The long run and short-run estimates are presented in **Table 6.2.1** and **Table 6.2.2,** respectively.[121] The estimated results covering macroeconomic environment, demographic factors, and financial development along with informality are broadly in line with the literature. As shown in **Table 6.2.1**, the lagged savings to GDP ratio has positive but insignificant coefficient, which indicates the absence of inertia and persistence in domestic savings in Pakistan.

The positive and statistically significant results for GNI both in the long and in short-run reveal that the behaviour of domestic savings is pro-cyclical and thus confirms the existence of life cycle hypothesis. In line with the findings of Loayza et al. (2000) and Ferrucci and Mirralles (2007), the estimation shows that 1 percent increase in income may raise domestic savings by 0.49 percent and 3.66 percent in the long run and short run, respectively.[122]
As expected, the estimated coefficients for fiscal stance are negative, statistically significant in the long-run but insignificant in short-run. The estimates show that a 1 percent increase in the fiscal deficit to GDP reduces domestic savings by 0.06 percent in the long run. The estimate is close to 0.077 percent found by Hafeez and Sajid (2021). Similar results are reported in Edwards (1996) for 36 countries;[123] Simliet et al. (2011) and Loayza et al. (2000) for South Africa; and Ozcan et al. (2010) for Turkiye. These results suggest that fiscal consolidation is expected to raise savings in the long run.

Long-Run Results — Table 6.2.1

Variable	Coefficient	Std. Error	t-Statistic	Prob
LGDS	0.05	0.15	0.31	0.76
LGNI	0.49	0.28	1.73	0.10
M2GDP	-0.04	0.01	-4.97	0.00
YDPR1	0.06	0.02	3.60	0.00
RINT	0.03	0.01	2.24	0.03
FDGDP	-0.06	0.02	-2.69	0.01
LSST	1.77	0.57	3.10	0.01
LUNCTY	0.10	0.03	3.01	0.01
GINI	0.04	0.03	1.46	0.16
CCM2	-0.03	0.01	-2.36	0.03
C	-18.67	4.24	-4.40	0.00
Adj R-squared	0.71			

Source: SBP staff estimates

Short-Run Results — Table 6.2.2

Variable	Coefficient	Std. Error	t-Statistic	Prob.
ECT*	-0.95	0.09	-11.22	0.00
LGNI	3.66	0.29	12.85	0.00
M2GDP	0.04	0.01	5.79	0.00
FDGDP	-0.02	0.01	-1.41	0.17
LSST	0.97	0.37	2.64	0.01
LUNCTY	0.04	0.01	4.19	0.00
LUNCTY(-1)	-0.04	0.01	-3.68	0.00
CCM2	0.07	0.01	6.47	0.00
CCM2(-1)	0.06	0.01	4.02	0.00
Adj R-squared	0.80			

* error-correction term

Source: SBP staff estimates

[118] Khan (1993); Nasir and Khalid (2004); Ahmad et al. (2006); Asghar and Nadeem (2016); Akram and Akram (2016); and Hafeez and Sajid (2021).
[119] Hafeez and Sajid (2021) also found a significant impact of agriculture output on national savings in Pakistan.
[120] The ARDL approach help estimate the short-run and long-run relationships between variables.
[121] Assumptions of both Homoskedasticity and normality are confirmed through Breusch-Pagan-Godfrey and Jarque-Bera tests, respectively. Lastly, stability is also ensured by using the CUSUM of Square test.
[122] The estimated Marginal Propensity to Save (MPS) based on these elasticities are 0.05 and 0.26 for long and short run, respectively.
[123] Consisting of Latin American, Asian, African and industrialized economies.

Moreover, as outlined in theory, real interest rate has positive and statistically significant impact on savings, which is in line with Ahmad et al. (2006). These findings suggest that the substitution effect outweighs the income effect in the long run. This implies that the substitution effect causes households to respond to an increase in real interest rates by increasing personal savings instead of raising consumption expenditure.

Unlike the real interest rate, financial development, measured by money supply to GDP ratio, negatively affects gross domestic savings in the long run. These are in contrast to past studies but consistent with the estimates for emerging market economies (Ferrucci and Mirralles, 2007), suggesting that relaxation of credit constraints through the process of deregulation and innovation may reduce savings in the long run. However, as shown in **Table 6.2.2**, financial development significantly increases domestic savings in the short-run, which are in line with the results in Ozcan et al. (2010).

Contrary to theory and findings of earlier studies on Pakistan as well as for other economies, the domestic savings are found to rise with the increase in youth dependency ratio. Pakistan's youth dependency ratio is currently at 62 percent (2024) is currently classified as "high" as per Bloom et al. (2003); however, it has been reducing since the year 2000, prior to which it averaged 83 percent during the preceding two decades. This downward co-movement between savings to GDP and dependency ratio could be the confounding factor in this regard. Among other social variables, domestic savings are found to be positively associated with literacy and income inequality. The results suggest that domestic savings increase by 1.77 percent in response to a 1 percent increase in the number of students in secondary education. Similarly, increase in income inequality is associated with higher savings. This is because usually low-income households have a high propensity to consume and redistribution tends to increase overall consumption in the economy. Prinsloo (2000), based on various household expenditure surveys, also concludes that uneven income distribution is likely to raise savings in the economy.

The impact of informal economy in the context of saving behaviour cannot be over emphasized especially for developing countries. Measured by currency to M2 ratio, an increase in the size of informal economy in Pakistan may increase savings temporarily; nevertheless, it causes reduction in savings in the long run. The findings indicate that an expansion in the size of informal economy persuades households to reduce their bank deposits and therefore savings in the long run. Lastly, the uncertainty is found to be positively associated with savings both in the long and short run. The estimated results reveal that higher uncertainty induces people to save for precautionary motives. The results are consistent with Loayza et al. (2000) however; they measure uncertainty by using inflation rate.

**The contribution of Shah Hussain is acknowledged in writing this box.*

Box 6.3: Approximating Informal Savings in Pakistan

Both economic literature and anecdotal evidence suggest strong preference for informal savings in Pakistan, compounded by the economy's large informal sector. However, estimates of informal savings are scant and in some cases rather dated. This Box attempts to fill that gap by providing updated estimates for the informal economy, along with approximating the potential of informal savings in Pakistan's economy.

A host of research on household saving behaviours in Pakistan has found a sizable prevalence of informal savings, with multiple surveys indicating a strong preference among respondents towards informal channels. For instance, the SBP Saving Behaviour Survey in 2021 found that 55 percent of respondents saved at home and 37 percent saved in an informal committee (ROSCA).[124] Similarly, in a study conducted on young urban savers, 33.5 percent of respondents used gold and real estate as a means of saving.[125] Likewise, the latest SBP Pulse Survey on Savings in 2025 —with a majorly urban educated population—found that 29 percent of respondents, who saved, allocated half or more of their savings was in cash, moveable/immoveable property, or committees. These surveys on individual and household preferences complement earlier studies on the estimated size of informal savings. For example, Hook (1997) postulated that it is possible that informal savings could be 4-5 percent of GNP in Pakistan. Vincelette (2006)

[124] This question allowed multiple selections so this represents percent of respondents who make use of this mode of saving; it is not an indication of exclusive use.
[125] Ghaffar and Sheikh (2025)

found that investment financed from informal sources in Pakistan could be around 2.8 percent of GDP, while Shah and Sohail (2020) approximated that Rs1,583 billion (4 percent of GDP) may not have been captured by financial institutions in 2019.

