



GROWTH FRAMEWORK

A framework for productivity and export-led growth in Pakistan

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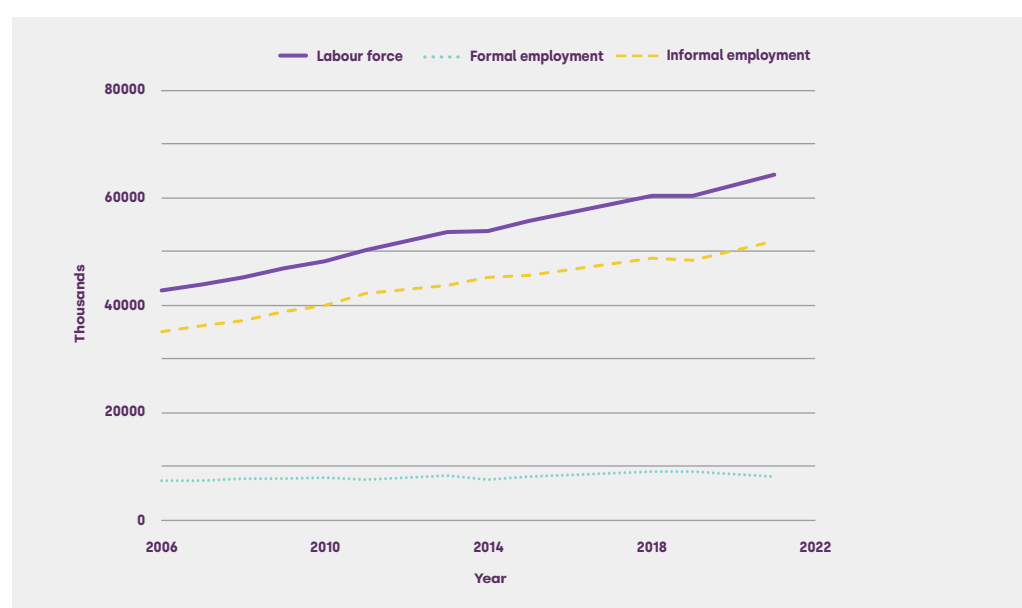
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1. Preamble

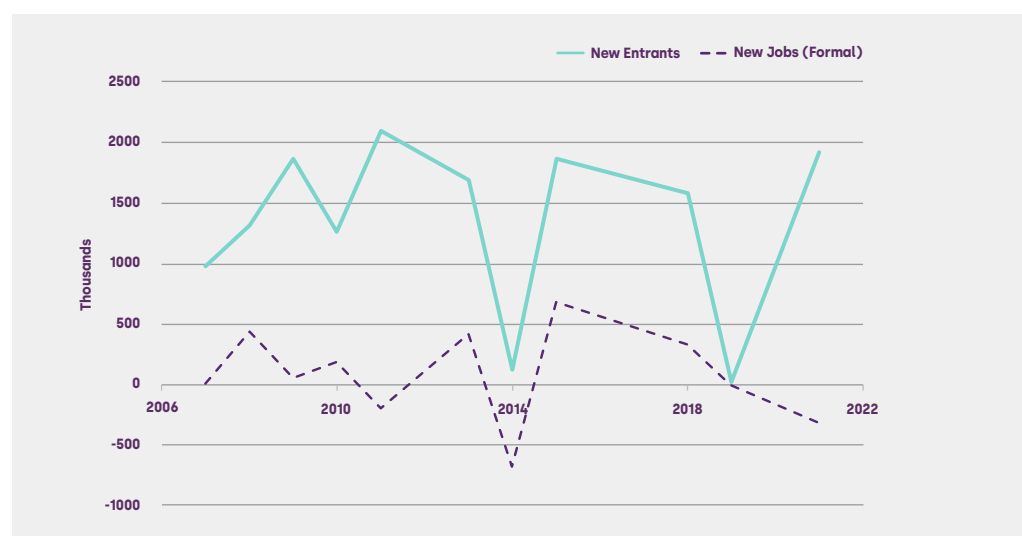
Any growth framework for Pakistan must have sustained, productive job creation as a key objective. Currently, in Pakistan, only 8 million of the 61 million people reported as employed (around 1 out of 8) work in the formal economy (Government of Pakistan, 2022a), while the rest are in low-productivity, low-wage jobs in the informal economy (**Figure 1a**). With population growth of 1.95%, the highest in South Asia, millions of young workers from low- and middle-income households enter the labour force every year to face a demoralising job gap (**Figure 1b**). Having borne the brunt of inflation associated with balance of payments crises since the 1990s, they expect better.

Figure 1a: Job growth in the formal and the informal economy



Source: Pakistan Labour Force Survey

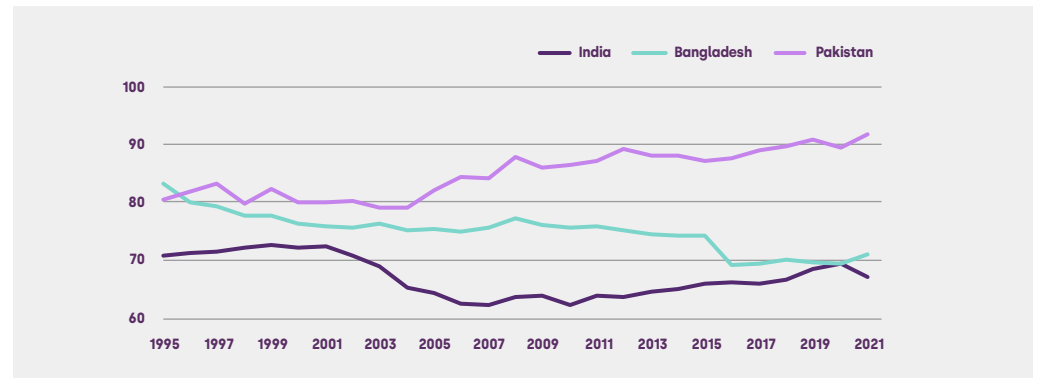
Figure 1b: The growing job gap to be filled



Source: Pakistan Labour Force Survey

A growth framework must therefore aim for sustained high growth (7% or more per year) with rising job creation in the formal sector. The current structure of Pakistan's economy, however, does not fare well against this objective. With consumption making up 94% of GDP—the highest in South Asia (**Figure 2**) — and much of it import-intensive, Pakistan's external position is highly vulnerable. When combined with stagnant exports (**Figure 3**) and rising debt-service costs (**Figure 4**), GDP growth above 3.8% drives the current-account deficit to unsustainable levels, risking a balance-of-payments crisis (Rosbach and Aleksanyan, 2019).

Figure 2: Final consumption as a share of GDP (%)



Source: World Development Indicators

Figure 3: Rising imports, falling exports

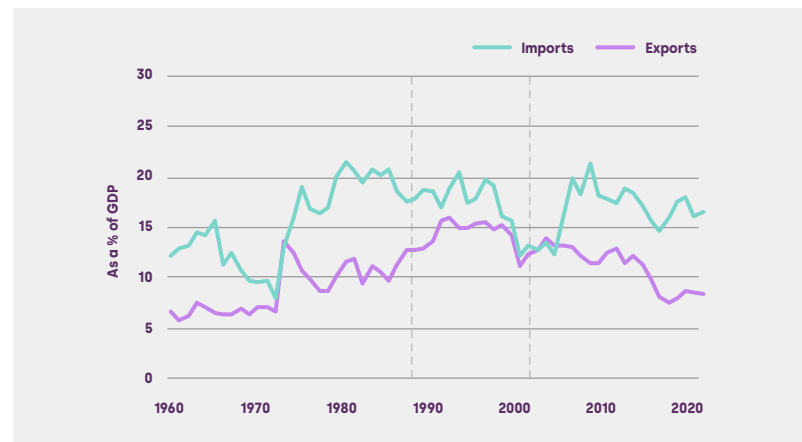
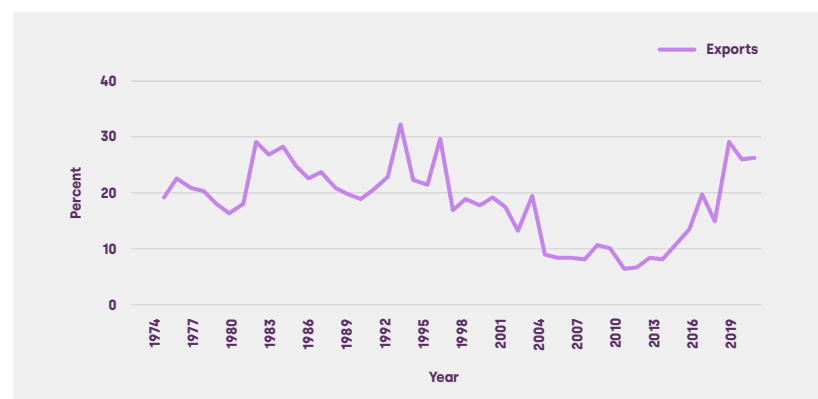
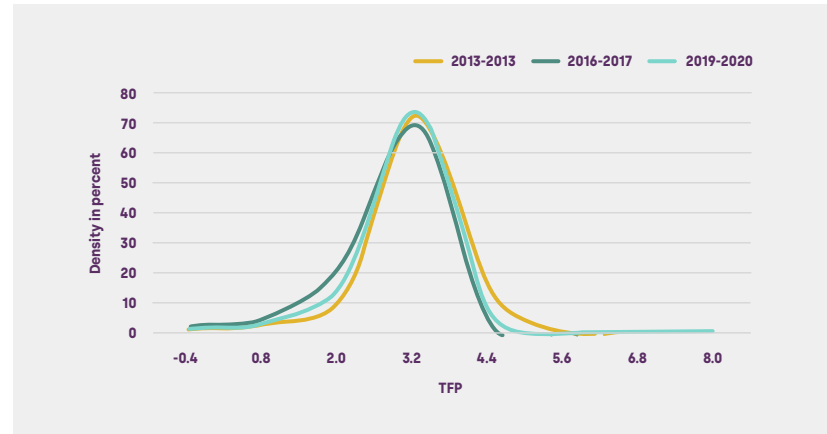


Figure 4: Rising debt service



Sustainable job creation and high GDP growth require **expanding exports** — manufacturing, agriculture, and modern services (IT etc.) — to overcome balance of payment vulnerabilities. In turn, this requires addressing the factors that have contributed to the economy-wide **stagnation of productivity** (Figure 5).

Figure 5: Total factor productivity at the firm level level has stagnated over time



Source: World Bank Group, 2022

Going forward, **adapting to climate change and reducing emissions** will be an important determinant of international competitiveness. Trade, energy, agriculture, and industrial policy will need to incorporate the “greening of technology” into initiatives to restructure the economy for productivity growth.

The **ongoing stabilisation of the economy** provides an opportunity to implement fiscally-neutral and cost-effective interventions to remove distortions that have lowered firm productivity and made firms inward-looking. This will also help pivot the role of government from a heavy-handed presence to one that allows the private sector to lead change within the economy.

