# Chapter 2

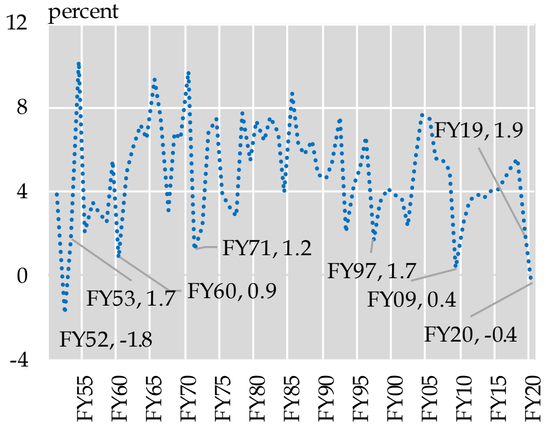
# Economic Growth

*Pakistan's economy was on course towards steady recovery by February 2020 following moderation in the twin deficits. However, the nascent recovery was abruptly disrupted by the domestic onset of Covid-19. A strict lockdown imposed by the government helped contain the outbreak to manageable proportions, but at the same time created severe strain on economic activities. Manufacturing, transport and trade were among the hardest hit segments. By contrast, crop production in the agriculture sector remained relatively unscathed by the pandemic, since the harvest for most of the important crops was nearly completed by the time Covid-19 began spreading across the country. In a bid to revive the economy, the government relaxed some of the restrictions and opted for a smart lockdown by June 2020. Nonetheless, economic growth had already been hit by then, as Pakistan's GDP growth contracted by 0.4 percent in FY20 – the country's first brush with negative economic growth since FY52.*

## 2.1 GDP Growth

After experiencing growth in each of the last 68 years, the economy recorded its first annual contraction in FY20 (**Figure 2.1**). Registering already the lowest growth of the decade in FY19, the economy was under the influence of fiscal consolidation, monetary tightening and transition to a market-based exchange rate regime as it entered FY20. However, nearly halfway through the fiscal year, the decline in some economic indicators were beginning to show signs of bottoming out, particularly in the export-oriented sectors. It was at this nascent stage of recovery that the economy was hit by the coronavirus pandemic (Covid-19).

**Economic Growth in Pakistan** **Figure 2.1**




Source: Pakistan Bureau of Statistics

The negative economic shock of Covid-19 was not a localized phenomenon, the contagion spread to all corners of the world, and the majority of countries imposed lockdowns to limit its spread. "Great Lockdown" resulted in suspension of economic activities across the globe. The IMF's World Economic Outlook clearly highlights the impact of Covid-19 at the global level in the growth projections of its October 2019 to June 2020 forecasts (**Table 2.1**). In case of Pakistan, the projections turned from a positive 2.4 percent growth to a contraction of 0.4 percent in FY20.

**IMF Projections over the Course of FY20** **Table 2.1**

percent

| | Projections for 2020 | | Diff. from |
|---|---|---|---|
| | Oct-19 | Jun-20 | Oct-19 |
| World output | 3.4 | -4.9 | -8.3 |
| Advanced economies | 1.7 | -8.0 | -9.7 |
| United States | 2.1 | -8.0 | -10.1 |
| Euro area | 1.4 | -10.2 | -11.6 |
| Japan | 0.5 | -5.8 | -6.3 |
| United Kingdom | 1.4 | -10.2 | -11.6 |
| Canada | 1.8 | -8.4 | -10.2 |
| Other advanced economies | 2.0 | -4.8 | -6.8 |
| Emerging markets & developing economies | 4.6 | -3.0 | -7.6 |
| Emerging and developing Asia | 6.0 | -0.8 | -6.8 |
| China | 5.8 | 1.0 | -4.8 |
| India* | 7.0 | -4.5 | -11.5 |
| ASEAN-5 | 4.9 | -2.0 | -6.9 |
| Emerging and developing Europe | 2.5 | -5.8 | -8.3 |
| Russia | 1.9 | -6.6 | -8.5 |
| Latin America and the Caribbean | 1.8 | -9.4 | -11.2 |
| Brazil | 2.0 | -9.1 | -11.1 |
| Mexico | 1.3 | -10.5 | -11.8 |
| Middle East and Central Asia | 2.9 | -4.7 | -7.6 |
| Saudi Arabia | 2.2 | -6.8 | -9.0 |
| Pakistan* | 2.4 | -0.4 | -2.8 |
| Sub-Saharan Africa | 3.6 | -3.2 | -6.8 |
| Nigeria | 2.5 | -5.4 | -7.9 |
| South Africa | 1.1 | -8.0 | -9.1 |

* Projections for Pakistan and India were presented on a fiscal year basis.

Source: International Monetary Fund, World Economic Outlook, October 2019, April 2020 and June 2020 Update. For more information please visit https://www.imf.org/en/Publications/WEO

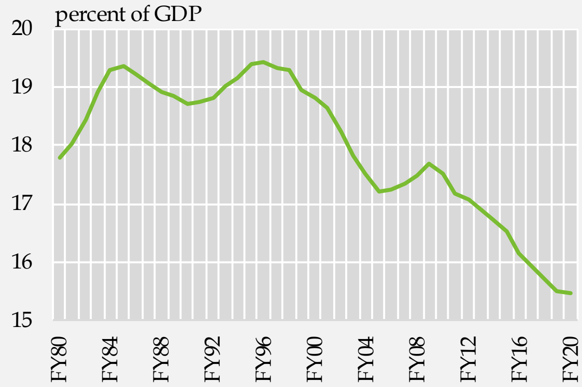
From the perspective of expenditure side of the economy, public and private consumption combined as percentage of GDP declined by 2.9 percentage points to 91.6 percent in FY20 over last year, mainly due to decrease in household consumption. The decline in private consumption was expected given that both stabilization measures and the Covid-induced lockdowns curtailed consumer demand. On the other hand, government expenditure registered a noticeable increase with its share rising in GDP.[1] The increase was especially warranted in the aftermath of Covid-related need to support the healthcare sector and the economically vulnerable segment. To accelerate recovery in the post-Covid period, the government acted swiftly and announced relief packages for multiple sectors of the economy, especially the labor-intensive construction industry, which was afforded several economic incentives, such as rationalization of capital gains tax, reduction in project approval times, subsidy on housing finance etc., to help revive its growth.

Furthermore, investment as percent of GDP witnessed yet another contraction, falling by 0.2 percentage points to 15.4 percent of GDP in FY20. The incidence of low investment rates has been a persistent structural issue in the country restraining economic growth from reaching its potential (**Box 2.1**).

**Box 2.1: Low Investment has been an Enduring Constraint to Sustainable Economic Growth**

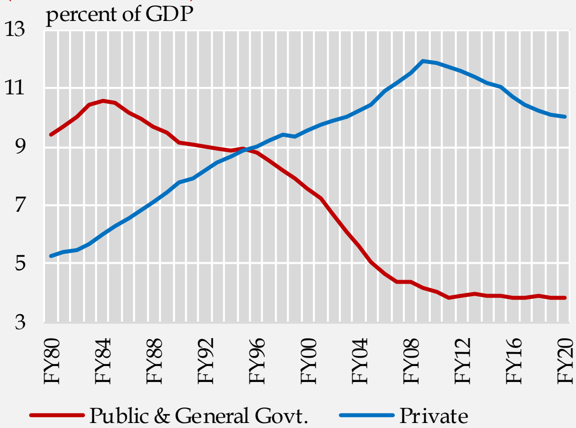
The investment rate in Pakistan has declined in the past few decades (**Figure 2.1.1a**). Its current level is low, both in absolute as well as in relative terms, vis-à-vis a number of emerging economies.[2] This shortage of investments has left Pakistan's economy increasingly vulnerable to boom-bust cycles of economic growth, since most of the growth spurts have been financed primarily by foreign inflows, rather than domestic savings.