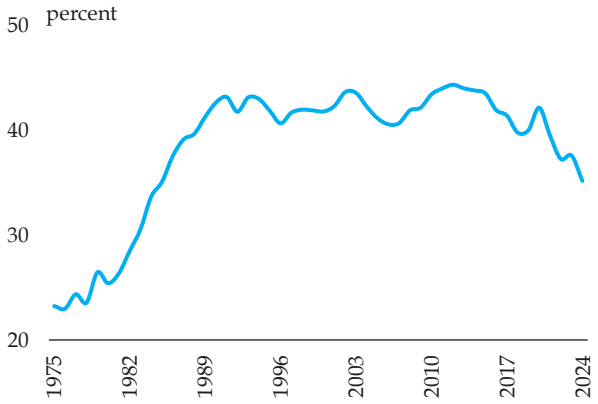
Estimation of informal economy and informal savings:

Informal savings by its nature is difficult to capture, due to the hidden and obscured channels through which it operates. Moreover, the informal economy exacerbates the difficulty of these estimations, as it further serves to mask actual savings in the economy. This complicates estimating informal savings because informal economy itself can be estimated through a variety of methods, creating variability. As a result, estimates can range widely depending on the technique and assumptions used. For instance, estimates from various studies for informal economy in 2010 ranged from 18.2 percent to 47.6 percent.[126]

Informal economy: Following Arby et al. (2008),[127] the informal economy is estimated at 38 percent in 2023 and 35 percent in 2024, using the electricity consumption approach (**Figure 6.3.1**). In consideration of the fact that there are multiple ways to estimate the size of informal economy,[128] these estimates have been compared to those based on other approaches: Multiple Indicators Multiple Causes (MIMIC) and Dynamic General Equilibrium (DGE). Existing MIMIC and DGE based estimates have been taken from the World Bank.[129] The average of all these estimates for the informal economy from 1990 to 2020 is around 37 percent of formal GDP (**Figure 6.3.2**), which is in line with the latest estimates for 2023 and 2024 mentioned above.

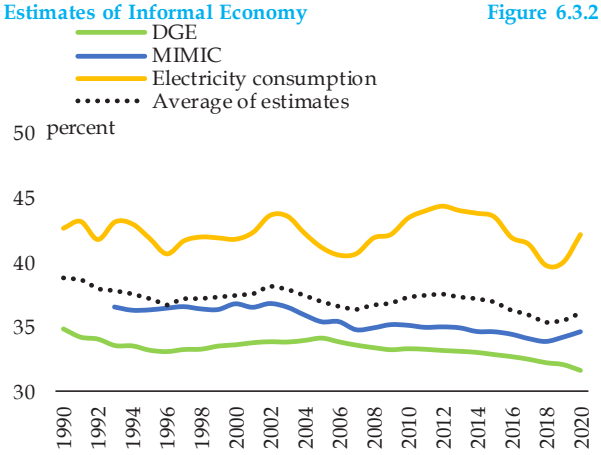
Informal saving: Two methods have been employed to arrive at a crude number for informal savings. The first method employs estimates for the informal economy and applies the economy's private saving rate to find informal savings.[130] For the sake of simplicity, it is assumed that the saving rate of the informal economy mirrors the formal sector and that all savings in this market are saved informally.[131]

Estimate of Informal Economy: Electricity Consumption **Figure 6.3.1**



Sources: SBP staff calculations on SBP, WB, PBS & MoF

Estimates of Informal Economy **Figure 6.3.2**



Sources: WB & SBP staff calculations

[126] Source: Kemal and Qasim (2012)
[127] The electricity consumption approach has been amended to augment the base year with an initial estimate of the informal economy.
[128] Established methods for estimating the informal economy include Multiple Indicators Multiple Causes (MIMIC), Monetary Method, Dynamic General Equilibrium (DGE) and Electricity Consumption. Each of these methods has distinct advantages and shortcomings, which is why an average has been taken of each estimate. Source: World Bank
[129] Elgin et al. (2021).
[130] The rate of private saving (as against GDS) is applied on the assumption that informal GDP is almost entirely in the private sector.
[131] This assumption partly stems from definition since informal economy means and includes income from economic activities outside the taxation and formal financial system, and partly from economic literature and anecdotal evidence which suggests that income from informal sources are mostly saved informally e.g. in gold, real estate, etc.

Approximating Informal Savings **Table 6.3.1**

Calculation	Indicator	Value
	Method 1: Private Savings	
	1. Assuming all private savings are saved informally	
A	Informal Economy Estimates – 2023	24,635 billion Rupees
A x 18.3% = B	Assuming saving rate of 18.3 percent	4,508 billion Rupees
B/GDP	% of Real GDP - National Accounts	11 percent
B/Estimated GDP	% of Real GDP – Estimated	7 percent
	2. Private savings after subtracting worker remittances	
A	Informal Economy Estimates – 2023	24,635 billion Rupees
A x (18.3-8.1%) = B	Assuming saving rate of 10.2 percent by removing worker remittances (8.1 percent) from private savings	2,513 billion Rupees
B/GDP	% of Real GDP - National Accounts	6 percent
B/Estimated GDP	% of Real GDP – Estimated	4 percent
	Method 2: Household Savings	
A	Household Saving per capita -2023	26,983 Rupees
A/84.8% = B	Saving per capita *(assuming 15.2 percent informal savings)*	31,819 Rupees
A – B = C	Informal Saving per capita	4,836 Rupees
C x Population = D	Informal Saving in economy	1,168 billion Rupees
D/GDP	% of Real GDP – National Accounts	3 percent
F/Estimated GDP	% of Real GDP – Estimated	2 percent

Source: SBP staff calculations

Applying the private saving rate of 18.3 percent (in 2023) for the informal economy (assumed at 38 percent of GDP as per estimates above), informal savings are approximated to be Rs 4,508 billion in 2023. This equals to about 11 percent of formal real GDP and 7 percent of the estimated total real GDP, inclusive of estimated informal economy.

Moreover, since private savings include workers' remittances, which according to some studies are mostly channelled towards consumption,[132] it is instructive to subtract workers' remittances from private savings to estimate informal domestic private savings. Accordingly, after subtracting workers' remittances of 8.1 percent of GDP (2023) from the private saving rate of 18.3 percent, the private saving rate may be adjusted downward to 10.2 percent. Applying this rate to the estimates of informal economy (38 percent) yields informal domestic private savings estimates at Rs 2,513 billion in 2023. This equals about 6 percent of formal real GDP and 4 percent of estimated total real GDP, inclusive of estimated informal economy (**Table 6.3.1**).

The second method relies on household savings taken from the SBP's flow of funds tables, which is the major portion of savings in Pakistan, along with survey evidence to find informal household savings. To this end, household savings is taken as a proxy to arrive at a value of savings per capita. This is then increased by a factor of 15.2 percent to arrive at total savings,[133] inclusive of informal holdings. This translates to Rs 4,836 per capita of unrecorded savings, which is 18 percent of recorded household savings (**Table 6.3.1**). This equals 3 percent of formal real GDP and 2 percent of the estimated total real GDP.

These estimates suggest that informal savings in Pakistan range between 3 to 11 percent of formal real GDP; and 2 to 7 percent of the estimated real GDP, inclusive of informal GDP.

Limitations:

These results are meant to be indicative in nature and a means to illustrate the importance of formalising informal savings, rather than its accurate measurement. The two methods employed illustrate the potential of informal savings in Pakistan and the need to channelize it into the formal sector. These findings reinforce the analysis in **Section 3**, which emphasised the key role of policy to facilitate formalisation and reduce distortions, which encourage informal savings.