Interventions that drive the growth framework **focus on removing distortions** that have, since at least the 1990s, shifted the economy towards a structure dominated by consumption, non-tradable sectors, and low productivity. The balance of payments crises accompanying this pivot have resulted in a single-minded focus on procuring foreign exchange as the solution to the economy’s problems. This is evidenced by increased remittances, now around USD 30 billion a year (8-10% of GDP in the last two decades), and substantial concessionary capital flows (around USD 3 billion a year). What needs fixing are the distortions that prevent available resources from being put to productive use.

Categories of **interventions** that will be explored in the growth framework include:

- reversing the tax disadvantage faced by exporting firms (that raise input cost) and bringing the currently excluded non-tradable sector into the tax net;
- synchronising State-Owned Enterprise (SOE) reform (including privatisation) and Foreign Direct Investment (FDI) strategy with initiatives for productivity improvement and export-led growth;
- removing regulations that increase the cost of doing business and serve no useful purpose;
- fine-tuning trade policy to promote climate change consistent competitiveness;
- reforming energy to make it efficient and less dependent on fossil fuels;
- targeting stabilisation-consistent subsidies/incentives using a new industrial policy framework to facilitate productivity growth;
- increasing climate change-consistent agricultural productivity;
- managing cities to enjoy agglomeration benefits and to be more liveable and increasingly self-financed;
- upgrading and aligning skills and other human resource initiatives, especially women's labour force participation, with productivity-led growth.

The growth framework will get traction via existing federal and provincial policy platforms. This creates opportunities for **policy coordination** across federal line ministries, as well as provincial governments, which have a strong role in achieving the aspired restructuring of the economy. These platforms include a) federal and provincial budgets (including the annual federal Public Sector Development Program (PSDP) and provincial Annual Development Plans (ADPs); b) the Central Development Working Party; c) Trade policy; d) the National Economic Council and Executive Committee of the National Economic Council; e) the Special Investment Facilitation Council, and f) the Economic Coordination Committee.

Finally, the proposed approach to economic restructuring will require recourse to **data analytics** to measure and monitor progress towards policy targets, and course correction as needed. The rich data banks located at Federal Board of Revenue (FBR) and Ministry of Energy, for example, will be critical for the successful roll-out of reform. Key ministries will need to augment capacity for the proposed data analytical approach.

Powerful stakeholders benefit from the current distortions and will resist change. Data analytics will arm reformers with evidence for politically feasible trade-offs and conduct an informed debate to strengthen the reform constituencies.

The rest of the note outlines the key policy initiatives that will need to be developed and fine-tuned to restructure the economy. This growth framework can continue to evolve, guided by data analytics and the building of consensus for change.

ON EXPORT PESSIMISM

Fifty years ago, Pakistan's growth performance was compared favourably to South Korea's: the economy grew at 6% per year, income per capita was higher, and exports were also growing. This has changed dramatically since. Today, South Korea is an OECD country at USD 32,400 income per capita. Meanwhile, Pakistan's per capita income growth has crashed, and the country has regressed from the "poster child" of global development to the sick man of South Asia. In the last two decades, GDP per capita has taken off in South Korea, and India has surged ahead, while Pakistan's has stagnated.

Figure 6

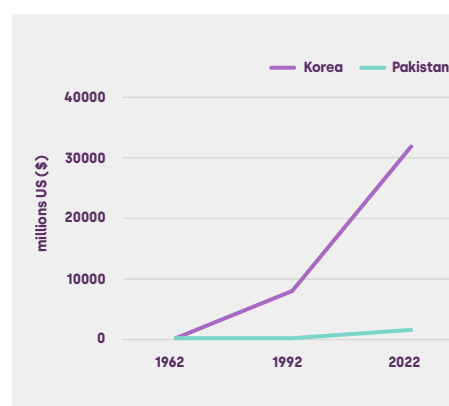
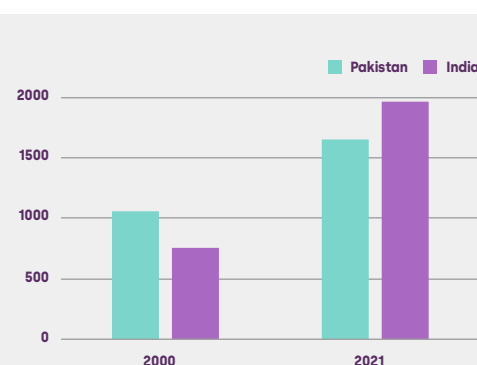


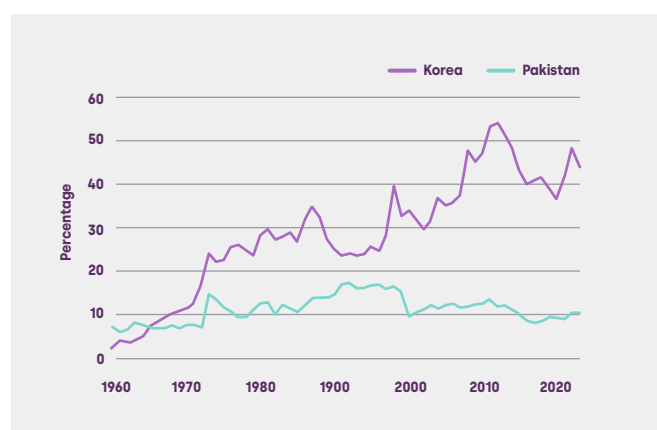
Figure 7



Source: World Development Indicators

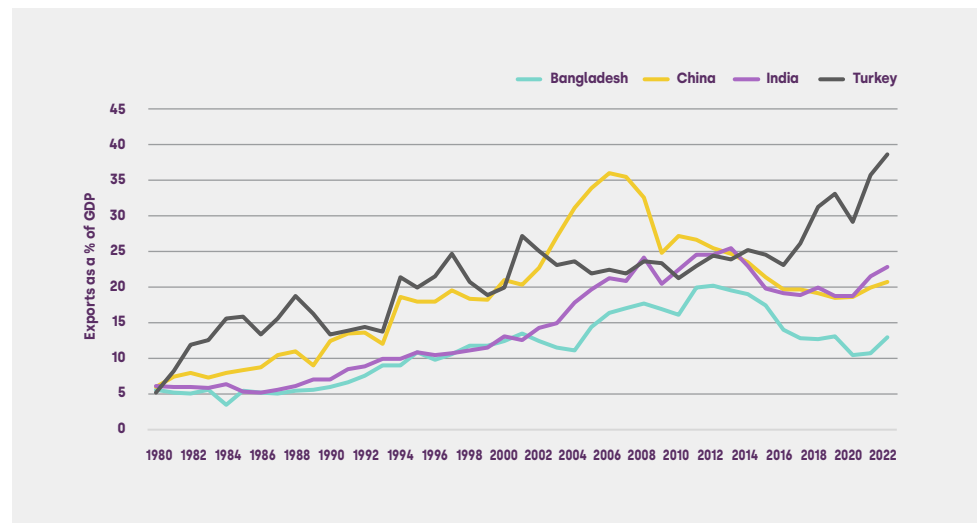
Many factors lie behind this decline, but one stands out in particular: South Korea's economy took off on the back of export-led growth. India's recent turnaround also rests on increased integration with global markets, led initially by IT exports but increasingly by a more diversified export mix. Indeed, all East Asian economies have transformed the living standards of their citizens by integrating into global markets and continue to do so, as demonstrated by Vietnam. China's, and more recently Turkey's, export-led sustained economic growth are also well-known.

Figure 8



(Box continues on the next page)

Figure 9



Source: World Development Indicators

Export pessimism is rife today, but such pessimism even existed 50 years ago when East Asia first embarked on its integration into the global economy.

"To raise the share of domestic value added in exports and to stay ahead of late developing countries, (we) must upgrade industry but do (we) have the right national character to succeed in sophisticated industry?"

This statement was made by senior South Korean policymakers in the 1960s, but they overcame this pessimism soon enough. In the 1970s and 80s Thailand, Malaysia, and Singapore overcame export pessimism. China followed suit in the 1990s, Turkey in the 2000s and Vietnam is doing so today. In South Asia, both India and Bangladesh have addressed this in selected sectors and are looking to replicate the success of others. Yet, export pessimism continues to be a dominant view expressed by Pakistan's business houses and policy documents. It is often conveyed in statements such as, "we have no export surplus". This ignores the misallocation of resources that erodes export performance.

Two core pillars have allowed economies to make the transition from export pessimism to export-led growth:

1. Overall economic management (exchange rate, fiscal, and trade policies to influence saving and investment outcomes) that encourages the business community to make profits beyond the domestic market in the much larger global economy.
2. Integrating workers into the global economy via products they manufacture, rather than selling labour to better-managed economies.

2. Productivity¹

Evidence from a recent World Bank report suggests that overall productivity growth has slackened in recent years (World Bank, 2022a). Between 1991 and 2021, labour productivity in Pakistan - measured in constant 2015 US dollar value added per worker - increased from about USD 3200 to USD 4700, a multiple of 0.5. Over the same period, labour productivity in Vietnam shot up from USD 1200 to USD 6000, a multiple of five.

Productivity trends at the firm level corroborate the stagnation in overall productivity. They also reveal variability across firms and shed light on the points of remedial policy interventions.

The study also reports that most of the slowdown in productivity growth is because firms are not bringing about the needed changes in managerial practices and technology. Loss-making firms, including many state-owned enterprises (SOEs) upstream in the production chain, have low productivity and survive on subsidies. Firm size remains small despite age. This is the case even for exporting firms. Pakistani exporting firms exported USD 1.5 million in 2021 on average, compared to USD 3.8 million by the average Bangladeshi exporting firm (World Bank, 2022a). Small size and longevity of loss-making firms discourage productivity enhancing innovation. There are few joint ventures with foreign firms to facilitate learning by doing and access to markets.

The productivity trend in agriculture is also not promising. Following a decade (1960-1970) of impressive growth, total factor productivity (TFP) in agriculture has grown sluggishly, and decreased consecutively in the five years from 2015-19 (World Bank, 2022a). At the provincial level, the two main crop-growing provinces of Sindh and Punjab experienced **negative** growth rates of TFP experienced only moderate increases in TFP from 1993-2019 averaging of 0.4% and 0.3% respectively. These were offset partially by negative TFP growth rates of -1.1% in Khyber-Pakhtunkhwa (KP) and -1.4% in Balochistan (World Bank, 2022a). Much of the growth in agricultural output has therefore been due to greater input use rather better technology. Unchecked climate change will mean even greater productivity declines going forward (see the discussion on agriculture below).