**Overall Investment** **Figure 2.1.1a**
(Annual, 10Y MA)




Source: Pakistan Bureau of Statistics

**Private vs Public Investment** **Figure 2.1.1b**
(Annual, 10Y MA)




A closer inspection of the National Accounts shows that private investment which had been climbing steadily, could not sustain its momentum in the last decade (**Figures 2.1.1b**). The disinclination exhibited by the private sector towards investment is more evident in the industrial sector, which received, on average, only 2 percent of GDP over the last 10 years compared with 3 percent for the agriculture sector, despite both having a similar share in GDP (**Figure 2.1.2a**). The overall weak investment climate – characterized by macroeconomic instability, misaligned exchange rates, low domestic savings, a large informal sector and infrastructure bottlenecks – is primarily responsible for lower investment activity. Moreover, challenges with respect to ease of doing business – especially in the areas of contract enforcement, reliable and affordable energy supplies, operational facilitation,

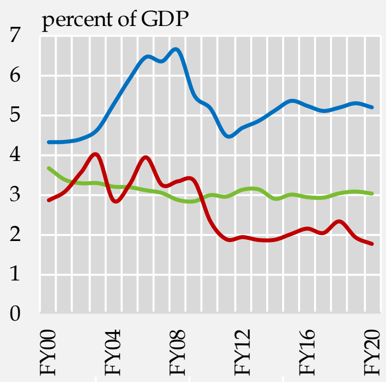
[1] Private consumption as percent of GDP fell to 78.5 in FY20 from 82.9 in FY19. Meanwhile, government expenditure as percent of GDP increased from 11.7 in FY19 to 13.1 in FY20.

[2] According to the World Bank, gross capital formation as percent of GDP averaged around 25.4 percent in the Emerging Markets and Developing Economies (128 countries) during 2010-2019 period. Even in a smaller sample of just South Asian countries (Afghanistan, Bangladesh, Bhutan, India, Nepal, Pakistan, Sri Lanka; data for Maldives not available), the average investment to GDP ratio is 32.5% and Pakistan's ratio is lowest in the region.

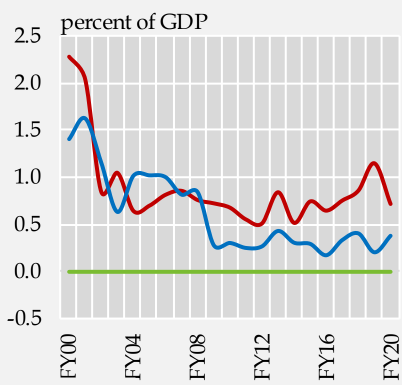
tax infrastructure, low-level of human capital and limited access to finance – are also behind the inadequate nature of investment activities in Pakistan.[3] In this regard, recent improvements in Pakistan's ranking in the Ease of Doing Business are welcome, and they need to be further consolidated to attract productive investments in the country.[4]

Moreover, public investment has also seen its share drop from nearly 10 percent of GDP during the 1980s to less than 4 percent on average in the 2010s. While public investment in agriculture sector has been low over the years, the industrial and services sectors have also witnessed notable declines (**Figure 2.1.2b**). On an aggregate level, the decrease in public investment in services has been compensated to some extent by increase in investment from the private sector (**Figure 2.1.2c**). However, the same cannot be said about the industrial sector, which has received much less attention from public and private agents alike, thereby impeding its long-term growth prospects.

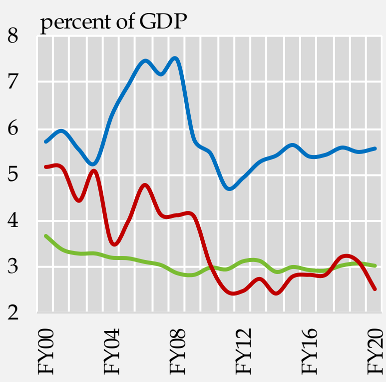
**Private Investment** **Figure 2.1.2a**




**Public Investment Excl General Govt.** **Figure 2.1.2b**




**Overall Investment Excl General Govt.** **Figure 2.1.2c**




Agriculture Industry Services

Source: Pakistan Bureau of Statisitcs

The declining investment-to-GDP ratio in the economy requires determined policy attention. The decline should be a cause for concern for policymakers because investments support economic growth that in turn facilitates job creation for the growing population.[5] Keeping in view the strains on the fiscal sector, the government can engage private sector through a mix of incentives and necessary regulations. The policy measures should aim to encourage private sector to undertake investments on its own as well as to participate in arrangements like public-private partnerships.

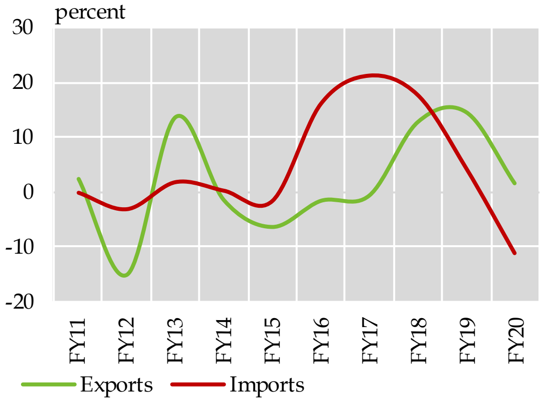
The moderation in domestic demand played a key role in improving the external sector imbalance. Imports in FY20 declined by 11.1 percent in real terms (at constant prices of FY06) compared to 4.3 percent growth in FY19 (**Figure 2.2**). Exports of goods and services, on the other hand, witnessed a marginal increase in real terms. Keeping the disruptive influence of Covid-19 in perspective both domestically and on the global scale, this was still a formidable performance (**Chapter 6**). These developments could be attributed in part to transition towards a market-based exchange rate regime, which has been a key component of the stabilization program.

Finally, in the wake of the Covid-19 shock, the supply side of the economy was adversely affected. Industry and services sectors could not cope with the challenging business environment, especially under the mobility restrictions that remained largely in place from March to June FY20. Prior to the onset of Covid-19, the industrial sector especially LSM,

[3] Source: Chapter 7, Factors Constraining Investments in Pakistan: Beyond the Macroeconomics, SBP Annual Report FY19- The State of Pakistan's Economy.
[4] Pakistan was ranked 108th in the Ease of Doing Business Ranking in the World Bank's Doing Business Report 2020, up from 136th position in its previous report.
[5] According to Pakistan Economic Survey FY20, the current annual population growth rate in the country is 1.94 percent and total population is expected to reach 263 million by 2030 based on estimates by the United Nations.

was showing early signs of recovery primarily on the back of export-oriented industries. The apparel segment in particular witnessed an increase in its exports price. However, the moderation in domestic consumption deepened the contraction in industries such as construction-allied, petroleum, and automobile. The performance of the industrial sector had a spillover effect on services as well. Specifically, wholesale and retail trading activities were subdued even in the pre-Covid period, owing to their linkages with declining LSM and imports. The Virus-induced lockdown compounded the situation further, given the direct and knock-on effects generated by the decline in transport services.

**Developments in External Sector (YoY growth)** **Figure 2.2**




Source: Pakistan Bureau of Statistics

However, in the midst of all this, the agriculture sector appeared to be the redeeming feature of the economy, as it maintained its growth despite some deceleration in livestock. Higher water availability during the year and increased application of fertilizer during the *Kharif* season compared to FY19 supported crop production. Still, unfavorable weather conditions and pest/virus attacks prevented some important crops, like cotton, rice and wheat, from realizing their full yield potential.