**The contribution of Ali Ahmed Shah is acknowledged in writing this box.*

[132] Chand and Singh (2025); Tung and Thanh (2015); Iqbal et al. (2013)

[133] This is the average value of savings kept in largely informal modes for the past 5 years by respondents as per the SBP Saving Behaviour Survey of 2021, which is a nationally representative survey.

Annexure 1: SBP Pulse Survey on Savings 2025

1) **Motivation behind the survey:** The State Bank of Pakistan (SBP) has previously conducted two major surveys on household savings. The first is the Access to Finance Survey, carried out in 2008 and 2015, which assessed the use of formal financial channels such as banks, development finance institutions (DFIs), and mutual funds; however, it was not primarily focused on saving behaviour. The second was the Saving Behavior Survey (2020), a nationwide field survey of 4,000 respondents, which specifically examined saving preferences, reasons for low savings, and reliance on informal mechanisms. Since then, the global and domestic macroeconomic environment has changed significantly, characterized by persistent inflation, currency volatility, rapid digitalization of financial services, and post-COVID socioeconomic shifts, rendering earlier findings outdated. While the Karandaaz Financial Inclusion Survey (2024) provides useful insights into financial access and digital adoption, its coverage of saving behaviour is limited. To address these gaps, SBP launched a fresh targeted pulse survey to capture updated household saving patterns, preferences for saving avenues, and the usage and drivers of informal saving methods.

2) **Survey objective:** The State Bank of Pakistan undertook this short pulse survey to understand the behavioural drivers of personal savings across diverse population segments. The survey was designed to provide insights into individuals' saving behaviour, their preferred saving avenues, and the factors/motives influencing their saving decisions.

3) **Questionnaire design:** The questionnaire was jointly developed by the SBP's Economic Policy and Review Department (EPRD) and the Research Department. It was translated into Urdu by the EPRD team and subsequently reviewed by the SBP's External Communications Department.

4) **Survey methodology and duration:** The survey was conducted in collaboration with SBP's External Communications Department, and was launched primarily through social media channels such as WhatsApp, and X (formerly Twitter). Targeted emails were also sent to different chambers of commerce, business associations, and industry clusters, encouraging both direct participation and onward circulation among their member firms and their employees.

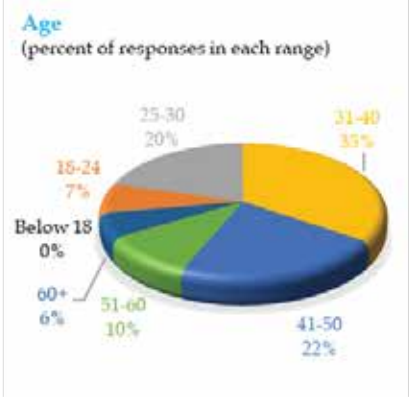
The survey was carried out from July 25 to August 4, 2025, during which 10,486 responses were collected from across Pakistan.

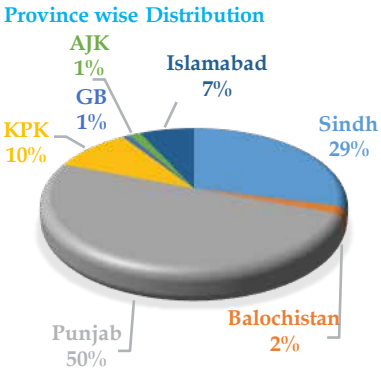
5) **Limitation:** The online and email-based mode of the survey meant that most respondents were comparatively literate. Survey results confirmed this, with over 80 percent of participants reporting education at the graduate level or higher. Consequently, the findings primarily reflect the saving behaviour of Pakistan's literate population. Unlike field surveys, which cover all geographic areas and include interviews with both literate and illiterate respondents, this approach had limited demographic reach.

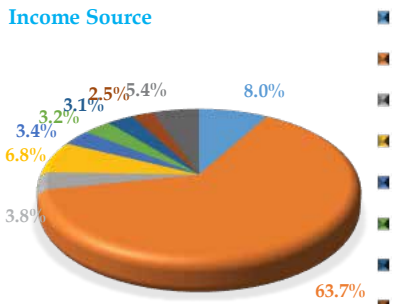
Additionally, to maintain engagement in the online format, the questionnaire was intentionally kept concise. As a result, it did not cover a wide range of dimensions as explored in SBP's 2020 Saving Behaviour Survey, which was conducted as a field-based study.

6) **Survey results:** While key insights from this survey are discussed in relevant sub-sections of the Special Chapter, this section produces the following two types of survey results:
   a. Demographics
   b. Major summary insights not discussed in the Chapter

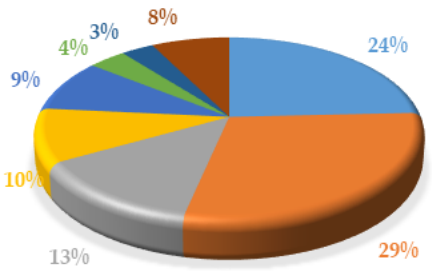
a. Demographics





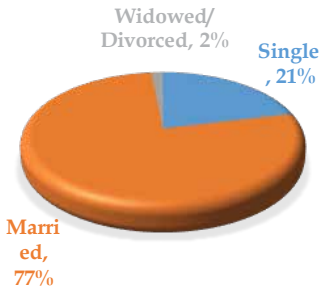


- Daily wages/part time employment
- Full time employment
- Self-employed/family business (agriculture sector)
- Self-employed/family business (non-agriculture sector)
- Pocket money/gift/charity/govt welfare/family support
- Income from financial market investments
- Pension
- Income from rented land/house/shops/offices
- Others

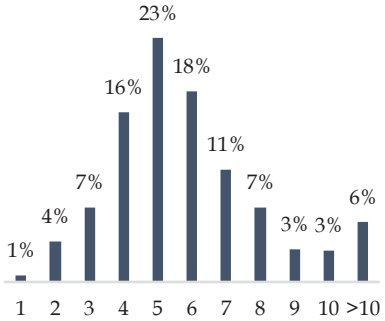


- Less than 50,000
- 50,001-100,000
- 100,001-150,000
- 150,001-200,000
- 200,001-350,000
- 350,001-450,000
- 450,001-600,000
- More than 600,000

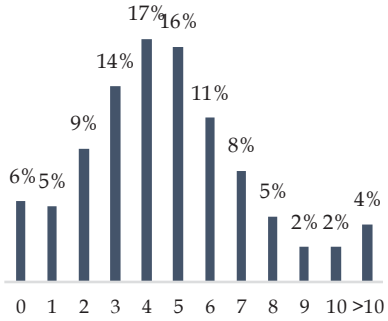
Marital Status



Number of Family Members

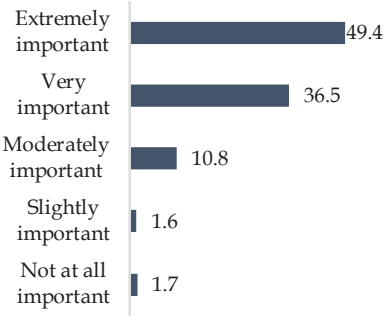


Number of Dependents

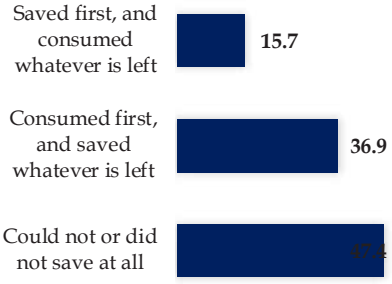


Permanent/source of income in the last 3 years

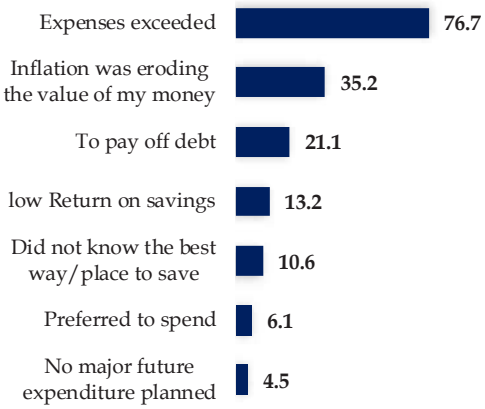
Is it important to save?
(percent of respondents)