Sectoral employment shares reflect Pakistan's stagnating labour productivity. The share of agriculture in employment has hovered around 40% for the last three decades, despite the sector's stagnating productivity growth. When labour does move out of agriculture to other sectors, the productivity jump is modest. This is because the productivity gap between agriculture, manufacturing and services is small and declining, because of the latter's productivity decline.²

Overall, high growth is sustained when it is driven by firms that export. Competition in the international market encourages innovation and unleashes

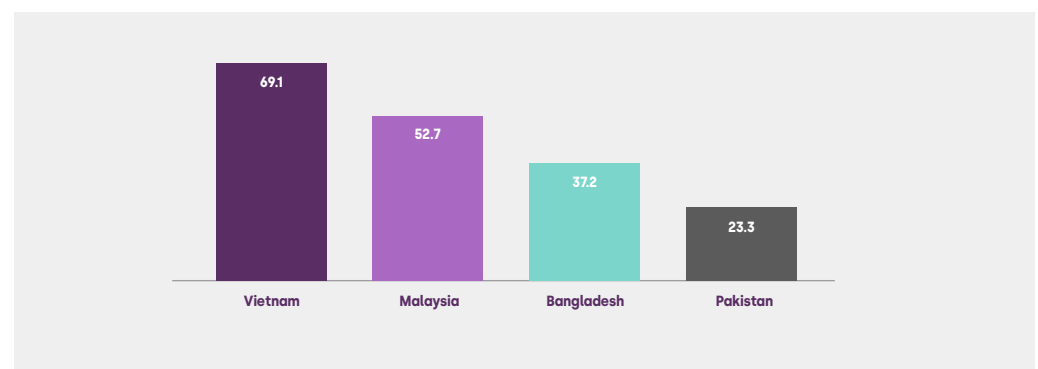
¹ The discussion draws on World Bank (2022a).

² ADB Working Paper reports that while India's and China's labour productivity in services have, since the 1990s, grown at an average of approximately 8%, Pakistan belongs to a set of countries where the average is a meagre 2-3%. In industry, both India and Pakistan belong to an underperforming set of countries whose growth in labour productivity is eclipsed by high performers such as Malaysia, Thailand and China (Noland et. al., 2012).

productivity. Firms exporting to rich country markets are more innovative and are better at job creation (Wadho et. al., 2019). Publicly listed companies' data corroborates this, showing that exporting companies have higher productivity than domestically oriented firms. The falling share of exports in GDP is thus of concern, with implications for overall economic productivity.

It is well recognised that transformative growth cannot happen when a large section of the population is outside the labour force or stuck in low productivity jobs. Malaysia achieved high growth in the three decades between 1970 and 1990 by bringing women into the formal labour force, especially in manufacturing exports. The rise in women's labour force participation rate (WLPR) is also an important factor in Bangladesh's ongoing transformation. Vietnam's rapid productivity growth also correlates well with its very high WLPR. In Pakistan, although the WLPR has been gradually increasing over time (unlike India, where it has been declining), the current rate remains low at 23.3%, which is far behind Bangladesh as seen in **Figure 10**. This can be improved through more years of schooling for girls and improving their working conditions. It is estimated that achieving Bangladesh's WLPR could increase GDP by 20%, a substantial jump in productivity (World Bank, 2022a).

Figure 10: Women's labour force participation



Source: WDI Database

Underpinning the decline in productivity are systemic distortions that have made the economy more inward-looking since the 1990s. Real exchange rate appreciation was important in this directional change. This followed large inflows of concessionary capital to support government budgets and remittances from Pakistani workers overseas. Not allowing the real exchange rate to appreciate is necessary but not sufficient in reversing the decline in productivity. Systemic distortions on account of over-regulation of the economy will need to be removed, and low productivity state-owned enterprises that introduce high costs at the upper end of the value chain will need to be reformed or privatised. FDI strategy will need to promote joint ventures with high-performing global firms to promote learning by doing, which is vital for productivity growth. Fiscal, trade, city management, and industrial policies will need to be aligned with productivity-improving and export-orientated changes to the economy. In staying the course on these pathways, the government's role will be critical but different: it will be to acquire policy design and implementation capability to allow the private sector to play the lead role. This discussion is taken up next.

3. Pathways to improve productivity and export orientation

3.1 Fiscal policy

Fiscal policy interventions aimed at boosting productivity and orientating firms towards exports must be designed under the overall umbrella of the ongoing stabilisation programme. Selected tax, subsidy, and public investment components of fiscal policy are discussed with that in mind. Others will be explored in this note.

Taxes: Tax policy reform is a win-win as it would increase revenue and remove a key distortion impeding productivity and export growth. The tax structure has made it attractive for firms to move out of tradeable activities and into non-tradeable activities (also known as the “Dutch Disease”). Because of policy forbearance and weakness in tax administration, real estate, retail and wholesale trade enjoy much lower taxation than manufacturing and other corporate activity. This results from poor valuation, low capital gains’ tax rate, rampant forbearance for real estate, and a complete exclusion of wholesale and retail trade from the tax net (CDPR, 2023).

Table 1: Direct Tax Collection Gap 2018-19

	% SHARE IN TAX COLLECTION	% SHARE IN GDP	GAP
Manufacturing	34.5	22.5	12
Wholesale and retail trade	2.96	18.2	-9.3

Direct taxes include tax demanded, voluntary payments and tax withheld. Source: CDPR (2023)

Table 2: Property tax collection (% GDP), 2020-21

France	3.96
United Kingdom	3.16
USA	3.12
China	1.32
Mexico	0.31
Bangladesh	0.2
India	0.8
Pakistan	0.003

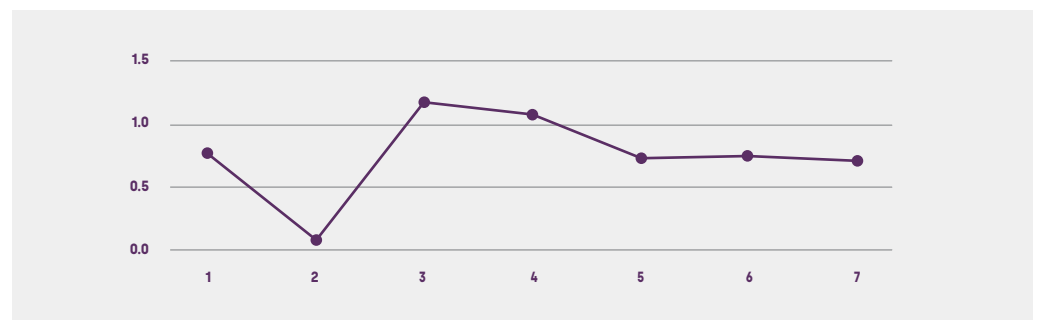
Source: IMF, Government Finance Statistics yearbooks, Provincial budget statements

The need to plug the chronic fiscal deficit and the failure to broaden the tax net have resulted in higher import duties which, combined with problems in getting duty refunds (drawbacks), have exacerbated the difficulties of exporting firms (Nabi and Nasim, 2024; World Bank, 2022). **Section 3.4** on trade policy expands on this.

Subsidies: The structure of subsidies has not evolved to compensate for symptoms of the Dutch Disease. The energy subsidy, the largest in terms of overall budget, is greater for residential consumers than for manufacturing units and among exporters for insiders (older, entrenched players) than for outsiders (newer, more dynamic players). This is discussed in more detail in **Section 3.5** on energy reform.

Public investment: Fiscal deficit targets have been met largely by cutting back public investment instead of increasing revenue and sharply reducing untargeted subsidies. The result is a steady reduction in public investment (**Figure 11**). Much needed improvements in in-land transport and port operations, critical for international competitiveness, have been repeatedly postponed.

Figure 11: Public investment 2016-2022



Source: Pakistan Economic Survey 2021-22

The Public Sector Development Program must be designed, monitored and evaluated with firm productivity and export targets in mind. Public investment, within the stabilisation umbrella, must crowd-in private investment including FDI. The fiscal headroom created by additional revenue and streamlining of subsidies will also be needed to upskill human capital, especially women workers. The note will explore this in more detail.

Areas for further policy and analytical work

1. How can tax structures be reformed to address the under-taxation of non-tradeable sectors such as real estate and wholesale or retail trade, which distort resource allocation and productivity?
2. What policies can be implemented to incentivise tradeable sectors by reducing tax disadvantages and broadening the tax base?
3. How can property tax systems be modernised, particularly through accurate valuation mechanisms, to enhance fiscal policy effectiveness?
4. What public investment priorities should be adopted to improve critical infrastructure, such as transport and ports, in alignment with export and productivity goals?
5. How can fiscal headroom be leveraged to attract private and foreign direct investment in infrastructure and productivity improvement?
6. Why is it important to re-evaluate subsidy structures, particularly in energy, to ensure they support dynamic firms and productivity growth rather than entrenched players or residential consumers?

3.2 State-owned enterprises, privatisation and FDI³

3.2.1 State-owned enterprises (SOEs)

Poor-performing SOEs adversely impact private firms' productivity, international competitiveness, and ability to create jobs. The government has publicly recognised problems, with its portfolio of 88 commercial state-owned enterprises. According to official reports, "administrative, management, and policy issues have led to the financial deterioration of various SOEs, creating a significant fiscal burden for the federal government and delivering poor services to end-users" (Finance Division, 2021, p. 4; Ministry of Finance, 2023, p. 1).

Fiscal and operational challenges

Financial Losses: Net losses from SOEs ranged from PKR 143 billion in FY19 to PKR 286 billion in FY18, totalling PKR 162 billion in FY22 (Footprint Report, p. 3), equivalent to 0.2% of GDP (World Bank, 2024a, p.21).

- Return-on-assets (ROA):
 - Only 22 SOEs (accounting for 12% of total portfolio assets) achieved a 5% or higher ROA in FY22.
 - 31 SOEs (49% of assets) posted a positive but low ROA of 0-5%.
 - 33 SOEs (39% of assets) recorded a net loss, with the weakest performers primarily in power generation or distribution and infrastructure or transport sectors.
- Fiscal outflows: In FY22, fiscal outflows to SOEs accounted for 18% of the federal government's budget deficit (World Bank, 2024a, p.22), while net fiscal outflows grew to 1.4% of GDP.

Impact on credit markets

- The fiscal drain imposed by SOEs increasingly crowds out private sector credit:
 - Bank credit to the private sector fell from 26.3% in June 2023 to 24.3% in December 2023.
 - Bank credit to the public sector rose from 73.7% to 75.6%, placing Pakistan among the highest public sector credit users globally (World Bank, 2024a, p.7).

As of 2022, domestic credit to Pakistan's private sector was only 15% of GDP, the lowest among major regional economies (World Bank, 2024b). The high leverage, insolvency rates, and circular debt tied to SOEs continue to constrain private sector development and broader economic growth.

3 This discussion draws on: 1) William Mako, "Managing Pakistan's Portfolio of Commercial state-owned enterprises (SOEs)" REVISED DRAFT 27 May 2024 Finance Division; 2) "State-owned enterprises Triage: Reforms and Way Forward" ("Triage Report"), March 2021 Ministry of Finance; 3) "Federal Footprint: State Owned Enterprises (SOEs) Consolidated Report FY22," ("Footprint Report"), December 2023 World Bank; 4) *Pakistan Development Update: Fiscal Impact of Federal state-owned enterprises* ("PDU"), April 2024.