## 2.2 Agriculture

The agriculture sector grew by 2.7 percent during FY20, which was an improvement compared to its output last year (**Table 2.2**). Important crops posted a welcome turnaround overall, as wheat and rice output rose compared to a year earlier, mainly on the back of increased area dedicated to these two crops. There was some switching in cultivated area away from sugarcane and in favour of cotton. This appeared to be partly an outcome of deliberate policy reorientation, to move some area away from the more water-intensive sugarcane crop. Nonetheless, the cotton crop was unable to deliver, as yields were affected by weather conditions and pest attacks. Fortunately, agriculture remained somewhat insulated from the adverse impacts of Covid-19, as most of the important crops had nearly been harvested before the disruptions began.

**Agriculture Sector Growth (Annual, FY16-FY20)** **Table 2.2**

percent

| | FY16 | FY17 | FY18 | FY19 | FY20[P] |
|---|---|---|---|---|---|
| Agriculture | 0.2 | 2.2 | 4.0 | 0.6 | 2.7 |
| Crops | -5.3 | 1.2 | 4.7 | -5.0 | 3.0 |
| Important crops | -5.9 | 2.6 | 3.6 | -7.7 | 2.9 |
| Other crops | 0.4 | -2.5 | 6.3 | 2.6 | 4.6 |
| Cotton ginning | -22.1 | 5.6 | 8.8 | -12.7 | -4.6 |
| Livestock | 3.4 | 3.0 | 3.7 | 3.8 | 2.6 |
| Forestry | 14.3 | -2.3 | 2.6 | 7.9 | 2.3 |
| Fishing | 3.3 | 1.2 | 1.6 | 0.8 | 0.6 |

P = provisional

Source: Pakistan Bureau of Statistics

### *Inputs*

Water availability was higher during FY20 as compared to last year. Specifically, surface water availability grew by around 9 percent in *Kharif* and 18 percent during the *Rabi* season compared to FY19 (**Figure 2.3**). This may be explained by an increase in rainfall, which was

**Rainfall Recorded during Jul-Mar FY20** **Table 2.3**

in millimetres

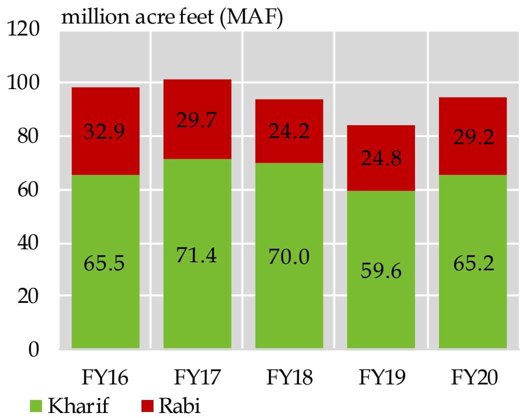
| | Q1-FY20 Monsoon | Q2-FY20 Post-monsoon | Q3-FY20 Winter Rainfall |
|---|---|---|---|
| Normal* | 140.9 | 26.4 | 74.3 |
| Actual | 140.4 | 56.3 | 123.0 |
| Excess** | -0.5 | 29.9 | 48.7 |
| as percent | -0.4 | 113.3 | 65.5 |

* The normal level is defined as period average from 1961-2010

** The minus sign represents a shortage compared to 'normal'

Source: Pakistan Meteorological Department notably higher during Q2 and Q3-FY20 compared to the average level observed during these periods in the past (**Table 2.3**).

**Actual Surface Water Availability** **Figure 2.3**




Source: Indus River System Authority

Total fertilizer offtake during FY20 was marginally lower as compared to last year; specifically, total urea offtake declined by 0.4 percent and total DAP offtake declined by 0.6 percent (**Table 2.4**). However, disaggregating the total offtake by season reveals that during *Kharif*, fertilizer offtake was higher for both urea (4.7 percent) and DAP (8.1 percent). The pattern then reversed in *Rabi*, as urea and DAP offtake fell by 5.3 percent and 7.3 percent respectively.

The rise in average retail price of fertilizers during April to September 2019, leading up to the *Rabi* season, appeared to play a part in

**Season-wise Fertilizer Offtake and Price** **Table 2.4**

offtake in thousand tons; growth in percent; prices in Rupees

| | | Offtake | | | Average Retail Prices | | |
|---|---|---|---|---|---|---|---|
| | | Kharif* | Rabi* | Total | Apr-19-Sep-19 | Oct-19-Mar-20 | Full year |
| Urea | 2019 | 2,887 | 3,033 | 5,920 | 1,566 | 1,783 | 1,674 |
| | 2020 | 3,023 | 2,872 | 5,895 | 1,883 | 1,922 | 1,902 |
| | Growth** | 4.71 | -5.31 | -0.42 | 20.21 | 7.80 | 13.60 |
| DAP | 2019 | 901 | 1,164 | 2,065 | 3,281 | 3,576 | 3,428 |
| | 2020 | 974 | 1,079 | 2,053 | 3,596 | 3,601 | 3,599 |
| | Growth** | 8.10 | -7.30 | -0.58 | 9.63 | 0.69 | 4.97 |

* Kharif corresponds with Apr-Sep and Rabi with Oct-Mar

** YoY Growth in FY20

Source: National Fertilizer Development Centre (NFDC)

depressing demand. In particular, urea prices rose by 20.2 percent during this period, and climbed by a further 7.8 percent during October 2019 to March 2020. More broadly, the *Rabi* 2020 season witnessed an increase in the general price level may have made growers more inclined to rationalize their expenditure on fertilizer. Non-food rural CPI inflation averaged 9.2 percent during October 2019 to March 2020, on top of 7.4 percent during April to September 2019.[6] As such, the overall price pressures during the *Rabi* season.

Agriculture credit disbursements experienced a slowdown during FY20 compared to a year earlier (**Table 2.5**). In the farm sector, the decline in production loans for crops deepened, while credit availed by corporate farmers grew at a relatively modest pace compared to the growth seen last year.

**Agriculture Credit Disbursements** **Table 2.5**

billion Rupees; growth in percent

| | | | | Growth | |
|---|---|---|---|---|---|
| | FY18 | FY19 | FY20 | FY19 | FY20 |
| **I. Farm sector (i+ii)** | **482.7** | **592.7** | **637.9** | **22.8** | **7.6** |
| i. Production | 450.1 | 553.1 | 594.3 | 22.9 | 7.4 |
| o/w | | | | | |
| All crops | 242.8 | 241.2 | 215.3 | -0.7 | -10.7 |
| Corporate farming | 120.5 | 179.7 | 194.7 | 49.1 | 8.3 |
| ii. Development | 32.6 | 39.6 | 43.6 | 21.5 | 10.1 |
| Tractor | 6.0 | 4.3 | 2.5 | -28.3 | -41.9 |
| **II. Non-farm sector (iii+iv)** | **489.9** | **581.3** | **576.8** | **18.7** | **-0.8** |
| iii. Working capital | 451.9 | 553.2 | 538.9 | 22.4 | -2.6 |
| Livestock/dairy | 220.1 | 268.5 | 279.0 | 22.0 | 3.9 |
| Poultry | 119.9 | 150.6 | 209.9 | 25.6 | 39.4 |
| iv. Fixed investment | 38.0 | 28.1 | 37.9 | -26.1 | 34.9 |
| Livestock/dairy | 33.6 | 20.5 | 14.5 | -39.0 | -29.3 |
| Poultry | 1.4 | 2.8 | 16.1 | 100.0 | 475.0 |
| **Total Agriculture (I+ II)** | **972.6** | **1,174.0** | **1,214.7** | **20.7** | **3.5** |

Source: State Bank of Pakistan

Meanwhile, in the non-farm sector, credit offtake by poultry segment stood out as a bright spot, with growth in loans for fixed

[6] Previously, during April to September 2019 (corresponding with the *Kharif* season), rural CPI had averaged 8.9 percent.