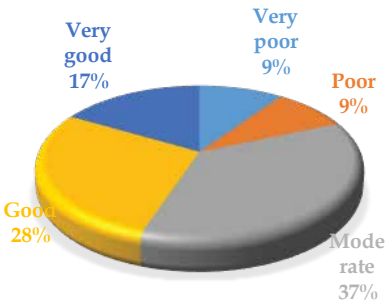
Saving behavior in last 3 years



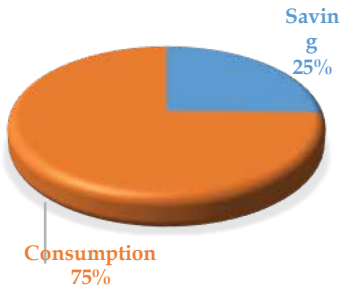
Reasons for not saving



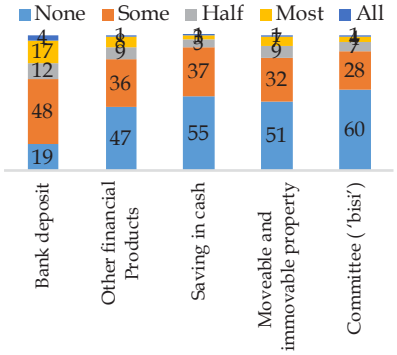
Understanding of basic financial concepts



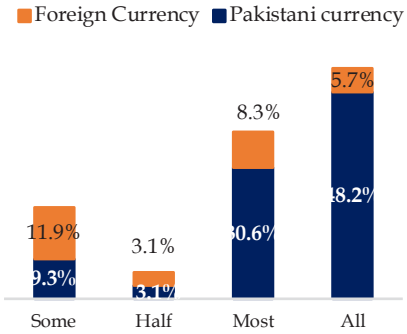
Personal income distribution in last 3 years



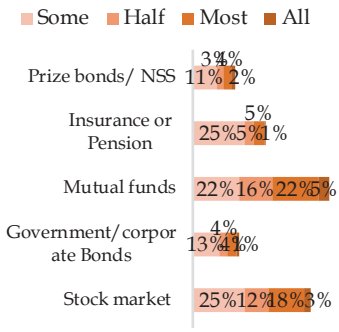
Proportion of savings allocated to



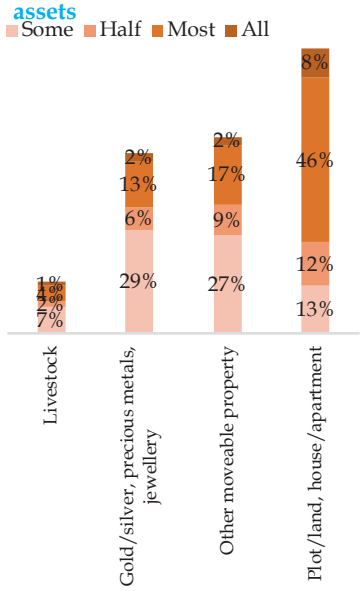
Those who allocated most or all savings to cash



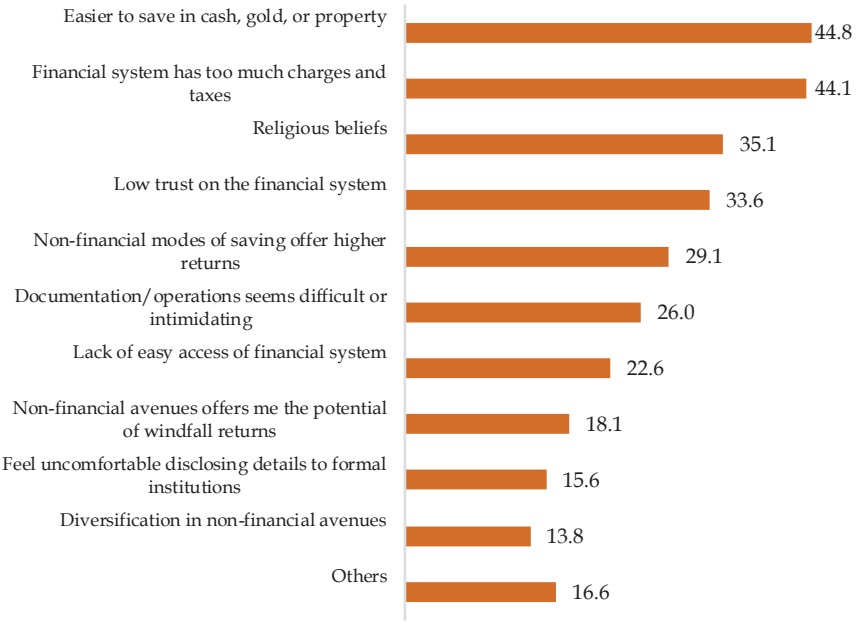
Those who allocated most or all savings to financial instruments



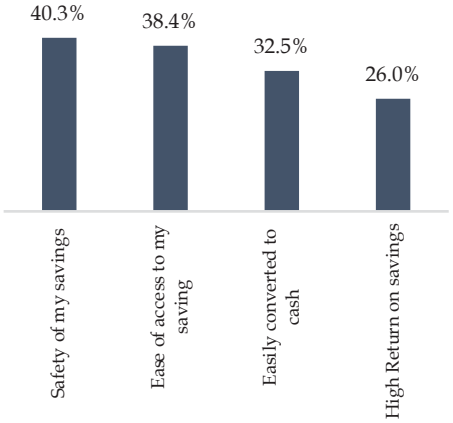
Those who allocated most or all in movable/immovable assets



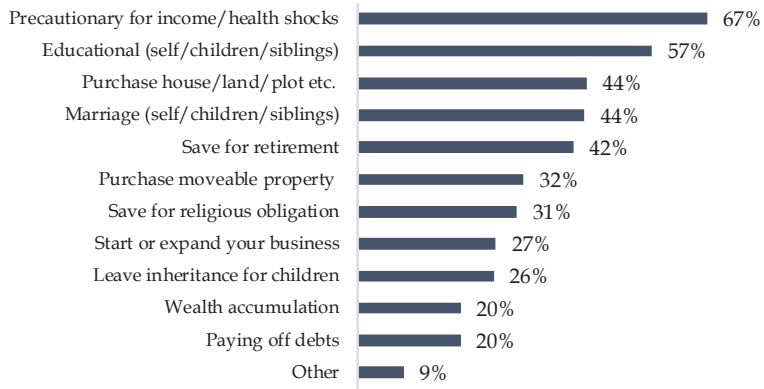
Reasons why saving was mostly in non-financial saving avenues