A framework for reform

The Finance Division's Triage Report (Government of Pakistan, 2021) offers a pragmatic approach to restructuring the SOE portfolio by addressing two critical questions:

- 1. Alignment with core functions:**
 - a.** Does the SOE serve specific public policy objectives?
 - b.** These "core functions" fall into five key categories:
 - i.** Food security, ensuring the availability of essential goods.
 - ii.** Large-scale infrastructure, supporting foundational development needs.
 - iii.** National security, where operations are essential for defence.
 - iv.** Government-to-government relations, facilitating strategic engagements.
 - v.** Supply of goods or services of national economic importance, crucial for public welfare.
- 2. Feasibility of private sector involvement:**
 - a.** Could the private sector manage SOE activity more effectively?
 - b.** Key considerations include:
 - i.** Whether the activity constitutes a natural monopoly requiring regulation to ensure cost-effectiveness and social benefit.
 - ii.** The existence of significant positive externalities justifying government involvement.
 - iii.** Availability of alternative mechanisms for delivering the same function (Triage Report, pp. 4 and 8-9).

This structured framework provides a sound basis for deciding which SOEs to retain, privatise, or phase out. For SOEs that are retained, the following measures are essential:

- a.** Financial discipline: Ensure cost-effectiveness and focus on meeting core objectives without imposing excessive fiscal burdens.
- b.** Transparent performance criteria: Establish clear benchmarks for evaluating operational efficiency and service delivery.
- c.** Enhanced reporting standards: Implement robust financial reporting and accountability mechanisms to prevent mismanagement and fiscal drain. This approach promotes a leaner and more efficient public sector, enabling SOEs to deliver on critical national functions while fostering a more competitive and vibrant private sector.

3.2.2 Privatisation

Privatisation will help lower the financial burden, but it must also be informed by its impact on productivity and export-led growth. At least 12 SOEs are slated for privatisation by the Finance Division (**Table 4**). Ten are deemed as privatisations, one liquidation – asset sales being a form of privatisation – of Industrial Development Bank Ltd., and a recent request for expressions of interest in acquiring 51% of the shares in Pakistan International Airlines.

Table 3: Privatisations Underway as of March 2021

Entity Name	Financial implication net profits (loss) FY 2018-19 Rs. million	FA hiring	Due diligence	Transaction structure	Invitation and prequalification of Investors	Bidding process	Financial closure
Pakistan Steel Mill Corporation (Private) Limited	(16,550)	✓	✓	✓			
SME Bank	(1,073)	✓	✓	✓	✓		
GENCO-III: Northern Power Generation Company Limited, Thermal Power Station, Muzaffargarh	(694)						
First Woman Bank Limited	247	✓	✓	✓			
Pakistan Reinsurance Company Limited	690	✓	✓	✓			
State Life Insurance Corporation	2,011	The process is contingent upon corporatization					
House Building Finance Company Limited	2,762	✓	✓	✓			
GENCO-II: Central Power Generation Company Limited, Thermal Power Station, Guddo	3,517	Hiring of FA is under process					
Pakistan Petroleum Company	59,459	The process for hiring has been initiated					
Oil and Gas Development Company Limited	118,386	The process for OGDCL will be initiated after PPL's FA on board					

Source: Triage report, p.24; Financial Times.

At least one-quarter of these twelve privatisation efforts pose serious challenges, including liability cancellation (SME bank) and insolvency (GENCO I and II, PIA), which must be addressed to hasten the privatisation. International experience can guide post-privatisation regulatory oversight.

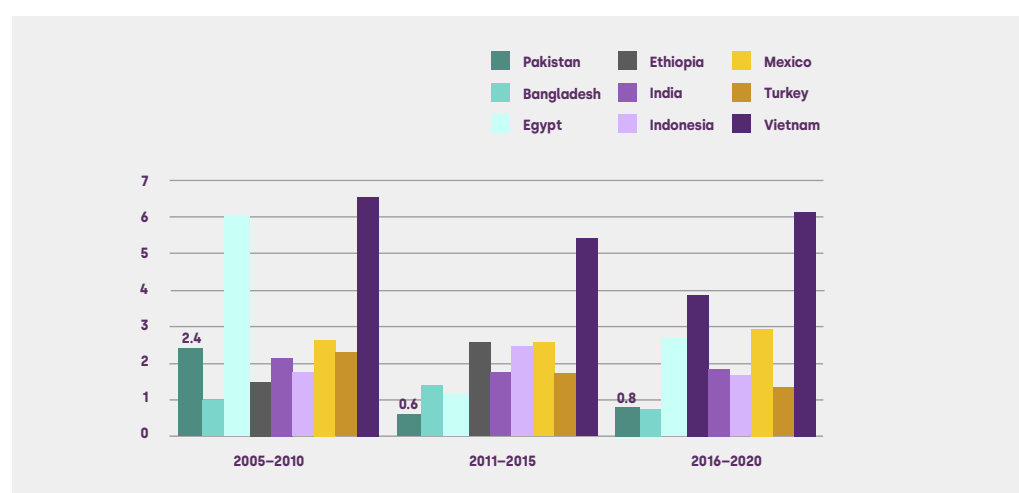
3.2.3 Attracting Foreign Direct Investment (FDI)

For a foreign exchange constrained government, it is tempting to welcome any FDI. However, not all FDI is consistent with an export-promoting, job-creating growth framework. FDI in non-tradables will strengthen the Rupee temporarily but may further weaken the current account. The priority is to attract FDI in tradables to connect our workers with world markets through competitively produced products. Such investment can be an important source of innovation in management practices, production technology, and market access - key elements of productivity growth, including spillover effects on

local firms connected to FDI firms. In partnership with local investors, FDI facilitates horizontal enforcement of productivity growth initiatives (as seen in contractual arrangements with buyers in our ready-made garments sector) as opposed to the less effective but more common vertical enforcement. This is discussed in more detail in Section 3.6 on industrial policy (Khan, 2024).

According to the World Bank (2022), Pakistan has an untapped potential to attract USD 2.8 billion worth of FDI annually. Privatisation of SOEs, a well-designed program for upgrading the trade infrastructure, farming and food processing and textiles (particularly ready-made garments) present opportunities for realising the productivity-enhancing FDI potential. This has been on the reform agenda for many years and, if implemented, would have helped alleviate the adverse impact of high remittances and concessionary capital flows on international competitiveness. **Figure 12** highlights Pakistan's low FDI compared to other nations (some with similar economic characteristics), demonstrating how Pakistan has lagged far behind its competitors.

Figure 12: Net FDI inflows in Pakistan and other countries as a share of GDP



Source: UNCTAD

Areas for further policy and analytical work

1. What are the economic and fiscal impacts of privatisation and state-owned enterprise (SOE) reform in fostering productivity and export-led growth?
2. How can pre-privatisation restructuring, such as addressing insolvency and liabilities, be effectively managed to enable successful privatisation?
3. What regulatory frameworks are necessary to ensure post-privatisation efficiency and sustainable economic outcomes?
4. What mechanisms can be developed to attract high-quality FDI in tradable sectors?
5. How can international best practices for SOE reform be adapted and implemented to achieve efficiency and competitiveness?
6. What strategies can enhance productivity spillovers from FDI to maximise its impact on the broader economy?
7. How do trade infrastructure upgrades impact global market integration for Pakistan's industries, and what are the priority areas for investment?

3.3 Regulatory reform

The regulatory interface of government with private enterprises in Pakistan covers several aspects of the lifecycle, for example, licensing and registration, contract enforcement, insolvency and bankruptcy, labour and employee regulation, taxation, entry and exit requirements, and sector-specific regulations. A detailed review of the federal regulatory structure shows that about 118 regulatory bodies are functional at the level of the Federal Government with many more at the provincial level (Haque and Qasim, 2022).

The regulatory burden imposed by this interface is an important impediment for Pakistani firms. Importantly, it hinders investment, including FDI, and thus affects firm productivity and export competitiveness. The World Bank estimates that the regulatory cost of starting a business is 6.9% of Gross National Income in Pakistan. The Pakistan Institute of Development Economics' sludge audit estimated the cost of regulation in key selected activities to be more than 39% of GDP (Haque and Qasim, 2022). In short, there is established evidence suggesting that Pakistan is not only overly regulated, but the regulations are badly managed too. Enabling transparent, and easy-to-comply regulations is essential to inculcate fair competition and to support competitiveness. However, while impacting the growth of good firms, the tiring nature of regulations in Pakistan creates space for the 'rent seekers' in the private and public sectors who then support the status quo.

While the regulatory burden impacts all firms, there is a substantial body of evidence showing that SMEs - often an important dimension of the export sector because of their flexibility/agility - suffer more than large firms. Additionally, as compared to large and micro firms, SMEs in Pakistan are more likely to report extra costs when visited by government officials. They also report over twice as many visits by tax officials and are three to four times more likely to have paid 'speed money' (USAID SMEA, 2021). Regulatory costs are largely fixed (for example record keeping), and so they form a larger fraction of the costs of smaller firms. Secondly, larger firms can hire dedicated specialists to look after their compliance needs. In SMEs, the entrepreneurs, who are the most valuable resource, usually undertake this function themselves, which diverts them from the critical task of firm growth. This distinction is important as most exporting firms in Pakistan are SMEs, with 198 firms contributing 50% of total exports and less than 3,000 firms exporting more than USD 1 million, while the median value of exports by a firm is about USD 105,000. Thus, the regulatory burden is critically impacting the competitiveness of exports, which now faces fierce competition and a deeper compliance requirement under new standards being introduced for climate action.

The regulatory environment in Pakistan has been left unchecked, and consequently, the regulations have piled up, adversely affecting firm productivity and export potential. New regulations are typically added as required, without a symmetrical removal of regulations that are no longer required. Many of the compliances required are, therefore, irrelevant or outdated, which makes them impossible to comply with at a reasonable cost and effort. Consequently, many small firms are non-compliant. There has been no framework to discipline regulators when introducing new regulations or designing regulations based on the risk of non-compliance. This has resulted in the stockpiling of regulations regardless of the nature of the business.

Finally, while the country has produced, and is producing some of the best minds in information technology, automation for regulatory enforcement and management has been a slow starter.