**Area, Production and Yield of Cotton** **Table 2.6**

| | Area (000 hectares.) | | | Production (million bales) | | | Yield (kg/ha) | | |
|---|---|---|---|---|---|---|---|---|---|
| | FY19 | FY20* | Growth** | FY19 | FY20* | Growth** | FY19 | FY20* | Growth** |
| Punjab | 1,887.8 | 1,889.4 | 0.1 | 6.8 | 6.3 | -7.2 | 615.0 | 570.4 | -7.3 |
| Sindh | 448.2 | 598.7 | 33.6 | 2.9 | 2.7 | -6.5 | 1,115.0 | 780.1 | -30.0 |
| Balochistan | 36.8 | 38.0 | 3.2 | 0.1 | 0.1 | 3.0 | 442.8 | 442.3 | -0.1 |
| KP | 0.16 | 0.21 | 34.0 | 0.00048 | 0.00065 | 33.7 | 513.5 | 519.1 | 1.1 |
| Pakistan | 2,373.0 | 2,526.3 | 6.5 | 9.8 | 9.1 | -6.9 | 706.8 | 618.2 | -12.5 |

*provisional
** Growth in actual FY20 production, compared to FY19, in percent. The column entries for KP may be interpreted with caution: the large percentage growth is due to low base effect

Sources: Ministry of National Food Security and Research, SBP calculations

investment and working capital alike. The uptick in credit coincided with the launch of the government's Backyard Poultry Program in Q1-FY20. The program's key objectives include: nurturing of small flocks in traditional sheds; provision of better nutrition through the production of eggs and meat; and poverty reduction via the income derived from sale of poultry products.[7]

## *Output*[8]

### Cotton

The production of cotton declined by 6.9 percent during FY20, against a drop of 17.5 percent recorded last year. This outcome is a cause for concern, especially since area under the cotton crop had grown over last year (**Table 2.6**). The yield was estimated to have fallen by around 13 percent overall, due to unconducive weather conditions and water shortages during the early stages of sowing, as well as due to pest attacks.

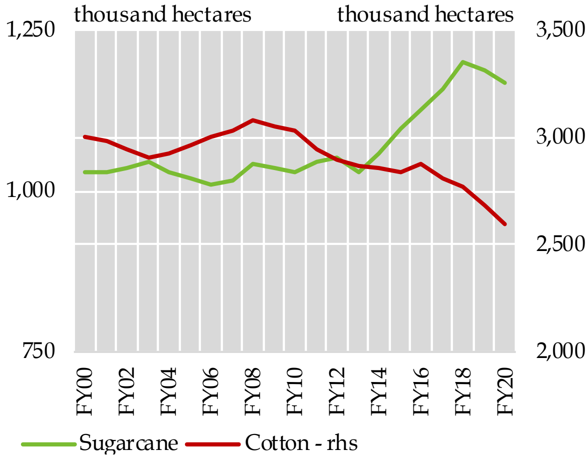
From a long-term trend perspective, the area dedicated by growers to cotton has been on the decline over the years. A key reason is that competing crops like sugarcane have, in general, tended to offer better returns, and had seen a corresponding increase in their areas under cultivation at the expense of cotton until FY18 (**Figure 2.4a**). Furthermore, cotton yields have also repeatedly been undermined by weather conditions and pest attacks (**Figure 2.4c**). There is a need to step up R&D efforts to combat such challenges. For instance, while the pink bollworm has time and again proven to be a menace for farmers in Pakistan, research in other parts of the globe has revealed novel ways to make Bt cotton more resistant to pest attacks, which could be assessed for domestic application.[9]

### Sugarcane

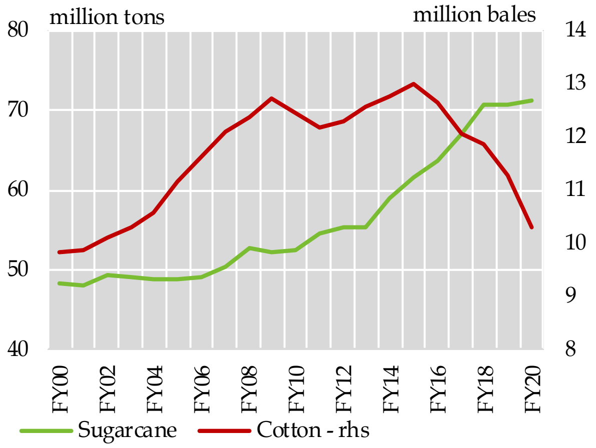
After peaking in FY18 at around 83.3 million tons, sugarcane production declined for the second season in a row, falling by 1.4 percent over last year (**Table 2.7**). The dynamics of sugarcane production in Punjab, the largest growing region, explain much of the overall outcome. The fall in production may be attributed to lower area dedicated to the sugarcane crop during FY19 and FY20 (**Figure 2.4a** and **2.4b**). It is worth recalling that the record production in FY18 had been achieved in a backdrop where indicative pricing had

[7] Source: Pakistan Economic Survey, 2019-20.
[8] The primary data source in this section is a Federal Committee on Agriculture working paper for the *Kharif* 2020-21 season released by MNFSR on 8th July, 2020. This explains the variation in some estimates compared to the earlier projections published in the Pakistan Economic Survey, 2019-20.
[9] Researchers at the University of Arizona and in China tested over 66,000 pink bollworm caterpillars over an 11-year period and created a hybrid seed mix by interbreeding Bt cotton plants with non-Bt varieties, resulting in significant pest suppression and reduced need to apply insecticides. Millions of small-scale farmers reportedly benefitted from this approach. Source: P. Wan, D. Xu, S. Cong, Y. Jiang, Y. Huang, J. Wang, H. Wu, L. Wang, K. Wu, Y. Carrière, and A. Mathias (2017). "Hybridizing Transgenic Bt Cotton With Non-Bt Cotton Counters Resistance in Pink Bollworm," *Proceedings of the National Academy of Sciences*, *114*(21): 5413-5418.