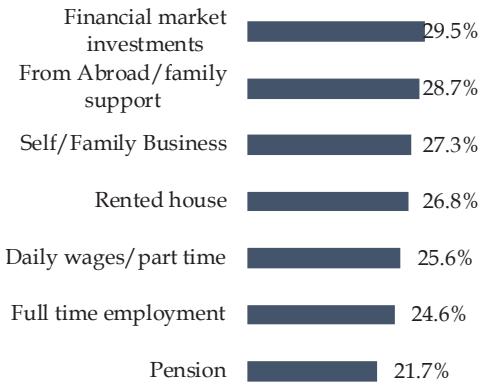
Importance of Attributes of Savings



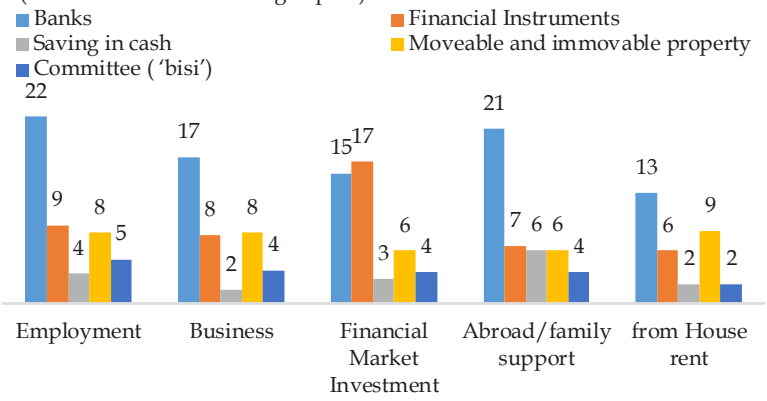
Main Purposes of Savings



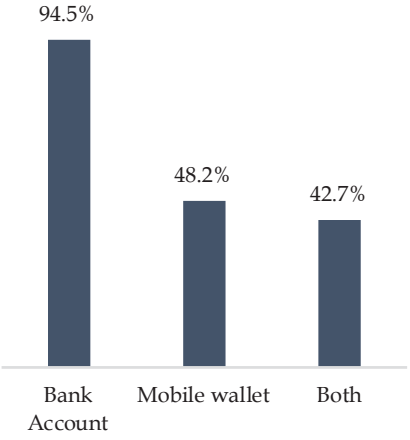
Saving rates of respondents deriving income from:



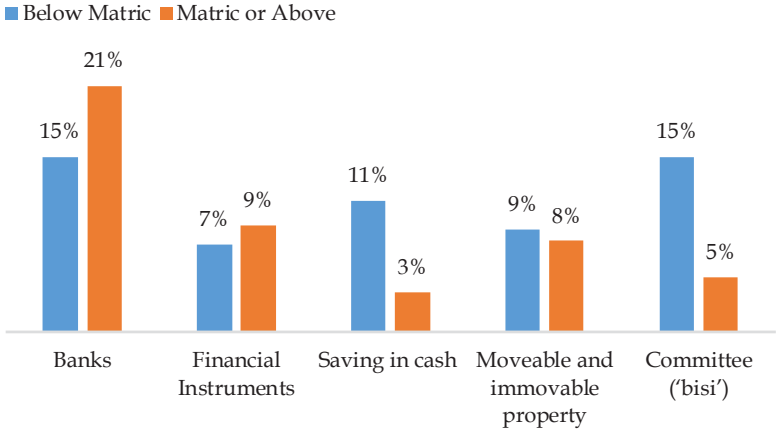
Saving avenues preferences
(sum of most and all saving kept in)



Usage of Banking account or mobile wallet



Saving avenues preferences by respondent (education wise):
(sum of most and all saving kept in)



**The contribution of Muhammad Naeem Shah is acknowledged in conducting the survey and writing this box.*

References:

Abbas, M. & Badshah, I. (2017). Institutional Investment and Stock Returns Volatility at Pakistan Stock Exchange (PSX), *FWU Journal of Social Sciences*, Vol.11, No.1.

ADB (2018). Postal savings: Reaching everyone in Asia, Asian Development Bank, Manila.

ADB (2022). Sector Assessment (summary): Finance (money and capital markets), Available at: www.adb.org/sites/default/files/linked-documents/53221-003-ssa.pdf, Accessed on: August 4th 2024.

Afghan, S. (2023). The Dark Side of Real Estate: Uncovering its Malevolent Influence on National Economic Progression, *Insights for Change,* Consortium for Development Policy Research.

Afzal, H. & Ahsan, H. (2021). Poverty Trend in Pakistan: A Glimpse from Last Two Decades, *PIDE Knowledge Brief*, Vol.2021, No.26.

AGP (2025). Consolidated Audit Report (Federal Government) for the Audit Year 2024-25, Auditor General of Pakistan, Islamabad.

AGP (2024). Special Study Report on Transfer of Saving Bank Accounts and Certificates from Pakistan Post Office Department to Central Directorate of National Savings (Audit Year 2022–23), Auditor General of Pakistan, Islamabad.

Ahmad, M. H., Atiq, Z., Alam, S., & Butt, M. S. (2006). The Impact of Demography, Growth, And Public Policy on Household Saving: A Case Study of Pakistan, *Asia-Pacific Development Journal*, Vol.13, No.2.

Ahmed, Q.M. & Hussain, M.H. (2008). Estimating the Black Economy through a Monetary Approach: A Case Study of Pakistan, *Economic* Issues, Vol.13, No.1.

Ahmed, W., Nadeem, T., & Baluch, K. A. (2020). Enhancing financial inclusion through Pakistan Post, *SBP Staff Notes,* Vol.20, No.04, State Bank of Pakistan.

Aizenman, J., Cheung, Y. W., & Ito, H. (2017). The Interest Rate Effect on Private Saving: Alternative Perspectives, Asian Development Bank Institute Working Paper Series, No. 715.

Akram, N. & Akram, I. (2016). Macro and Socioeconomic Determinants of Savings in Pakistan, *Pakistan Business Review*, Vol.18.

Ali, A. (2016). Saving-Investment Dynamics in Pakistan: An Empirical Investigation, *SBP Staff Note No.1*, State Bank of Pakistan.

Anyangwe, T., Vanroose, A., & Fanta, A. (2022). Determinants of Financial Inclusion: Does Culture Matter? *Cogent Economics & Finance*, Vol.10 No.1.

Arby, M.F., Malik, M.J. & Hanif, M.N. (2010). The size of the informal economy in Pakistan, *SBP Working Paper No.33*, State Bank of Pakistan.

Asad, S.A. (2023). The Dark Side of Real Estate: Uncovering its Malevolent Influence on National Economic Progression, *Insights for Change*, Consortium for Development Policy Research.

Asghar, N., & Nadeem, M. (2016). An Empirical Investigation of Saving Behaviour in Pakistan, *Pakistan Economic and Social Review*, Vol.54, No.1.

Athukorala, P. (2025). Economic Growth and Savings Transition in Asia: Unity in Diversity, *Working Papers in Trade and Development,* Vol.2025, No.3.

Awan, R.U., Munir, R., Hussain, Z., & Sher, F. (2010). Rate of Interest, Financial Liberalization & Domestic Savings Behavior in Pakistan. *International Journal of Economics and Finance*, Vol.2, No.75.

Barro, R. J. (1974). Are Government Bonds Net Wealth? *Journal of Political Economy*, Vol.82, No.6.

BdF (2024). Annual Report 2023, Banque de France, Paris.

Beck, T., Levine, R. & Loayza, N. (2000). Finance and the Sources of Growth, *Journal of Financial Economics*, Vol. 58, No. 12.

Bilgrami, N., & Nishat, M. (1990). The determinants of corporate savings in Pakistan: a case study of companies registered with Karachi Stock Exchange, *Pakistan Economic and Social Review*, Vol.28, No.1.