The measures to address the regulatory burden include:

- **Regulatory impact assessment (RIA) and evaluation tools:** The government has developed and issued guidelines for undertaking the regulatory impact assessment and regulator impact evaluation. These tools allow the regulators to make an informed assessment of regulatory reforms in terms of impact/cost to select the most impactful reforms. The evaluation guide helps determine impact and follow-up compliance ex-post. Over 300 federal and provincial regulators have been trained. RIA is a well-established tool used globally to improve rule/regulation-making quality and promote good governance.
- **Principle Based Regulatory Framework (PBRF):** The government has approved the PBRF, which provides a systematic approach to setting new regulations and advocates for regulations post-establishment and the operationalisation of businesses. More than 300 regulators have been trained.
- **Zero Time to Start-up Policy (ZTSP):** The ZTSP has been developed and is ready for submission to the cabinet. The policy divides the businesses into three risk categories (low, medium, and high). The policy makes a case that for low-risk businesses there should be no approval required to start, the medium-risk businesses should get approvals in one day with any required submission to follow later, and high-risk businesses should follow required submissions before starting. This policy means that 80% of businesses will face no or minimal start-up cost. The benefit for federal provisions will be upto PKR 1,000 billion per year.
- **Asaan Karobar Act:** The government has finalised the draft of the Asaan Karobar Legislation that will enable three things:
 - **National Regulatory Delivery Office (NRDO):** NRDO will act as the regulator's supervisor and help implement the Regulatory Guillotine. It will also be the monitor to ensure RIA and PBRF are consistently applied in designing new regulations.
 - **Regulatory Guillotine:** The legislation provides the legal space to implement the Regulatory Guillotine.⁶ Evidence from over 15 countries suggests a substantial impact (2-3% of GDP) in reducing the cost of doing business. Similar impacts in the case of Pakistan will save businesses approximately PKR 3 trillion per year.
 - **Pakistan Single Registration Portal:** The law enables the establishment of a digital platform where all licenses, NOC, fees, charges, and approvals can be granted under one registration application. This will cover provincial nodes and e-pay of all taxes, charges, and fees. Similar systems in other countries, such as Singapore, have reduced costs by 30% or more.

Unlocking sector-level reforms: The government is implementing a sectoral approach to unlocking key binding constraints limiting growth and exports. A recent example is the work done in the pharmaceutical sector, which is likely to enable new investment of USD 1.5 billion and exports of USD 5 billion in three years. The end-to-end sector-level approach for key exporting sectors

will create substantial investment, export, and employment multipliers. There is a need to deepen this approach.

Areas for further policy and analytical work

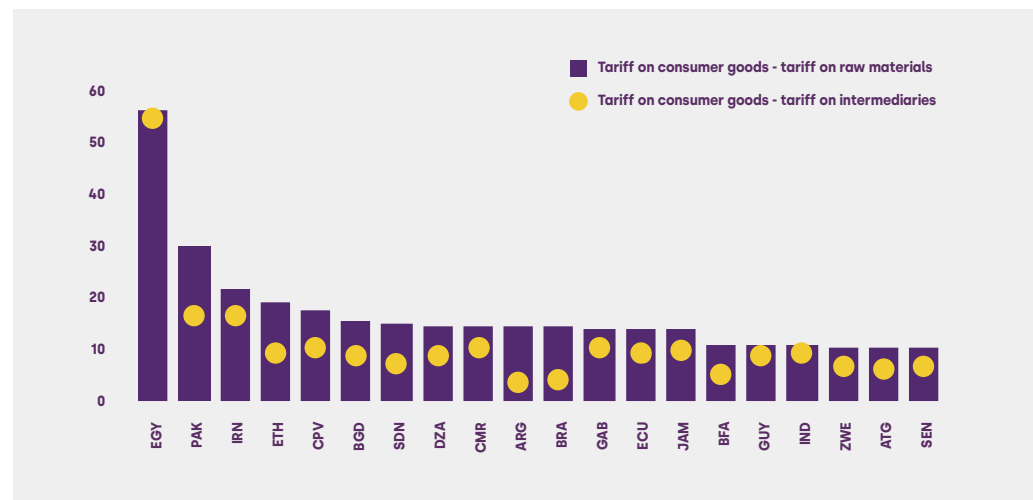
1. How can the use of Regulatory Impact Assessments be expanded across federal and provincial regulators to ensure new regulations are assessed for cost-effectiveness and overall benefit?
2. What are the outcomes of implementing the principle-based regulatory framework, and how has it impacted business operations and compliance costs? How can feedback from regulators and businesses be used to refine the framework for reducing regulatory burdens and improving regulatory quality?
3. What is the effectiveness of the Zero Time to Start-up Policy (ZTSP) in categorising businesses by risk levels and reducing start-up times and costs, especially for low- and medium-risk businesses? What challenges and opportunities for further policy adjustments emerge based on feedback from entrepreneurs?
4. How effective is the Asaan Karobar Act, including its components, such as the National Regulatory Delivery Office, Regulatory Guillotine, and Pakistan Single Registration Portal, in reducing regulatory burdens and streamlining business processes? What is its overall economic impact on SMEs and the broader business environment?
5. What has been the impact of sectoral regulatory reforms on high-potential industries such as pharmaceuticals regarding investment, exports, and employment? What additional sectors could benefit from similar reforms to boost economic growth and competitiveness?

3.4 Trade policy

Trade policy has a critical role in productivity growth including by facilitating firms' access to Global Value Chains (GVCs). GVCs account for increasing share of global trade and this will continue to grow. They have facilitated productivity growth as seen in China and Vietnam. Our declining share in world trade and lack of preparedness in entering GVCs must be addressed.

Import duties on intermediates increase the cost of production of exports and on final goods, increase the profitability of producing in the domestic market and discourages entry in GVCs. The last decade saw a reduction in average import duties (as part of the 2013 Extended Fund Facility 2013 with the IMF to simplify the duty structure by lowering the overall rate and reducing the number of slabs to four) from 25% in 2014 to 18.7% in 2020. However, additional customs and regulatory duties were imposed. Consequently, Pakistan is now among the most protected economies in the world (**Figure 13**).

Figure 13: Tariff on consumer goods



Source: "From Swimming in Sand to High and Sustained Productivity Growth," Pakistan Country Economic Memorandum, 2022

According to a recent World Bank study, the manufacturing sector has seen a 50% increase in duties on intermediates, which increases costs, discourages innovation and lowers productivity. The study estimates that 85% of the reduction in productivity is accounted for by the increase in duties on intermediaries. Similarly, a 10% increase in import duties on final products increases profits for producing in the domestic market by 40% and thus discourages exports.

Trade policy will play a key role in rolling out tariff reforms and improving trade facilitation, increasing productivity, and enhancing the outward orientation of the economy. These measures include reform of export subsidies to expand eligibility, reduction of the subsidies rate, making subsidies conditional on export performance, digitalising and automating import duty remission schemes (backed by good audits), fully implementing the Pakistan Single Window programme and harmonising export intelligence provision.

Pakistan's location on important trade routes and between countries endowed with rich mineral wealth and those with a large and growing manufacturing base offers opportunities to integrate in GVCs, which should be fully exploited.

Climate change considerations

As global markets pivot towards sustainability to address the pressing climate crisis, there is a rising focus on environmentally friendly trade in goods and services. Trade policy can be critical in facilitating progress towards achieving domestic environmental objectives as well as preserving access to external markets. Many high-income countries have already begun including environmental protocols in their trade agreements. In essence, these agreements seek to ensure that imported goods meet the same environmental standards as domestically produced goods. A suitably designed trade policy can help Pakistan achieve compliance with evolving international standards, mitigate the costs associated with carbon emissions, and preserve access to export markets.

What policy instruments to leverage?

Tariffs: A key instrument affecting trade policy is tariffs. Pakistan's tariffs on environmental goods (EG) are currently 11% higher on average than those on non-EGs. This gap needs to be narrowed significantly. Compared with neighbouring and similar countries, Pakistan's average tariffs on EGs are notably higher. China and Vietnam, for instance, have tariffs that are less than half of Pakistan's, while India and Bangladesh have tariffs closer but still lower. Pakistan could start by reducing its average tariff on EGs to below the 8% applied by India. This move could be balanced by adjusting tariffs across high and low-carbon-intensity products to mitigate any impact on the current account balance (Iqbal et al. 2024).

Non-tariff measures: Emulating other countries, both developed and developing, there is a need to adopt a more active non-tariff measures (NTM) policy to achieve its carbon emission targets. Pakistan can be guided by the practices in India, Bangladesh, China, and Vietnam. There is also a need to apply NTMs across a wider range of EGs and in greater frequency. In terms of specific NTMs, Pakistan can adopt labelling and certification requirements for a wide range of EGs along with energy efficiency standards for EG imports, in line with its goals of reducing its overall carbon footprint (Iqbal et al. 2024).

Areas for further policy and analytical work

1. What is the potential impact of tariff reduction and imposing NTMs on selected export sectors?
2. What opportunities do we need to identify for tariff reduction on environment friendly goods?
3. What are the global shifts that Pakistan's exporters and policymakers need to be aware of that will affect its main exports, and how can policymakers prepare for the challenges they bring?
4. Which non-traditional/emerging sectors can the government focus on to diversify its exports?
5. Which sectors can the government prioritise based on global demand and promote to foreign investors such as those from the Middle East?

3.5 Energy

The key link between economic growth and energy in Pakistan lies in the necessity for reliable, affordable energy to fuel development. Broad challenges, including high energy costs, fiscal unsustainability, low adoption of renewables, and the need for energy conservation and efficiency, directly impact economic growth. Access to affordable and reliable energy is crucial for powering industries, supporting businesses, and improving living standards. Moreover, investing in renewable energy and energy efficiency can reduce environmental impact and enhance energy security and resilience to external shocks. Addressing these energy-related challenges effectively can unlock Pakistan's economic potential by reducing costs, stimulating investment, promoting innovation, and creating new job opportunities in the energy sector and beyond. Thus, prioritising sustainable energy solutions is essential for fostering economic growth and resilience in Pakistan.

The challenges facing Pakistan's energy sector are well-known: rising electricity tariffs making energy unaffordable for the low-income individuals and hurting industrial competitiveness; the cost of generating electricity is very high; and theft and non-payment are widespread. Additionally, local gas is scarce, and excessive reliance on imported fossil fuels weakens the Pakistani Rupee. As of February 2024, the circular debt stands at more than PKR 5 trillion, making the energy sector fiscally unsustainable.

Without reforms, Pakistan's energy problems are expected to worsen in the coming decades. Climate change poses a significant challenge, with rising temperatures leading to decreased labour productivity and increased mortality rates. To mitigate these effects, households will need to increase their electricity consumption for cooling and access to water. Additionally, as global supply chains favour firms using clean energy increasingly, Pakistan's industry must access clean grid energy to stay competitive, highlighting the need for more renewable energy in the power sector.

A fiscally sustainable energy sector is essential for achieving clean, affordable energy, and this requires substantial medium to long-term changes. Below is an outline of some of the core priorities for Pakistan's energy sector. Many of the points raised require further research and analysis for more precise and in-depth recommendations, which in turn requires access to detailed monthly customer billing data, and a close partnership between the government and researchers.