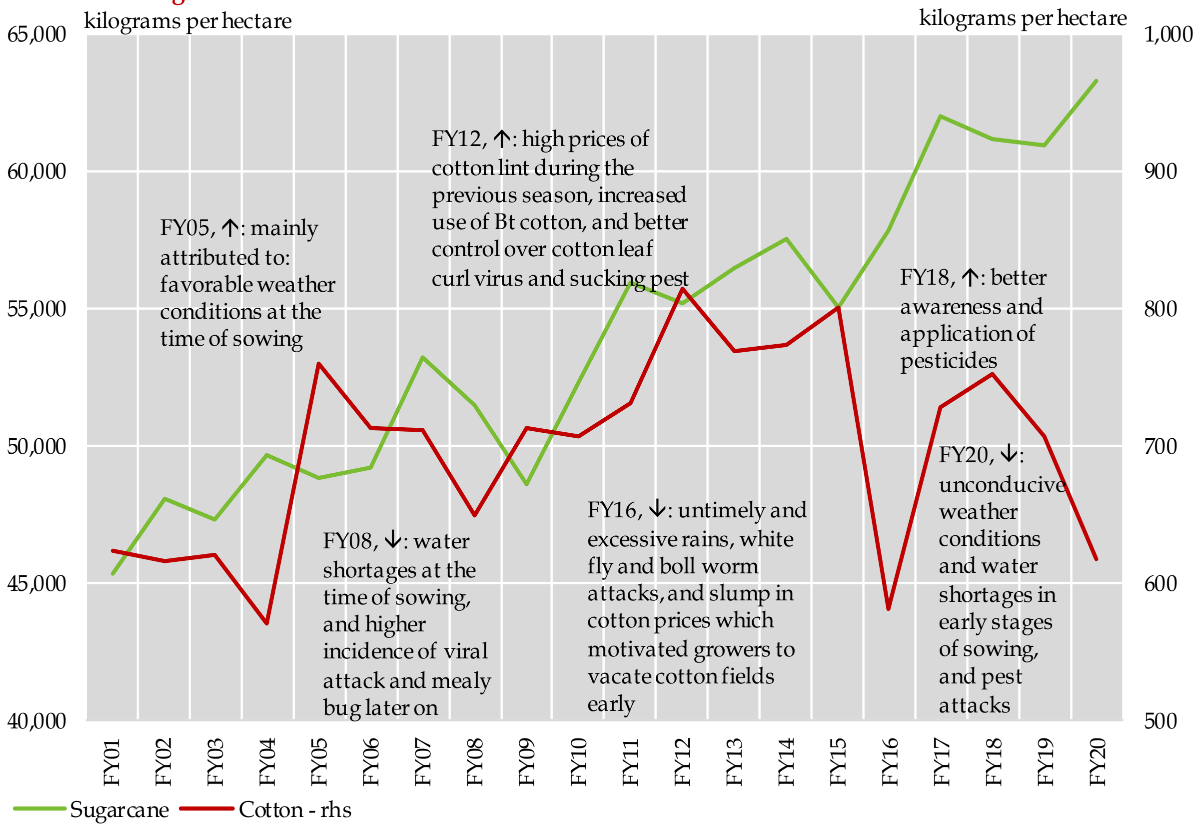
**Area - Cotton & Sugarcane (5-year moving average)** **Figure 2.4a**




**Production - Cotton & Sugarcane (5-year moving average)** **Figure 2.4b**




**Yields for Cotton and Sugarcane Crops, Highlighting the Key Factors Affecting Cotton in Selected Years** **Figure 2.4c**




Source: Agriculture Marketing Information Service; FCA

**Performance of Sugarcane Crop** **Table 2.7**

| | Area (000 ha) | | | Production (000 tons) | | | Yield (kg/ha) | | |
|---|---|---|---|---|---|---|---|---|---|
| | FY19 | FY20* | Growth** | FY19 | FY20* | Growth** | FY19 | FY20* | Growth** |
| Punjab | 710.6 | 643.4 | -9.5 | 44,906.3 | 43,346.6 | -3.5 | 63,194.0 | 67,368.0 | 6.6 |
| Sindh | 279.5 | 286.1 | 2.4 | 16,691.3 | 17,233.8 | 3.3 | 59,724.0 | 60,239.0 | 0.9 |
| KP | 111.0 | 115.7 | 4.2 | 5,532.0 | 5,623.8 | 1.7 | 49,842.0 | 48,611.0 | -2.5 |
| Balochistan | 0.8 | 0.9 | 12.5 | 44.3 | 45.2 | 2.0 | 55,375.0 | 50,222.0 | -9.3 |
| Pakistan | 1,101.8 | 1,046.1 | -5.1 | 67,173.9 | 66,249.5 | -1.4 | 60,963.0 | 63,329.0 | 3.9 |

* provisional
** Growth in actual FY20 production, compared to FY19, in percent
Source: Ministry of National Food Security and Research

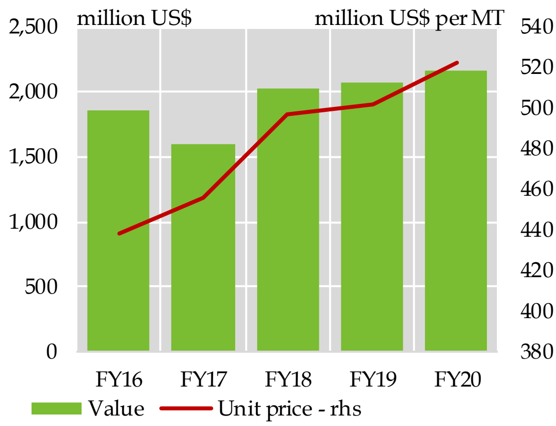
made the sugarcane crop more profitable relative to other crops, and millers had also made timely payments to growers in the preceding (FY17) season. However, delayed payments by millers to sugarcane farmers in FY18 and FY19 likely influenced the growers' decision to dedicate lesser area to the sugarcane crop in the FY20 season.

From a policy standpoint, the government appears to have realized that policies related to sugarcane need to be revisited. To tackle water scarcity, the Federal Committee on Agriculture, in its meeting for *Kharif* 2017-18, had encouraged the provinces to devise strategies to lower the area dedicated to sugarcane in favor of low-delta, high value crops.[10] This was an important development, given that estimates suggest that sugarcane production in Pakistan is relatively water inefficient compared to competing crops like cotton.[11] Moreover, the Annual Plan for 2018-19 also acknowledged that sugar surpluses (derived from rising domestic sugarcane production amid support prices) were creating issues because they could not be offloaded in the external market without subsidies. Consistent with this shift in mindset, the target for area under sugarcane was restricted to approximately 1.18 million hectares in FY20 – lower than the 1.34 million hectares of actual production observed in FY18.

## Rice

Rice exports have been increasing in the past few years on the back of rising unit prices, as well as favorable demand-side dynamics in key European, and more recently, Middle Eastern markets (**Figure 2.5**; further details in **Chapter 6**). This favorable performance induced an 8.0 percent increase in the area under the crop during FY20. However, production did not grow at the same pace, and yields either fell or remained stagnant in the various rice growing regions, reportedly on account of unfavorable weather conditions (**Table 2.8**).

**Pakistan's Rice Exports** **Figure 2.5**




Source: Pakistan Bureau of Statistics

[10] 'Delta' refers to the depth of water required by a crop to come to maturity. Sugarcane and rice tend to be high delta crops, whereas cotton and maize, as well as certain vegetables, tend to have lower deltas.
[11] A recent estimate by the Pakistan Institute of Development Economics (PIDE) suggests that the sugarcane crop consumes around 3.5 times more water as compared to cotton on a per acre basis. Source: PIDE (2020). *Unravelling Water Use Efficiency in Sugarcane and Cotton Production in Pakistan*. Policy Viewpoint No. 220.19. Islamabad: Pakistan Institute of Development Economics.