Bloom, D. E., Canning, D. & Sevilla, J. (2003). The Demographic Dividend: A New Perspective on the Economic Consequences of Population Change, RAND Corporation.

Börsch-Supan, A. & Essig, L. (2005). Household Saving in Germany: Results of the first SAVE study, ed. Wise D.A, *Analyses in the Economics of Aging,* University of Chicago Press, Chicago.

Bongaarts, J., & Sathar, Z. (2023). Is Pakistan's fertility transition stalling? *Asian Population Studies*, Vol.20, No.2.

Carpenter, S. B., & Jensen, R. T. (2002). Household participation in formal and informal savings mechanisms: evidence from Pakistan, *Review of Development Economics*, Vol. 6 No.3.

CCP (2024). State of Competition in the Key Markets with Significant SOE's Presence in Pakistan Insurance Industry, Competition Commission of Pakistan, Islamabad.

CCP (2019). Issues in The Real Estate Sector of Pakistan, Competition Commission of Pakistan, Islamabad.

Chand, S,A. & Singh, B. (2025). Investigating the Relationship Between Remittances and Inflation in Developing and Emerging Economies: A Disaggregated Analysis Using the cross-Sectional Augmented Autoregressive Distributed Lag Approach, *Emerging Markets Finance and Trade*.

Chaudhry, K. T. (2019), Why companies are not going for IPO in Pakistan? Available at:

www.cbs.lums.edu.pk/student-research-series/why-companies-are-not-going-ipo-pakistan, Accessed on August 4th 2025.

Ito, H. & Chinn, M. (2007). East Asia and Global Imbalances: Saving, Investment, and Financial Development, *NBER Working Paper No.13364*.

Dabla-Norris, E. Ho, G. Kochhar, K. Kyobe, A. & Tchaidze, R. (2013). Anchoring Growth: The Importance of Productivity-Enhancing Reforms in Emerging Market and Developing Economies, *IMF Staff Discussion Note*, Vol.13 No.08.

Dabla-Norris, E., Gradstein, M., Miryugin, F. & Misch, F. (2019). Productivity and Tax Evasion, *IMF Working Papers*, No.260, International Monetary Fund.

Deaton, A. Serven, L. Schmidt-Hebbel, K. Stiglitz, J. Honohan, P. & Obstfeld, M. (1999). The Economics of Saving and Growth Theory, Evidence, and Implications for Policy, Cambridge University Press, London

Denizer, C. & Wolf, H. (2000). The Saving Collapse During the Transition in Eastern Europe, *World Bank Economic Review*, Vol. 14, No. 3.

Di Giannatale Menegalli, S.B. & Roa, M.J. (2016). Formal saving in developing economies: Barriers, interventions, and effects, *IDB Working Paper Series, No.766*, Inter-American Development Bank (IDB), Washington, DC.

Dornbusch, R. & Fischer, S. (1993). Moderate Inflation, *World Bank Economic Review*, Vol. 7, No. 1.

Drabek, Z. (1990), A Case Study of a Gradual Approach to Economic Reform: The Viet Nam Experience of 1985-88, *World Bank Internal Discussion Paper Asia Regional Series Report No.74*, World Bank, Washington D.C.

ECB (2009). Financial Stability Review, European Central Bank, Frankfurt.

Elgin, C., M. A. Kose, F. Ohnsorge, & S. Yu. (2021). Understanding Informality. *CERP Discussion Paper 16497*, Centre for Economic Policy Research.

Elbadawi, I. A. & Mwega, F. M. (2000). Can Africa's Saving Collapse Be Reversed? *World Bank Economic Review*, Vol.14, No.3.

Estrada, G. Park, D & Ramayandi, A. (2010). Financial Development and Economic Growth in Developing Asia, *ADB Economics Working Paper Series No.233*.

Fan, R.Y., Lederman, D., Nguyen, H. & Rojas C.J. (2022). Calamities, Debt, and Growth in Developing Countries, *Policy Research Working Paper No.10015*.

Feldstein, M. & Horioka, C. (1980). Domestic Saving and International Capital Flows, *Economic Journal*, Vol.90, No.358.

Ferrucci, G., & Miralles, C. (2007). Saving Behaviour and Global Imbalances: The role of Emerging Market Economies, *European Central Bank Working Paper Series*, No.842.

FoP (2016). Federal Ombudsman's Expert Committee Report On The Working Of Employees' Old-Age Benefits Institution (EOBI) And Its Recommendations To Restructure It For Excellence In Its Services For 6.5 Million Workforce, Federal Ombudsman of Pakistan, Islamabad.

Ghaffar, A. & Sheikh, A. (2025). Driving Digital Deposits: Innovative Approaches to Saving and Investment, Karandaaz Pakistan.

Goldsmith, R. W. (1969). Financial Structure and Development, Yale University Press, New Haven.

Gorman, E., Scobie, G. M., & Paek, Y. (2013). Measuring saving rates in New Zealand: An update, *New Zealand Treasury Working Paper No.13/04*.

Gregorio, J.D. & Guidottim P.R. (1995). Financial Development and Economic Growth, *World development*, Vol.23, No.3.

Guiso, L., Sapienza, P. & Zingales, L. (2006). Does Culture Affect Economic Outcomes? *Journal of Economic Perspectives*, Vol. 20, No. 2.

Hafeez, H., and Sajid, G. (2021). The Relationship among Agricultural Output, Inflation Rate, Fiscal Deficit and National Savings: Evidence from Pakistan, *Anatolian Journal of Economics and Business*, Vol.5, No.2.

Haini, H. (2020). Examining the Relationship between Finance, Institutions and Economic growth: Evidence from the ASEAN Economies, *Economic Change and Restructuring*, Vol. 53, No.3.

Hassan, A, & Qaiser, K. (2025). Unreal Estate: The Black Money Blocking Sustainable Growth in Pakistan, *Law Research Journal*, Vol. 3, No.1.

Honohan, P. (1999). Financial Policies and Saving, ed. Schmidt-Hebbel, K. & Servén, L. *The Economics of Saving and Growth: Theory, Evidence, and Implications for Policy*, Cambridge University Press, London.

Hook, Andrew T. (1997) Savings in Pakistan: Practice and Policy, State Bank of Pakistan, Karachi.

Hussain, F., Hussain, S & Khan, S (2025). Underlying Factors of Inflation in Pakistan: Dynamic Effects and Contributions, *SBP Working Paper Series 115*, State Bank of Pakistan.

Husain, I. (2005). Household Savings Behavior in Developing Economies: Evidence from Pakistan, *Pakistan Development Review*, Vol. 44, No. 4.

Husain, I. (2023). Governing the Ungovernable: Institutional Reforms for Economic Stability in Pakistan, Oxford University Press, London.

Ilyas, M., Sabir, H.M., Shehzadi, A., & Shoukat, N. (2014). Inter-relationship among Economic Growth, Savings and Inflation in Pakistan. *Journal of Finance and Economics*, Vol.2, No.4.

IMF (2001). Developing a Government Bond Market: An Overview, ed. IMF, Developing Government Bond Markets, IMF, Washington D.C.

IMF (2013). Breaking Through the Frontier: Can Today's Dynamic Low-Income Countries Make It? Ed. World Economic Outlook, April 2013, IMF, Washington D.C.

IPPB. (2024). Annual Report 2023–24. India Post Payment Bank, New Delhi.