Key areas of reform

Tariff design: The tariff design in Pakistan is rooted in an accounting perspective based on achieving projected revenue targets primarily by adjusting variable tariffs and incorporating poorly targeted subsidies. This approach is inefficient because it distorts prices away from marginal costs, is expensive due to the subsidies, and does not account for consumers' behavioural responses. Several competing policy solutions exist, such as increased reliance on fixed charges for revenue stability and maintaining status quo prices but lowering these to boost demand and pay off capacity payments. Additionally, the incremental benefit of targeting residential electricity subsidies through Benazir Income Support Program (BISP), with its fiscal constraints and lack of representativeness relative to the existing protected status, remains unclear. Detailed analysis for precise policy recommendations, which will work in Pakistan's context, requires providing access to detailed monthly customer billing data to researchers.

Theft and collection losses: Pakistan's power sector loses about 25 units to theft or non-payment for every 100 units of generated electricity. It is challenging to envision any business enduring a loss of approximately 25% of its annual output and remaining viable. Potential solutions include social mobilisation, outsourcing collection duties, smart auditing, utilising technological advancements like aerial bundle cables and smart metres, targeted load-shedding at the transformer level, and incentivising meter readers. Given Pakistan's diverse settings, these solutions have varying levels of return on the invested Rupees. To discern the most effective approach for a specific context, initiating pilot projects that can provide firsthand data is essential. It is noteworthy that such pilot exercises are sometimes met with scepticism due to the time they require to yield results. However, the value of these pilot projects should not be underestimated. Taking a few months to

gather accurate data is a more prudent approach than endlessly debating potential solutions without concrete evidence or, worse still, committing to a solution without truly understanding its efficacy.

Promotion of renewables: The primary constraints on renewables in Pakistan are the high cost of capital and the excess of generation capacity contracted to expensive fossil fuel power plants, often awarded uncompetitively. Promoting renewables would likely require increased support from the state bank to lower financing costs, power contracts that encourage participation in the Competitive Trading Bilateral Contracts Market as merchant plants, and a policy to adopt renewable energy in place of existing thermal power generation. This could open new opportunities for obtaining international climate finance. Mechanisms like the Asian Development Bank Energy Transition Mechanism offer novel ways to finance the early retirement of existing fossil fuel power plants, creating space for renewables. Old and inefficient fossil fuel plants kept operational through a flawed merit order that ranks them as efficient due to government-subsidised fuel, can be prime targets for replacement. These policies will not only promote renewables but also lower the cost of generating electricity.

Gas sector: Pakistan faces a gas shortage and a large debt in its gas sector, both of which are exacerbated by subsidies. The shortfall is met with imported gas, the cost of which is not fully incorporated into end customer tariffs. A key priority for policymakers is to increase gas prices to accurately reflect its cost and to target subsidies for domestic customers through channels such as BISP. Additionally, under the current power sector pricing scheme, switching customers from gas to grid electricity is useful in paying off capacity payments. This can be achieved by offering financing schemes for switching appliances, such as gas geysers, to electric models, while simultaneously raising gas prices. There is also the question of how to allocate the often-scarce gas among various market participants. Determining how much to allocate to the residential sector versus the industrial sector requires detailed firm and residential customer gas billing data, ideally supplemented by firm data (discussed in Section 3.6 on industrial policy). Within the industrial sector, gas can be allocated based on who is willing to pay the most through auctions and other market mechanisms. A more detailed discussion of these policies is beyond the scope of this document.

Conservation: Policies promoting energy conservation face resistance within the government, primarily because more efficient power appliances would reduce demand, leading to high-capacity payments being spread over a smaller base. However, if Pakistan shifts to a tariff structure with more fixed charges, conservation becomes more relevant as it would lower the power sector's fossil fuel imports without affecting capacity payment channels. In any case, energy conservation needs to be a priority for both industrial and residential sectors to reduce Pakistan's fossil fuels bills in the long run. For the industrial sector, the government can test options like the ESCO (energy service company) model, which has been successful internationally. On the residential side, schemes such as on-bill financing for switching to more efficient appliances seem promising and need to be piloted and refined before scaling up.

Areas of further policy and analytical work

1. How can Pakistan's energy tariff design be optimised to align with marginal costs while enhancing revenue stability and affordability for consumers?
2. Given the country's diverse settings, what are the most effective strategies to reduce theft and non-payment in Pakistan's power sector?
3. What policy measures and financial mechanisms are most effective at promoting the adoption of renewable energy in Pakistan's power sector, given the existing contractual commitments to fossil fuels?
4. How can Pakistan's gas sector manage its shortage and financial challenges effectively while ensuring fair and economically sound distribution of gas across different sectors?
5. What are the potential impacts and feasibility of implementing energy conservation measures within Pakistan, particularly with respect to reducing fossil fuel imports and managing capacity payments?

3.6 Industrial policy

Industrial policy has become a popular tool for governments to achieve structural transformation, export competitiveness and job-creating economic growth. This section lays out the basic elements to consider when designing industrial policy that supports specific activities. The precise activities can be identified as the framework is rolled-out, applying the principles outlined in this section.

The limited fiscal space in Pakistan means that extra care needs to be given towards targeting industrial policies. A lopsided balance of trade means that export competitiveness should also be a central pillar guiding policy. Throughout, this note considers industrial policy as primarily a set of subsidies (very limited given the ongoing stabilisation, and therefore finely targeted) that lower costs of production for firms. Other, less costly, interventions, such as changes in regulation, need to be done in tandem.

When to do industrial policy

Industrial policy reflects a valuable use of public funds when it can help sectors or businesses overcome constraints and achieve economies of scale (Juhász, Lane and Rodrik, 2023). Sectors that do not have large economies of scale should not be beneficiaries of industrial policy (Bartelme, et al., 2024). For example, a sector that does not benefit from economies of scale but receives a 10% subsidy on costs will see its production expand in equal proportion. Here, the government achieves no real returns beyond shuffling scarce resources around the economy – there is no net gain.

Financial and input market distortions in Pakistan mean that sectors with scale economies are constrained in their ability to grow. They are also less competitive in the global marketplace for goods and talent. Done right, industrial policy could bolster these sectors to see productivity growth and raise their export competitiveness. Raising exports has an added balance of trade benefit for Pakistan, which is heavily import-dependent.

Industrial policy is not always cheap. Past successful cases, from 19th century Germany to early 20th Japan and South Korea, all involved substantial public resources (Juhász et al., 2023). Pakistan's public resources are scarce. More spending on industrial policy means less spending on education, healthcare, or social protection. Industrial policy should only be pursued when the technical case (scale economies, overcoming distortions) merits it. However, there are still associated interventions that can be pursued under tight purse strings, such as relaxing cumbersome regulations on duty-free access to necessary inputs.

Where to intervene

As Pakistan negotiates its next programme with the IMF, there is likely to be an overall cap or envelope on subsidies. Thus, these constrained funds should be targeted towards sectors that can have the largest impacts on growth and exports. Targeting should follow two broad principles. First, sectors with the largest external economies of scale stand to benefit the most. This is because they will see the largest increases in productivity in response to the policy (Bartelme, et al., 2024). Second, sectors (or firms at different points in the value chain within a sector) that face greater input distortions will also see greater responses to subsidies (Liu, 2019). Though acting like a band-aid, industrial policies in the form of input subsidies can nudge businesses that face distortions closer to their ideal size.

BANGLADESH'S NEW INDUSTRIAL POLICY (KHAN, 2024)

Starting from no locally owned capability 50 years ago, manufacturing accounted for 22% of Bangladesh's GDP in 2023, higher than 13% in India and 14% in Pakistan (World Bank WDI, 2025). Bangladesh's garments, textiles, and pharmaceuticals are globally competitive.

In the 1980s, Bangladesh 'discovered' strategies that provide incentives for increasing organisational capabilities that are key to improving productivity and competitiveness - without providing subsidies in advance. The incentives enabled large profits if the enterprise succeeded in becoming competitive, not before. The checking and enforcement here was largely 'horizontal' (across firms), with the state still playing a critical enabling role. The old industrial policy, emphasising vertical enforcement by the government, is inadequate because it ignores that outcomes always depend on horizontal pressures on principals and agents.

Garments and Textiles: As a result of the Multi-Fibre Arrangement (MFA) 1974, garment producers in South Korea were locked out of the US by quotas and were looking for Least Developed Country (LDC) partners to sell fabrics. The Bangladeshi-Korean Dosh-Daewoo agreement of 1979 exploited the quota rent to create a structure of financing that transferred the organisational capabilities of Daewoo to Dosh with strong horizontal checks. The transfer of organisational capabilities was not financed by subsidies but privately by Daewoo. There was a 'super profit' return to Daewoo to compensate for the risk in the investment. The monitoring was mainly horizontal: Dosh and Daewoo had very strong incentives to check each other. The role of the public policy

(Box continues on the next page)

was critical but limited (guarantees, MFA rent, bonded warehouses, etc.) and did not have the difficult tasks of monitoring and withdrawing subsidies. The results were spectacular.

Pharmaceuticals: In the early 1980s, Multinational Companies (MNCs) dominated the domestic pharmaceutical in Bangladesh with more than 75% of the domestic market. In 1982, the government announced the National Drugs Policy. Its key element was to declare around 150 drugs essential and set their prices on a cost-plus formula. This profit was high for domestic producers but too low for MNCs that exited the market. By reducing prices, domestic firms created resources for learning-by-doing to lower production costs, but they were investing their own money, not subsidies. They bought organisational knowledge from foreign countries (European and Indian) to achieve Good Manufacturing Practices (GMP) to protect their brand name. If they could reduce their cost of production, while maintaining GMP they could make significant additional profits. Results, again, were impressive with exports growing at 15% to 151 countries, including US and Australia. There are around 200 domestic companies now, producing 5600 brands and domestic companies meet 98% of local demand.

The use of rich firm microdata, such as Value-Added Tax (VAT) records from the Federal Board of Revenue (FBR) linked with customs, can help measure which sectors may have large-scale economies and face distortions. FBR data is valuable because it enables tracing trade flows and domestic production networks.

Distortions in an economy affect firms within and across sectors differently. FBR data can also calculate the spread of productivity levels across firms to measure how distorted a particular sector is. More upstream firms tend to face more severe constraints, making firms in this stage of the value chain potential targets (Liu, 2019).

A few additional considerations should be kept in mind. The economies of scale argument used thus far can be an expensive affair. We may have an inkling of which sectors to target, but that is a separate question from how much these sectors need in terms of support to see real gains. The gains and losses are also likely to spread unevenly across firms. Experimentation and monitoring are key to keeping a fiscal lid on these policies while maximising their impact.

Export-led manufacturing as a motorway for growth may apply less in today's global economy, given the rise in skill and capital-intensive manufacturing. Recent thinkers are beginning to emphasise industrial policy in developing countries that places greater emphasis on services and sectors that benefit from an inevitable global green transition (Rodrik and Stiglitz, 2024). Incorporating climate change and green transition considerations can open new markets abroad, especially as global buyers demand greener production processes. It can also facilitate adaptation. The goal should be developing career ladders into the middle class. Take, for example, Pakistan's considerable potential for ICT exports, where the primary bottleneck remains the availability of skilled labour. Pakistan also has a sizable domestic market, given large remittance inflows.