**Performance of Rice Crop** **Table 2.8**

| | Area (000 ha) | | | Production (000 tons) | | | Yield (kg/ha) | | |
|---|---|---|---|---|---|---|---|---|---|
| | FY19 | FY20* | Growth** | FY19 | FY20* | Growth** | FY19 | FY20* | Growth** |
| Punjab | 1,904.0 | 2,029.0 | 6.6 | 3,979.0 | 4,143.7 | 4.1 | 2,090.0 | 2,042.0 | -2.3 |
| Sindh | 690.2 | 775.9 | 12.4 | 2,571.1 | 2,576.5 | 0.2 | 3,725.0 | 3,321.0 | -10.8 |
| Balochistan | 153.5 | 164.2 | 7.0 | 498.1 | 535.0 | 7.4 | 3,245.0 | 3,258.0 | 0.4 |
| KP | 62.3 | 64.9 | 4.2 | 153.8 | 155.2 | 0.9 | 2,469.0 | 2,392.0 | -3.1 |
| Pakistan | 2,810.0 | 3,034.0 | 8.0 | 7,201.9 | 7,410.4 | 2.9 | 2,563.0 | 2,442.0 | -4.7 |

* provisional

** Growth in actual FY20 production, compared to FY19, in percent

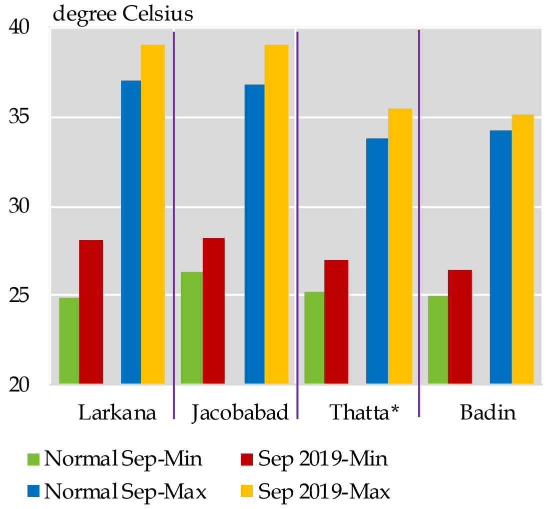
Source: Ministry of National Food Security and Research

The rice crop is particularly susceptible to temperature and rainfall as it approaches maturity, which tends to be around September.[12] [13] On this note, high minimum temperatures at the start of September 2019 and rain towards the end of the month reportedly had a negative impact on the rice crop in the Kalar tract of Punjab.[14] [15] Similarly, higher than normal temperatures – particularly in September 2019 – affected yields in certain rice-growing areas in Sindh (**Figure 2.6**). This explains why rice production in the province remained almost stagnant at last year's level, despite a 12.4 percent increase in the area dedicated to the crop.[16]

## Wheat

The wheat crop posted an increase of 2.5 percent during FY20 over last year (**Table 2.9**). The rise in output could mainly be traced to an increase in the area under production, while its yield also improved marginally compared to FY19.

**Temperatures in Selected Rice-Growing Districts. Sep 2019 compared to Normal*** **Figure 2.6**




* Normal temperature is represented by the long-term average during 1981-2010 for September. For Thatta only, it is given by long-term average for 2004-2019

Source: Pakistan Meteorological Department

That said, the crop missed its annual production target of 27 million tons, with actual production being just shy of 25 million

[12] The rice crop is typically sown during May/June in Punjab, and can take around four months to reach maturity, depending on the variety. (Sources: Pakistan Agricultural Research Council and Ayub Agricultural Research Institute Faisalabad).

[13] The rice crop goes through three broad stages of development: (1) vegetative, (2) reproductive, and (3) grain filling and maturation. These stages may be subdivided further, starting with germination of the seed and ending with formation of the grain.

[14] Source: SUPARCO Crop Situation and Forecast Report, Volume IX (Issue 10), October 2019.

[15] 'Kalar' is a term used by locals to describe soil that is suitable for Basmati rice cultivation. The Kalar tract is located along the Ravi and Chenab rivers, spread across districts such as Sialkot, Sheikhupura, Narowal, Gujranwala, Hafizabad and Lahore.

[16] Rice-growing areas in the province include Larkana and Jacobabad in upper Sindh, and Thatta and Badin in lower Sindh.

tons. The target had initially appeared to be achievable amid an uptick in the area dedicated to the crop, but heavy rains and unfavorable temperatures damaged the standing crop. Anecdotal evidence suggested that heavy rains in the Potohar region of northern Punjab during Q3-FY20 (especially March) created excess moisture and colder temperatures, triggering the onset of leaf rust disease.[17] Moreover, during April and May 2020, untimely rain, hail, and windstorms affected the harvesting and threshing of wheat in some parts of central Punjab and the Potohar region.[18]

**Performance of Wheat Crop** Table 2.9**

area in 000 ha; production in 000 tons; yield in kg/ha; growth in percent

| | Area | Growth | Production | Growth | Yield | Growth |
|---|---|---|---|---|---|---|
| FY17 | 8,972 | -2.7 | 26,674 | 4.1 | 2,973 | 7.0 |
| FY18 | 8,797 | -1.9 | 25,076 | -6.0 | 2,851 | -4.1 |
| FY19 | 8,678 | -1.4 | 24,349 | -2.9 | 2,806 | -1.6 |
| FY20* | 8,825 | 1.7 | 24,946 | 2.5 | 2,827 | 0.7 |

* provisional

** Change in actual FY20 production, compared to FY19, in percent

Source: Pakistan Bureau of Statistics

The government uses a combination of support prices and public procurement to maintain strategic reserves of wheat to ensure food security. In principle, such strategic reserves allow it to stabilize domestic supply and price of wheat. However, FY20 witnessed financing and administrative challenges with respect to the implementation of this policy. Public procurement remained lower than the target, which triggered speculative sentiments in wholesale and retail markets and led to crisis-like shortages and price hikes through most of the year (**Chapter 3**).[19] As a result, wheat stocks at the start of the food year on May 1, 2020 amounted to just 0.6 million tons, compared to 3.8 million tons at the comparable date in 2019, and much lower than the average carry forward stock of around 4.5 million tons during FY15-FY19.[20] In this backdrop, the ECC set the procurement target of 8.25 million tons for 2020 in its February meeting. The latest available data shows that procurement by the provincial food departments and PASSCO for 2020 amounted to around 6.6 million tons – i.e. nearly 80 percent of the target.[21] As a result, the wheat stock as of July 16, 2020 amounted to 6.7 million tons, compared to 7.7 million tons at the comparable date last year.

## Maize

The maize crop had provisionally been estimated to grow by 2.5 percent during the year, based on data for Jul-Mar FY20. However, updated data released in July 2020 indicated a 3.9 percent decline in production (**Table 2.10**).[22] According to the revised estimates, both the area under production as well as the output itself fell by nearly 4 percent, while yield stagnated.

The availability of maize seeds was an important constraint in terms of the area dedicated to the crop. During *Kharif* FY20, the available stock of maize seed for autumn sowing met only 65 percent of the total seed requirement, compared to 98 percent in *Kharif* FY19.[23] Similarly, during *Rabi* FY20, the seeds available for spring sowing accounted for just 68 percent of the total seed requirement, compared to 86 percent availability in the previous *Rabi* season.[24,25] It is pertinent to mention that Pakistan placed a ban on field trials and import of genetically modified (GM)

[17] The Potohar Plateau encompasses districts such as Rawalpindi, Islamabad, Chakwal, Attock and Jhelum.
[18] Source: Monthly Bulletin for April 2020 and May 2020, National Agromet Centre, Pakistan Meteorological Department.
[19] For details, see 'Report of the inquiry committee constituted by the Prime Minister of Pakistan regarding wheat/flour controversy'.
[20] Data source: Ministry of National Food Security and Research
[21] Source: MNFSR press release dated July 23, 2020.
[22] Source: Ministry of National Food Security and Research.
[23] Source: FCA *Kharif* Working Papers for 2019-20 and 2020-21.
[24] Source: FCA Rabi Working Paper, 2019-20
[25] Maize is grown in both the *Kharif* and *Rabi* season.