Iqbal, J., Nosheen, M. & Javed, A. (2013). The Nexus between Foreign Remittances and Inflation: Evidence from Pakistan. *Pakistan Journal of Social Sciences*, Vol.33, No.2.

Javid, Y.A. & Khan, W. (2019). Drivers of Corporate Bond Market Liquidity: Evidence from Pakistan, *NUST Journal of Social Sciences and Humanities*, Vol.5, No.1.

JPB (2024). Annual Report 2024: Year ended March 31, 2024. Japan Post Bank, Tokyo.

Kanth, P. & Joubert, C. (2025). Life Cycle Saving in a High-Informality Setting, *Institute of Labour Economics Discussion Paper No.17876,* Institute of Labour Economics.

Kazmi, A.A. (2001). Ricardian Equivalence Hypothesis: Some Empirical Tests for Pakistan Based on Blanchard-Evans Models, *Lahore Journal of Economics,* Vol.6, No.1.

Kemal, A. R. (2022). Inflation and Household Savings in Pakistan: An Empirical Analysis, *Pakistan Development Review*, Vol. 61, No. 4.

Kemal, M.A. & Qasim, A.W. (2012). Precise Estimates of the Unrecorded Economy, *The Pakistan Development Review*, Vol.51, No.4.

Khalid, M. (2004). Saving-investment Behavior in Pakistan: An Empirical Investigation, *Pakistan Development Review*, Vol.43, No.4.

Khan, S., & Rehman, U. (2021). Insider Trading Laws & Corporate Governance Impact on Investment Decision, *iRASD Journal of Management*, Vol.3, No.2.

Khalid. U. (2023). Factors Influencing Household Saving Behaviour Across Urban and Rural Households in Pakistan, *Pakistan Economic Review*, Vol.5, No.2.

Khan, A. H. & Qayyum, A. (2006). Trade Liberalization, Financial Development and Economic Growth, *Pakistan Development Review*, Vol. 45, No. 4.

Khan, A. H. (1993). Analysis of Savings Behaviour in Pakistan, *Savings and Development*, Vol.17, No.2.

Khan, A., Khalid, U. & Shahnaz, L. (2016). Determinants of Household Savings in Pakistan: Evidence from Micro Data, *Journal of Business & Economics*, Vol.8 No.2.

Khan, K., Anwar, S., Ahmed, M., & Kamal, M.A. (2015). Estimation of Consumption Functions: The Case of Bangladesh, India, Nepal, Pakistan and Sri Lanka, *Pakistan Business Review*, No.17.

Khan, M. A. & Qayyum, A. (2006). Trade Liberalization, Financial Sector Reforms and Growth, *MPRA Paper No.2655*.

Khan, M. S. & Senhadji, A. S. (2001). Threshold Effects in the Relationship Between Inflation and Growth. *IMF Staff Papers*, Vol. 48, No. 1.

Khalid, K., Sabeen, A., Manzoor, A. & Kamal, M.A. (2015). Estimation of Consumption Functions: The Case of Bangladesh, India, Nepal, Pakistan and Sri Lanka, *Pakistan Business Review 2015*.

KPMG (2024). IPOs in India, Available at: www.assets.kpmg.com/content/dam/kpmgsites/in/pdf/2024/07/ipos-in-india-fy24.pdf.coredownload.inline.pdf, Accessed on August 4th 2025.

La Poste Groupe. (2024). Integrated Annual Report 2023. La Poste Groupe, Paris.

Levine, R. & Renelt, D. (1992). A Sensitivity Analysis of Cross-Country Growth Regressions. *American Economic Review*, Vol.82, No.4.

Levine, R. (2005). Finance and Growth: Theory and Evidence, *Handbook of Economic Growth*, Vol.1, No.1.

Lewis, S. and F. Messy (2012). Financial Education, Savings and Investments: An Overview, OECD Working Papers on Finance, Insurance and Private Pensions, No.22.

Lewis, W. A. (1955). The Theory of Economic Growth, George Allen & Unwin, London

Loayza, N., Schmidt-Hebbel, K. & Servén, L. (2000). What Drives Private Saving Across the World? *Review of Economics and Statistics*, Vol.82, No.2.

Mahmood, N. & Nasir, Z.M. (2008). Pension and Social Security Schemes in Pakistan: Some Policy Options, *PIDE Working Papers,* Vol.2008, No.42.

Mamun, M.Z. & Hossain, M.Z. (2022). Bangladesh Pension Scheme, ed. Lee, H., Nicolini, G. & Cho, M. *International Comparison of Pension Systems: An Investigation from Consumers' Viewpoint*, Springer Nature, Berlin.

Masson, P. R., Bayoumi, T. & Samiei, H. (1998). International Evidence on the Determinants of Private Saving, *World Bank Economic Review*, Vol.12, No.3.

MoSPI (2007). National Accounts Statistics Sources and Methods 2007, Ministry of Statistics and Programme Implementation, New Dehli.

Modigliani, F. & Brumberg, R. (1954). Utility Analysis and the Consumption Function: An Interpretation of Cross-Section Data, *Post-Keynesian Economics*, Vol.1, No.1.

MoF (2015-2025), Pakistan Economic Survey (various issues), Ministry of Finance, Islamabad.

MoF (2023). Pakistan Economic Survey 2023-24, Ministry of Finance, Islamabad

MoF (2025). Pakistan Economic Survey 2024-25, Ministry of Finance, Islamabad.

Mohammed, S. & Burki H. (2008). Mobilizing Savings from the Urban Poor in Pakistan, *ShoreBank International Research Paper No.1,* Shorebank.

MoneySense (n.d.), Managing Your Money, MoneySense, Available at: www.moneysense.gov.sg/managing-your-money, Accessed on August 20, 2025.

Nasir, S., & Khalid, M. (2004). Saving-Investment Behaviour in Pakistan: An Empirical Investigation, *The Pakistan Development Review*, Vol.43, No.4.

NRF (2024). Insurance regulation in Asia Pacific 2024, Norton Rose Fulbright, London.

Oncel, O (1998). Reformation of the Gold Sector in the Turkish Economy, University of the Witwatersrand.

Ozcan, K. M., Gunay, A., & Ertac, S. (2003). Determinants of Private Savings Behaviour in Turkey, *Applied Economics*, Vol.35, No.12.

PBS (2023). Quarterly National Accounts 2015-16 to 2020-21, Pakistan Bureau of Statistics, Islamabad.

PBS (2021). Pakistan Labour Force Survey 2020-2021, Pakistan Bureau of Statistics, Islamabad.

PIDE (2020). The Poor State of Financial Markets in Pakistan, *PIDE Policy Viewpoint No.20*, Pakistan Institute of Development Economics, Islamabad.

PP (2022). Annual Report 2021–22, Pakistan Post, Islamabad.

Prasad, E., Rajan, R. & Subramanian, A. (2007). Foreign Capital and Economic Growth, *Brookings Papers on Economic Activity*, Vol.2007, No.1.

Prinsloo, J. W. (2000). The Saving Behaviour of the South African Economy, *South African Reserve Bank Occasional Paper*, No.14.

PSBC (2024). Annual Report 2024. Postal Savings Bank of China, Beijing.

PSX (n.d.). 5 Years Progress Report, Available at: www.dps.psx.com.pk/progress-report, Accessed on: 28-08-2025.

Qadir, A. (2005). A Study of Informal Finance Markets in Pakistan, Pakistan Microfinance Network.

Qureshi, T. A., & Mahmood, Z. (2015). The Size of Trade Misinvoicing in Pakistan. *MPRA Paper No.65801.*

Raza, H., Hena, S., & Saeed, A. (2017). The Effects of Interest Rate, on Savings and Deposits in Pakistan, *International Journal of Business and General Management*, Vol.6, No.6.