How to ensure successful policy

Subsidies and export-related measures account for almost all industrial policies in place globally, which tend to emphasise manufacturing. Advanced economies disproportionately provide subsidies for green sectors (Juhász, Lane, Oehsen and Pérez, 2023). Conventional subsidies could be on credit, energy, or labour costs. Understanding where constraints are greatest in each sector is an important area for analysis. Ensuring productivity growth and job creation in services could rest on encouraging low-skilled job creation of firms in non-tradable sectors and the provision of public inputs and technologies that complement labour, especially for smaller businesses (Rodrik and Stiglitz, 2024). Well-designed incentives for universities and firms to invest into raising the labour force skills can help Pakistan grow its export of professional services like in ICT. Relaxing bureaucratic and otherwise cumbersome regulations for select industries can reduce firms' burden in importing and investing.

Successful implementation rests on state capacity. Policies need to be executed and carefully examined over their lifecycle. Without adequately staffed and resourced institutions, such policies will not realise their intended objectives. Five elements characterise successful industrial policy: embeddedness, policy coordination, monitoring, conditionality, and institutional development (Juhász et al., 2023). Embeddedness refers to a systematic and regular dialogue between the private sector recipients of industrial policy and the government. The emphasis needs to be on knowledge exchange over experiences and negotiation over goals, with caution towards capture and lobbying efforts. Policies should be carefully coordinated.

Monitoring and conditionality are among the central elements that made East Asian industrial policies a success. Explicit targets and conditions, such as export quotas, were set for the South Korean industrial conglomerates (*chaebol*) to continue receiving subsidised credit and other benefits (Juhász et al., 2023). If firms failed to meet these targets, the government withdrew its support, allowing them to fail. As much as possible, industrial policy should foster competition within and among beneficiary firms. In Pakistan's case, a simple option that does not drain the coffers could be to make import tariff concessions conditional on export shares. By being grounded in data analysis and frequent monitoring, the successful implementation of industrial policy can also change the broader policymaking culture in Pakistan.

Areas of further policy and analytical work

1. Identify and prioritise sectors with the highest potential for economies of scale and export competitiveness. Which sectors exhibit significant potential for economies of scale in Pakistan? How do these sectors currently perform in terms of productivity and export competitiveness? What are the specific input distortions faced by firms within these sectors?
2. Explore ways to design targeted subsidies and assess their impact on productivity and export growth. What forms of subsidies (for example, energy, credit, labour) are most effective in addressing the constraints faced by priority sectors? How do these subsidies impact the cost structures, productivity, and export performance of firms? What are the potential fiscal implications of these subsidies, and how can they be minimised?

3.7 Agriculture

Despite falling behind regional peers in terms of productivity and value addition, Pakistan remains a promising agricultural landscape. Agriculture contributes around 24% to Pakistan's GDP annually while employing about 37% of the labour force, including two-thirds of women's labour force (World Bank, 2022). Pakistan is a major producer of wheat, sugarcane, cotton, and rice, with rice exports expected to reach USD 4 billion in FY23 (July 2023 to March 2024) (Business Recorder, 2024). Agricultural food exports grew to nearly USD 4 billion in the first six months of FY23, despite declining total factor productivity since 1993. While crop productivity has slightly increased in Punjab and Khyber Pakhtunkhwa, it has decreased rapidly in Sindh and Balochistan (Burki, 2022). The climate crisis threatens to worsen this outlook, with high temperatures and extreme events affecting crop yields and soil nutrition. Additionally, agricultural value added per worker has been nearly stagnant for three decades (World Bank, 2022).

The decline in agricultural productivity in Pakistan can be attributed to several factors. Climate change poses a significant threat, with extreme temperatures and irregular rainfall negatively impacting crop yields. Wheat and sugarcane are particularly vulnerable to higher maximum temperatures, while rice and cotton suffer from increased minimum temperatures and humidity. Additionally, poor water management has led to inefficient farming practices, with little innovation in irrigation methods such as alternative-wetting-and-drying (AWD) and drip irrigation. Reforming the irrigation tariff structure to reflect the true value and cost of water will promote better allocation and conservation of this vital resource, encouraging sustainable agricultural growth (World Bank, 2022a). This section explores how to reform the agricultural sector by outlining areas of improvement and highlighting the key questions that will be addressed in the growth strategy.

Reform areas

A key challenge in addressing productivity is the lack of improvements in technical efficiency. Despite increased use of inputs, such as fertilisers and irrigation, there has been limited growth in output, as evidenced by stagnant or declining total factor productivity. Outdated farming methods, limited adoption of modern technologies and inadequate farmer education and training contribute to this inefficiency. In addition to crop productivity, agricultural value added per worker has also remained stagnant for three decades (World Bank, 2022a). Enhancing technical efficiency via targeted measures can enhance overall productivity. The government must invest in seed technologies and improve human capital by providing farmers with information on weather patterns and advanced farming techniques.

Market distortions due to government interventions, such as procurement programs for wheat and subsidies for sugar, have created inefficiencies that favour larger landowners and skew resource allocation. These interventions discourage diversification into more profitable and less water-intensive crops. Over time, regressive input subsidies and support price regimes have hindered the adoption of higher-value crops, diverted public resources from investments in technological advancements like research and development and extension services, and primarily benefited the land-owning elite. To address this, it is vital to phase out inefficient subsidies and promote market-driven incentives that encourage farmers to diversify and invest in more

productive and resilient crop varieties. Pakistan's agricultural sector needs to prioritise incentivising the cultivation of high-value cash crops such as fruits, vegetables, and spices, which have greater demand in international markets. These crops offer better returns to farmers and require less water compared to traditional staples like wheat and sugarcane. Implementing policies that facilitate a transition to these high-value crops, alongside providing necessary infrastructure and market linkages, will be crucial for sustainable agricultural exports.

Advancements in seed technology hold significant potential for enhancing agricultural productivity. Developing and distributing high-yield, pest-resistant, and climate-resilient seed varieties can help farmers mitigate the adverse impacts of climate change and enhance crop yields. This effort can be complemented by robust extension services aimed at educating farmers on optimal practices and the advantages of adopting new technologies. Moreover, investment in research and development to tailor seeds to local conditions will ensure that farmers have access to the most effective resources for their specific environments.

Another significant challenge is inefficiency in agricultural supply chains and the lack of adequate cold storage facilities. These issues result in substantial post-harvest losses and reduce the quality of produce that reaches both domestic and international markets. Investing in rural infrastructure, including village-to-market roads and modern cold storage facilities, will help reduce these losses and ensure agricultural products maintain quality throughout the supply chain. Enhancing logistics and storage infrastructure will also improve market access for farmers, enabling them to sell their produce at better prices and reduce wastage.

Expanding access to financial instruments like credit and weather index insurance can enable farmers to invest in productivity-enhancing technologies and practices. Programs like the Electronic Warehouse Receipt Financing can provide small farmers with better price discovery and market access, helping them to achieve higher returns on their produce (State Bank of Pakistan, 2022). Improving the financial literacy of farmers will empower them to make informed decisions regarding investments and risk management.

Lastly, the government must also create a more conducive policy environment for exports. This entails streamlining export procedures, lowering tariffs on agricultural inputs, and offering export incentives for high-value crops. By minimising bureaucratic obstacles and providing financial incentives, the government can stimulate greater participation of farmers and agribusinesses in export activities. Strengthening quality control and certification processes will also ensure that Pakistani agricultural products meet international standards, making them more competitive in the global market.

Exploring these areas can enable the government to boost Pakistan's agricultural productivity, strengthen resilience to climate change, and increase agricultural exports, all of which contribute to overall economic growth and poverty reduction. The success of these initiatives depends on strong cooperation among government agencies, the private sector, and the farming community to effectively execute reforms and investments. By implementing targeted market reforms, embracing technological advancements, and improving infrastructure, Pakistan can unlock the potential of its agricultural sector, ensuring a sustainable future for farmers and the economy.

Areas for further policy and analytical work

1. How can technical efficiency and worker productivity be improved in Pakistan's agricultural sector through targeted interventions? For example: How can digital solutions, such as farm management apps, remote sensing technologies, etc., be tailored to the specific needs and contexts of farmers, and what are the potential benefits of adopting these technologies for improving farm-level productivity and decision-making?
2. What are the most effective water management practices (for example, Alternate Wetting and Drying (AWD), drip irrigation) for improving water use efficiency in Pakistan's agriculture?
3. How can advancements in seed technology and irrigation practices enhance agricultural productivity in Pakistan?
4. What are the effects of various climate change variables (such as rain, temperature) on different crop yields in Pakistan, and how can farmers adapt to these changes?
5. How do current government interventions (for example, procurement programs, subsidies) affect crop choices and resource allocation among farmers? How can we best evaluate the impact of market distortions on agricultural productivity and diversification to inform a phase out of inefficient subsidies and promote market-driven incentives to encourage crop diversification and investment in high-value crops?
6. What are the potential economic and environmental benefits of shifting from traditional staples to high-value crops (for example, fruits, vegetables, spices)? How can we assess the feasibility and benefits of diversifying into high-value, less water-intensive crops?
7. How can access to financial instruments like credit and weather index insurance be expanded to support small farmers and enable farmers to invest in productivity-enhancing technologies and manage risks more effectively?
8. What are the implications of changing market dynamics, including shifts in consumer preferences, globalisation, and international trade agreements, for the agricultural sectors of different provinces in Pakistan, and how can farmers adapt to capitalise on emerging market opportunities? What roles do quality control and certification processes play in making Pakistani agricultural products competitive in the global market?

3.8 Cities

Urban areas are primary hubs of economic activity, innovation and production, essential infrastructure, skilled labour, and business networks vital for productivity and export growth (Juhász, F., Lane, N., and Rodrik, D. 2023). Liveable cities, even more so.

Unlocking economic potential: Pakistan's cities account for more than 50% of GDP (the global average is 80%) and have higher levels of productivity and wages than rural areas. The urban population growth rate has increased from 2.98% (1998-2017) to 3.57% (2017-2023), indicating accelerated migration to cities. However, the benefits of this spatial transformation have not yet been realised. To do so, sector-specific clusters and innovation hubs must be

fostered. Policymakers need to explore industrial policy initiatives that build on this spatial transformation to realise the agglomeration benefits of cities.

Tackling air pollution: Cities serve as epicentres of air pollution, bearing the brunt of industrial emissions, vehicular pollution and agricultural practices (such as crop burning) in surrounding areas. This affects liveability and, therefore, worker productivity. Pakistan is the fourth most polluted country globally, with many cities topping world charts for poor air quality. Bad air can cost Pakistan up to 6.5% of its annual GDP and citizens of Lahore, seven years of their lives. Cleaner city air will lower costs associated with worker morbidity and will contribute to liveability and productivity growth. Policymakers will need to identify specific urban air quality improvement measures.