**Performance of Maize Crop** **Table 2.10**

| | Area (000 ha) | | | Production (tons) | | | Yield (kg/ha) | | |
|---|---|---|---|---|---|---|---|---|---|
| | FY19 | FY20* | Change** | FY19 | FY20* | Change** | FY19 | FY20* | Change** |
| Punjab | 899.8 | 860.4 | -4.4 | 5,915.5 | 5,670.3 | -4.1 | 6,575.0 | 6,590.0 | 0.2 |
| KP | 468.0 | 452.6 | -3.3 | 904.6 | 881.6 | -2.5 | 1,933.0 | 1,948.0 | 0.8 |
| Sindh | 3.5 | 3.9 | 11.4 | 3.5 | 4.0 | 14.3 | 1,016.0 | 1,015.0 | -0.1 |
| Balochistan | 2.8 | 2.7 | -3.6 | 2.8 | 2.7 | -3.6 | 1,000.0 | 1,000.0 | 0.0 |
| Pakistan | 1,374.0 | 1,319.6 | -4.0 | 6,826.4 | 6,558.6 | -3.9 | 4,968.0 | 4,970.0 | 0.0 |

* provisional

** Change in actual FY20 production, compared to FY19, in percent

Source: Ministry of National Food Security and Research

**Gross Value Added (GVA) of Livestock Sector** **Table 2.11**

million Rupees; growth in percent

| | | | Growth | |
|---|---|---|---|---|
| | FY19R | FY20P | FY19R | FY20P |
| A. Gross output | 1,724,372 | 1,776,473 | 3.5 | 3.0 |
| Animals sold for slaughtering | 392,043 | 403,468 | 2.9 | 2.9 |
| Natural growth/regeneration | 245,172 | 252,460 | 3.0 | 3.0 |
| Livestock products | 897,855 | 924,696 | 3.0 | 3.0 |
| Milk | 771,223 | 796,050 | 3.2 | 3.2 |
| Others | 126,632 | 128,646 | 1.6 | 1.6 |
| Poultry products | 189,303 | 195,849 | 7.9 | 3.5 |
| B. Intermediate consumption | 294,580 | 310,518 | 1.6 | 5.4 |
| C. Gross value added (A-B) | 1,429,793 | 1,465,956 | 3.9 | 2.5 |
| D. Other GVA* | 8,616 | 9,284 | -4.5 | 7.8 |
| E. Total GVA (C+D) | 1,438,408 | 1,475,240 | 3.8 | 2.6 |

R: revised; P: provisional, * hunting and husbandry

Source: Pakistan Bureau of Statistics

maize seeds early in FY20. The ban was enforced over concerns that GM maize might, inter alia, contaminate traditional crops and potentially harm maize exports in future to GM-free countries; this may have had a bearing on maize output during FY20, according to anecdotal evidence.

## *Livestock*

The livestock sector grew by 2.6 percent in FY20, compared to 3.8 percent last year (**Table 2.11)**. This represented the sector's lowest growth in the past six years; after the previous low of 2.5 percent in FY14, livestock had grown by 3.6 percent on average during FY15-FY19. However, despite the latest slowdown, the sector continued to be the biggest contributor to value addition in agriculture, accounting for 60.6 percent of overall agriculture and 11.7 percent of GDP in FY20.[26]

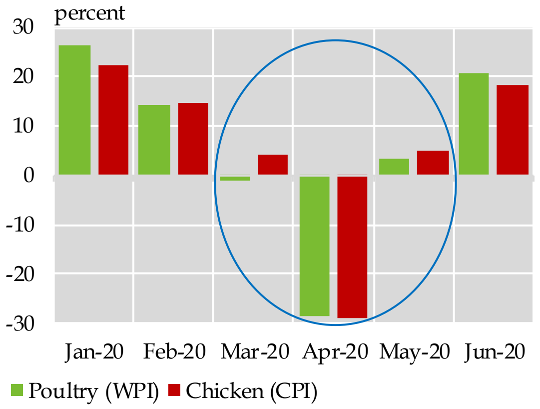
Within livestock, milk and related products continued to have the largest contribution to value addition. On this note, the Livestock Census used to be published every 10 years, with four editions prepared during 1976-2006. Thus, a fresh census is being anticipated since 2016; updated census data would be a more credible input for evidence-based policies for the milk segment in particular, and the livestock sector in general.

Meanwhile, the output of the poultry segment reflects recent developments, and as such, the slowdown in poultry products was mainly responsible for dragging down the GVA of livestock during FY20. Demand for poultry products fell in the wake of the Covid-induced

[26] Source: Pakistan Economic Survey, 2019-20.

lockdown, given the restrictions on banquets, marriage halls and hotels, and SOPs that limited the activities of restaurants to takeaway orders or deliveries only.[27] In addition, some unfounded rumors circulating through social media regarding the risk of Covid-19 spreading through chickens may also have temporarily dented demand, though the Pakistan Poultry Association (PPA) was quick to discredit these by issuing a clarification at the start of June 2020. The impact of subdued demand on wholesale and retail prices is reflected in the YoY WPI and CPI inflation for poultry items during March to May 2020 (**Figure 2.7**).

**Impact of Lockdown on YoY Poultry Inflation** **Figure 2.7**




Source: Pakistan Bureau of Statistics

## 2.3 Industry

Provisional National Accounts data shows that industrial sector output declined by 2.6 percent in FY20, compared to a contraction of 2.3 percent in FY19 (**Table 2.12**). It was the first time that industrial activity contracted for two years in a row. The decline in FY20 was led mainly by the dip in manufacturing and mining activities. In particular, the decline in large-scale manufacturing (LSM) activity was the largest ever registered, which in turn also weighed heavily on the overall performance due to its sizeable weight of more than 50 percent within the industrial sector.[28] In addition to the stabilization program that had moderated domestic demand, the lockdowns following the pandemic also affected industrial sector activities.

The LSM sector also could not escape the adverse economic implications of the Covid-19 pandemic (**Figure 2.8**). Prior to FY19, LSM growth was positive; however, the subsequent fiscal consolidation, monetary tightening and exchange rate realignment dampened the growth starting FY19. Finally, in the middle of FY20, signs of nascent recovery started to emerge, but this recovery was cut short by the Covid-19 pandemic, which resulted in a full-year contraction in LSM of 10.0 percent.[29]

From a policy perspective, high interest rates (prior to Covid-19) also played a role in subduing demand conditions. High interest rates largely prevailed throughout the year, but were eased substantially in the aftermath of Covid-19 (since March 2020).

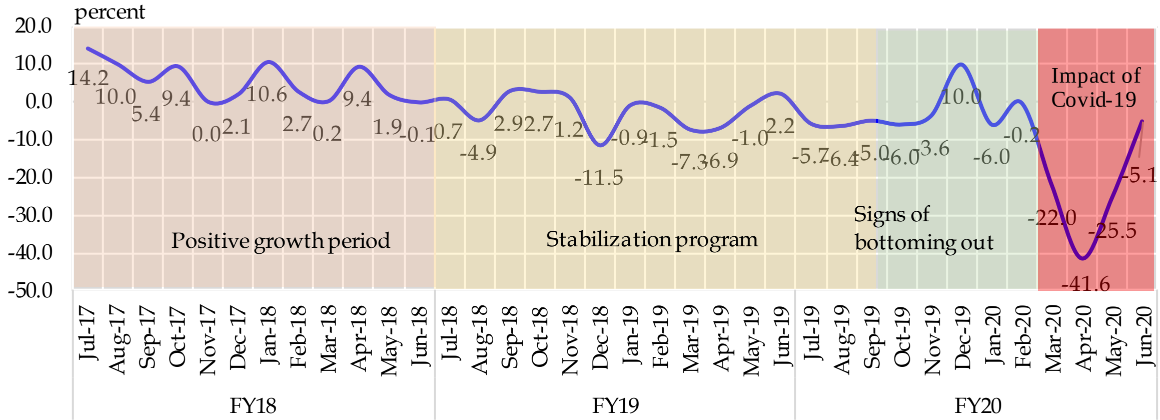
**Performance of the Industrial Sector** **Table 2.12**
(YoY growth, percent)

| | FY16 | FY17 | FY18 | FY19 | FY20 |
|---|---|---|---|---|---|
| Industrial sector ( 1 to 4 ) | 5.7 | 4.6 | 4.6 | -2.3 | -2.6 |
| 1. Mining and quarrying | 6.2 | -0.6 | 7.8 | -3.2 | -8.8 |
| 2. Manufacturing ( i+ii+iii) | 3.7 | 5.8 | 5.4 | -0.7 | -5.6 |
| i) Large scale[29] | 3.0 | 5.6 | 5.1 | -2.6 | -7.8 |
| ii) Small scale | 8.2 | 8.1 | 8.2 | 8.2 | 1.5 |
| iii) Slaughtering | 3.6 | 3.6 | 3.5 | 3.5 | 4.1 |
| 3 Electricity generation & distribution and gas distribution | 9.4 | -2.7 | -17.2 | 14.5 | 17.7 |
| 4. Construction | 13.7 | 9.0 | 10.8 | -16.8 | 8.1 |