RBI (2024). Deposits with Scheduled Commercial Banks – December 2024. Database on Indian Economy (DBIE), Reserve Bank of India, Mumbai.

Rehman, S., & Khilji, J.A. (2017). Why Bond Market Couldn't Thrive in Pakistan, *International Journal of Accounting and Economics Studies*, Vol. 5, No.1.

Reinhart, C. & Rogoff, K. (2010). Growth in a Time of Debt, *American Economic Review*, Vol.100, No.2.

Rodrik, D. (2000) Saving Transitions, *The World Bank Economic Review: A Symposium On Saving In Developing Countries*, Vol.14, No.3.

Rodrik, D. (2004) Growth Strategies, John F. Kennedy School of Government, Harvard University

Saeed, S., & Khan, M.A. (2012). Ricardian Equivalence Hypothesis and Budgetary Deficits: The Case of Pakistan 1972-2008, *Interdisciplinary Journal of Contemporary Research in Business*, Vol.3, No.9.

Sajid, G. M., & Sarfraz, M. (2008). Savings and Economic Growth in Pakistan: An Issue of Causality. Pakistan Economic and Social Review, Vol. 46, No.1.

Saleemullah, Haq, M. F., Shafique, B., Abbasi, M. U. and Ediz Consultancy Pvt. Ltd. (2015). KAP Study: Knowledge, Attitude and Practices of Islamic Banking in Pakistan, State Bank of Pakistan, Karachi.

SBP (2003). Pakistan: Financial Sector Assessment 2003, State Bank of Pakistan, Karachi.

SBP (2003). State Bank of Pakistan Annual Report FY03, State Bank of Pakistan, Karachi.

SBP (2013). SBP Annual Report-Statistical Supplement FY13, State Bank of Pakistan, Karachi.

SBP (2017). The State of Pakistan's Economy, Annual Report FY17, State Bank of Pakistan, Karachi.

SBP (2019). The State of Pakistan's Economy, First Quarterly Report FY19, State Bank of Pakistan, Karachi.

SBP (2020-24), Financial Stability Review, State Bank of Pakistan, Karachi.

SBP (2021a). Statistics on Scheduled Banks in Pakistan – June 2021, State Bank of Pakistan, Karachi.

SBP (2021b). The State of Pakistan's Economy, Annual Report FY20, State Bank of Pakistan, Karachi.

SBP (2022). Flow of Funds Accounts of Pakistan 2021-22, State Bank of Pakistan, Karachi.

SBP (2023). Financial Stability Review FY22, State Bank of Pakistan, Karachi.

SBP (2024). State of Pakistan's Economy, Half Year Report FY24. State Bank of Pakistan, Karachi.

SBP (2025a). State of Pakistan's Economy, Half Year Report FY25, State Bank of Pakistan, Karachi

SBP (2025b). National Financial Inclusion Strategy (NFIS) 2024-2028. State Bank of Pakistan, Karachi.

Scher, M. J., & Yoshino, N. (2004). Small savings mobilization and Asian economic development: The role of postal financial services, M.E. Sharpe, Inc., New York.

Schmidt-Hebbel, K., & Servén, L. (1999). The Economics of Saving and Growth: Theory, Evidence, and Implications for Policy, Cambridge University Press, London.

SECP (2020). Capital Market Development Plan (2020-2027), Securities and Exchange Commission of Pakistan, Islamabad.

SECP (2023a). Diagnostic Study on the Status of Motor Third Party in Insurance in Pakistan, Securities and Exchange Company of Pakistan, Islamabad.

SECP (2023b). Insurance Industry Statistics 2023, Securities and Exchange Company of Pakistan, Islamabad.

SECP (2025). The Future of Takaful in Pakistan: A Diagnostic Study, Securities and Exchange Company of Pakistan, Islamabad.

Shah, M. & Sohail, H. (2020). Savings in Pakistan, Karandaaz Pakistan.

Simlet, C., Keeton, G., & Botha, F. (2011). The Determinants of Household Savings in South Africa, *Studies in Economics and Econometrics*, Vol.35, No.3.

Solow, R. M. (1956). A Contribution to the Theory of Economic Growth, *Quarterly Journal of Economics*, Vol.70, No.1.

Srivisal, N., Sanoran, K. L. & Bukkavesa, K. (2021). National Culture and Saving: How Collectivism, Uncertainty Avoidance, and Future Orientation Play Roles, *Global Finance Journal*, Vol.50 No.1.

Tran-Nam, B. and Pham, C. D. (2003), The Vietnamese Economy: Awakening the dormant dragon, Routledge Curzon, London.

Tung, L.H. & Thanh, P.T. (2015). The Impact of Remittance Inflows on Inflation: Evidence in Asian and the Pacific Developing Countries, *Journal of Applied Economic Sciences*, Vol.10, No.7.

UN (2009). System of National Accounts 2008, United Nations, New York

UNDP (2024). Inclusive Insurance and Risk Financing in Pakistan: Snapshot and Way Forward 2024, United Nations Development Programme, New York City.

Uppal, J. Y. (2011). Government Budget Deficits and the Development of the Bond Market in Pakistan: Issues and Challenges, *The Lahore Journal of Economics*, Vol.16.

UPU (2023). Postal Networks: A Platform for Financial Inclusion Enablement.

Vincelette, G.A. (2006). Determinants of Saving In Pakistan, *SASPR Working Paper Series No.10*.

Waheed, A. (2009). Potential of Takāful in Pakistan: Operational and Transformational Paradigm, National University of Modern Languages, Islamabad.

Waliullah & Ahmad, S. (2025). Impact of Fiscal Policy on Pakistan's GDP: How Much and How Long? *SBP Working Paper No.117*.

Waqas, M., & Awan, M.S. (2012). Exchange Rate, Interest Rate and Ricardian Equivalence Evidence from Pakistan, *The Romanian Economic Journal*, Vol.15, No.46.

World Bank (1993). Viet Nam Transition to the Market: An Economic Report, World Bank, Washington D.C.

WB (2006). The role of postal networks in expanding access to financial services: Volume I. World Bank, Washington, D.C.

WB (2021). Financial inclusion and the role of the post office, World Bank, Washington, D.C.

WB (2022a). From Swimming in Sand to High and Sustainable Growth, World Bank, Washington D.C.

WB (2022b). Pakistan Development Update: Inflation and the Poor, World Bank, Washington, DC.

WB (2023). Pakistan Federal Public Expenditure Review 2023, ed. *Reducing Pakistan's Persistent Fiscal Deficits*, World Bank, Washington D.C.

World Bank (n.d.). World Development Indicators, World Bank, Washington, D.C.

Zahid, A., Bhatti, M.A., Khan, A.J. (2018). Ricardian Equivalence, Twin Deficits and Feldstein-Horioka Hypotheses: Empirical Analysis form Pakistan, *Kashmir Economic Review*, Vol.27, No.2.

Zhuang, J., Gunatilake, H., Niimi, Y., Khan, M. E., Jiang, Y., Hasan, R., Khor, N., Lagman-Martin, A. S., Bracey, P., & Huang, B. (2009). Financial Sector Development, Economic Growth, and Poverty Reduction: A literature review, *ADB Economics Working Paper Series No. 173*, Asian Development Bank.

Zulfiqar, G.M. (2022). The Social Relations of Gold: How a Gendered Asset Serves Social Reproduction and Finance in Pakistan, *Gender, Work & Organization*, Vol.29, No.3.