Addressing climate vulnerabilities: Cities play a critical role in Pakistan's climate crisis due to their dual nature as contributors to climate change (emissions and environmental degradation) and as vulnerable hotspots to its impacts. Climate change risks faced by urban areas include floods, droughts, and heatwaves, all of which can affect firm productivity. There is an urgent need for cities to adopt integrated, green urban planning strategies that address these challenges, including investing in green spaces. Such investments will be critical for cities' future climate change resilience and continued importance for increasing productivity.

Improving urban finance: Measures to unlock the productivity and improve the potential of cities, lowering air pollution and mitigating climate change risks, will require public investments and public/private partnerships and incentives that penalise and/or motivate citizens to achieve better outcomes. Policymakers will need to explore the potential for improving city finances, including property, land, pollution and/or congestion taxes and other user charges.

Improving urban finance: Should we explore using third-party data (satellite imagery) to improve property tax valuation and cost-effective, citizen-centric behavioural tools and enhance property tax collection and compliance?

Areas for further policy and analytical work

1. Climate change and cities:
 2. Develop a vulnerability index: Create an index to assess urban vulnerabilities to climate change and pollution (for example, flooding, extreme weather, air pollution) using spatial and survey data from provincial governments.
 3. Health Advisory Systems: Collaborate with provincial environment departments to develop systems that trigger policy actions and citizen responses to extreme pollution events.
4. Improving productivity:
 5. Infrastructure and productivity: Analyse the impact of transport and digital infrastructure on economic productivity and business growth in major Pakistani cities, focusing on how infrastructure quality variations affect outcomes.
 6. Role of digital infrastructure: Investigate how broadband internet and 4G/5G networks facilitate remote work and create job opportunities.

7. Labour market participation: Identify effective strategies to improve labour market participation among youth and women in urban areas, focusing on digital skills, mobility, and job search platforms.
8. Municipal services (waste management):
 9. Public-Private Partnerships: Study the effectiveness and scalability of public-private partnerships in waste management.
 10. Waste segregation policies: Assess the economic and environmental impacts of mandatory household waste segregation.
 11. Informal waste sector: Explore how integrating the informal waste sector into formal practices can improve system efficiency and worker livelihoods.
12. Housing and land use:
 13. Urban planning and zoning: Evaluate current regulations and master plans for fostering sector-specific clusters (for example, technology parks, industrial zones) and propose policy adjustments to enhance collaboration and innovation.
 14. Affordable housing: Reform urban land-use policies to increase the availability of land for affordable housing projects.

3.9 Human resources

Human resources are indispensable for driving productivity and innovation. Pakistan's median age of approximately 22 years, with nearly two-thirds under 30, presents an opportunity, but only with interventions that create prospects for productive engagement of a young workforce (Baily, Bosworth, and Kennedy, 2021).

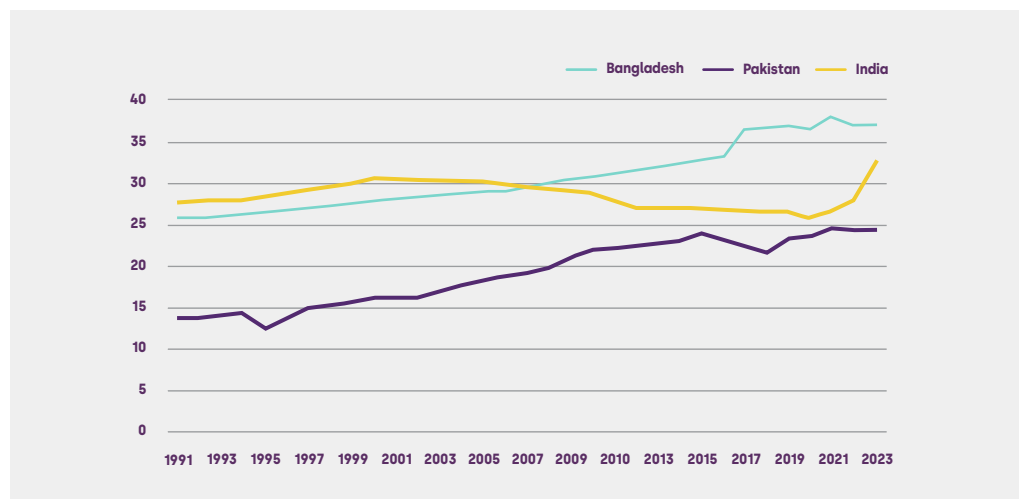
Women workers

Numerous factors impede women's entry into the workforce. Cultural and social norms restrict women's mobility and access to employment opportunities, particularly in conservative and rural areas. The lack of safe and reliable transportation for women further exacerbates this problem. Workplace environments often fail to support women adequately, lacking essential facilities and employer assistance on matters like maternity leave. Additionally, women face significant barriers in accessing education, finance, and digital skills, which limits their job prospects and entrepreneurial activities. Addressing these multifaceted barriers requires comprehensive policy interventions and communities to become more tolerant of women in the workforce. **Figure 14** highlights Pakistan's poor women's labour force participation in contrast with regional competitors.

Research shows that the cost associated with providing safe transportation for women workers emerges as a key determinant in firms' decision to employ women and is more significant than the role of social norms associated with women's employment (Field and Vyborny, 2022). Evidence from Lahore demonstrates that safe and reliable urban transportation can improve women's mobility and access to work. Moreover, establishing women-friendly workplace environments with proper facilities and policies, such as maternity leave and childcare support, is key. Promoting gender-sensitive educational

programmes and vocational training can empower women with the necessary skills. Additionally, encouraging entrepreneurship through easier access to finance and digital tools can further enhance access to labour markets and economic activity.

Figure 14: Women's labour force participation



Source: Labor force surveys

Skills upgrading

The skills gap in export-oriented industries has a direct impact on Pakistan's competitiveness. Training institutions such as the Punjab Skills Development Fund (PSDF) have partnered with major employers to identify the skills needed in emerging sectors and provide training accordingly.

Since its inception, PSDF has nurtured a culture of private sector training. Over 450 training providers have trained approximately 350,000 trainees across 250 trades and 2,000 distinct locations. Notably, 40% of the trainees have been women, and over 60% of the trainees are currently engaged in income-generating activities. Policymakers need to explore such successful public-private partnerships in skills upgrading to boost productivity for export-led growth.

Labour facilitation

Innovative firms are experimenting with labour practices such as residential compounds, balanced nutrition and family leave cycles that help reduce labour turnover and increase productivity. The potential to scale up these practices needs to be explored.

Longer-term measures: Tackling population growth, child stunting and enhancing educational capabilities

Population growth

Pakistan's population growth rate of 1.95% per year is twice that of India and Bangladesh, but this does not make for twice as productive human resources. With endemic child stuntedness, few years of schooling and low participation

of women in the labour force (compared to Bangladesh, see **Figure 14**), there are few productivity benefits of high population growth. Lowering population growth to match household/national resources for nurturing children to become productive adults is thus a priority. This requires initiatives to lower the high fertility rate (Pakistan's 3.9% compared to Bangladesh's 1.8% and Turkey's 1.68%) by raising contraceptive prevalence rates (CPR) (Pakistan's CPR is 34% compared to Bangladesh's 62% and Iran's 81%). The Punjab Population Innovation Fund has launched well designed and evaluated initiatives to reduce the CPR rate. These are being scaled-up across Punjab and need to be replicated nationwide.

Stunting

With a child stunting¹² rate of 45%, Pakistan exceeds the regional averages for South Asia and lower-middle-income countries. Stunting adversely impacts cognitive skills and affects worker productivity. Key contributors to this persistent problem include inadequate management of faecal waste, widespread bacterial contamination of water and soil, and ineffective sanitation practices. Despite increased investments in privately-owned toilets, many lack proper technology and government oversight, aggravating contamination issues. Moreover, even with improved hygiene practices and healthcare access, the persistent prevalence of diarrhoea and environmental enteropathy, primarily due to *E. coli* contamination, continues to impede advancements in child health outcomes. Addressing child stunting in Pakistan necessitates a concerted effort to enhance Water, Sanitation, and Hygiene (WASH) infrastructure and faecal waste management.

Education

Education (years of schooling) is a key determinant of productivity. In the 1980s, when the economy was far less distorted than it is today and comparisons could still be made with East and South East Asian economies, a study (Birdsall et al., 1993) estimated that if Pakistan had the same years of primary and secondary school enrolment as Malaysia in the 1960s¹³ the national income per capita in 1985 would be 58% higher, and if the school enrolment rates were the same as Korea, national income per capita would be an even higher 65 %.

Things have improved since the 1960s, but not much. At least 26.2 million children aged 5-16 remain out-of-school. Pakistan has yet to achieve universal enrolment in grade 1, and there has still been significant dropout throughout the educational journey. Though gaps have narrowed, there are still gender disparities in enrolment across many districts. The quality of education given to most children in schools, except for children in high-fee public and private schools, is poor, and learning poverty high. The government does not spend enough on education in the public sector, and Pakistan's education system is too iniquitous: access to quality education depends on parental/ household income.

There is significant evidence regarding policies and interventions that can be implemented to start addressing the mentioned issues. Building more schools, encouraging education expansion through Private-Public Partnerships, meals programmes, conditional cash transfers, transport programmes, foundational learning programmes, induction, and continuous professional development

programmes and management/governance reform programmes have been shown to help address issues of access, quality, and inequity.

However, the key concerns remain around the commitment to addressing issues of deficits in human capital development, as well as the willingness and ability to provide the resources needed to implement policies and interventions. Given that Rs. 2,660 billion a year is given to the rich in the forms of subsidies or tax breaks in Pakistan (UNDP NHDR, 2020), it is not a lack of resources preventing Pakistan from investing more in education and health but a lack of priority for human development. Human development, and in particular education, must be a priority in the government's growth agenda.

Areas for further policy and analytical work

- 1.** How to best evaluate the impact and reach of existing vocational training initiatives, such as the PSDF, to identify strengths, weaknesses, and areas for improvement?
- 2.** Which export-oriented industries in Pakistan require specific skill sets to enhance productivity and competitiveness in the global market?
- 3.** What strategies can the government implement to facilitate the integration of Pakistani labour into global supply chains, particularly in export-oriented industries? How can the state collaborate with private sector stakeholders and international organisations to develop a robust skills training infrastructure aligned with global market requirements?
- 4.** What are the primary barriers preventing households from sending their children to school, particularly in underserved communities and rural areas? How effective are existing interventions, such as conditional cash transfers and transportation programmes, in addressing these barriers, and what additional measures can be implemented?
- 5.** What are the main challenges and shortcomings in Pakistan's WASH infrastructure that contribute to high rates of child stunting? How can policies and interventions be designed to improve the quality, safety, and accessibility of water, sanitation, and hygiene facilities, focusing on marginalised communities?
- 6.** What policy interventions, including transportation subsidies, workplace accommodations, and gender-sensitive training programmes, are most effective in promoting women's participation in the workforce?

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