Source: Pakistan Bureau of Statistics

[27] According to anecdotal evidence available in August 2020, the Pakistan Poultry Association (PPA) claimed that the poultry industry had shrunk to Rs 800 billion compared to its pre-Covid level of Rs 1.1 trillion. PPA estimated poultry meat consumption as follows: marriage halls (15 percent); hotels and restaurants (30 percent); domestic open market (55 percent).
[28] More than 50 percent weight is the average of last 5 years (FY16-FY20).
[29] The analysis of LSM sector is based on data released by the Pakistan Bureau of Statistics' Quantum Index of LSM Industries for July 2020. The LSM numbers in the National Accounts data for the calculation of GDP and overall industrial sector were based on provisional estimates at the time, which was March 2020.

**LSM Growth (YoY growth)** **Figure 2.8**




Source: Pakistan Bureau of Statistics

On the other hand, the increase in fiscal expenditure was not sufficient to arrest the overall decline in the industrial sector. That said, government spending played a positive role in the output of energy and construction sub-sectors. In particular, *electricity generation and distribution and gas distribution* sub-sector posted an expansion of 17.7 percent in FY20, after growing 14.5 percent last year. The gross value addition of the electricity sector contributed significantly to the sub-sector's performance, which can be attributed to higher output growth relative to intermediate consumption. It is important to recall here that the government had rolled out a comprehensive circular debt reduction program at the start of the year to improve viability of the power sector and arrest the accumulation of arrears. Accordingly, power tariffs were increased in the initial months of FY20 to pass on the impact of rising capacity charges and fuel price adjustments. This had helped improve gross revenues in this sector. In contrast, the growth in intermediate consumption was modest due to a shift in the fuel mix in favor of cheaper sources, such as hydel and coal.

The construction sector also benefited from public sector spending, registering a growth of 8.1 percent in FY20 compared to a contraction of 16.8 percent in FY19. Increase in current as well as PSDP expenditure aided growth in the construction sector.[30] Large infrastructure projects, such as Diamer-Bhasha dam, Mohmand dam, highways (Sukkur-Multan motorway, Lahore Multan motorway etc.) and intra-city public transport network (BRT Peshawar) were fast-tracked during FY20. Furthermore, in the midst of the pandemic, the construction sector, due to its wider employment generating potential, was given several incentives by the government.[31]

The mining sector's output fell largely on account of a decrease in the output of fossil fuels. Crude oil and natural gas production fell by 10.6 and 6.4 percent respectively. The production of these commodities fell due to lower exploration activities, slowdown in demand for energy products and regulatory restrictions on production of furnace oil in the upstream refineries. Meanwhile, amid special circumstances related to the Covid-19 pandemic, the typical fixed-growth calculation methodology for small scale industry was not used by the PBS in FY20. Instead, detailed sectoral analysis was employed, and it showed that the output for this sector decelerated to 1.5 percent. Last year, a fixed growth rate of around 8.2 percent was used to derive

[30] Source: Fiscal Operations, July to June 2019-20, Ministry of Finance.
[31] Source: The Tax Laws (Amendment) No. 1 of 2020, Law and Justice Division Letter F.No.1(1)/2020, dated April 19,, 2020, Federal Board of Revenue.

estimates of gross value addition at constant prices of this cottage industry.[32]

## Large-Scale Manufacturing

The developments in the LSM sector during FY20 can be explained more clearly by dividing it into two phases: pre-Covid, and the period after the onset of Covid-19. The pre-Covid period was from July 2019 to February 2020, while the second period covered the rest of FY20.[33] The LSM sector was showing some early signs of recovery in the pre-Covid-19 period; the contraction in a few industries had bottomed out (such as petroleum and steel), while others had started to gain some traction, such as textile, leather, fertilizer, cement, food and paper. As the Covid-19 infections started to climb and lockdowns ensued, almost all manufacturing activities came to an abrupt halt. It dragged even the previously better performing sectors into negative growth territory (**Table 2.13**).

## Automobile

The automobile sector was the largest contributor towards the decline in the LSM index. The industry contracted by 43.8 percent in FY20 on the top of 11.8 percent contraction last year. The sector was already in downtrend before the pandemic struck, mainly due to stabilization measures like the Pak Rupee depreciation, increase in taxes as well as interest rates, and an overall economic slowdown. The situation worsened after Covid-19, as lockdowns adversely affected the production activities. Variant-wise data shows that production of majority of car categories fell by around half of last year's level (**Table 2.14**).

On the supply side, there was a sharp cost escalation. The Pak Rupee depreciation and increase in duties led to an increase in vehicle prices. The Pak Rupee on average depreciated by another 13.9 percent vis-à-vis USD in FY20, whereas it had depreciated by 19.3 percent in FY19. Low levels of localization in the automobile industry forced the assemblers to pass on the increase in import costs to customers. Moreover, the government-imposed federal excise duty and increased additional customs duty, which resulted in further increase in prices of vehicles.

**LSM Growth (YoY percent)** **Table 2.13**

| | wt. | Jul-Feb | | Mar-Jun | | Full Year | |
|---|---|---|---|---|---|---|---|
| | | FY19 | FY20 | FY19 | FY20 | FY19 | FY20 |
| LSM | 70.3 | -1.6 | -2.9 | -3.7 | -24.0 | -2.3 | -10.0 |
| Textile | 20.9 | -0.1 | 0.4 | 0.1 | -31.8 | -0.1 | -10.4 |
| Cotton yarn | 13 | 0.0 | 0.1 | 0.1 | -32.6 | 0.0 | -10.8 |
| Cotton cloth | 7.2 | 0.1 | 0.2 | 0.5 | -32.4 | 0.2 | -10.7 |
| Jute goods | 0.3 | -12.4 | 4.3 | -4.0 | -16.0 | -9.5 | -3.1 |
| Food | 12.4 | -1.0 | 1.1 | -13.9 | -10.3 | -5.6 | -2.6 |
| Sugar | 3.5 | -8.2 | 10.3 | -38.9 | -49.9 | -19.9 | -7.2 |
| Cigarettes | 2.1 | 9.0 | -31.2 | -9.5 | -6.8 | 2.8 | -24.1 |
| Vegetable ghee | 1.1 | 2.5 | 5.7 | 5.1 | -0.1 | 3.3 | 3.8 |
| Cooking oil | 2.2 | 3.0 | 7.4 | 5.3 | 11.8 | 3.7 | 8.8 |
| Soft drinks | 0.9 | -2.1 | -10.0 | 3.0 | -13.8 | -0.2 | -11.5 |
| POL | 5.5 | -5.5 | -13.6 | -13.5 | -32.9 | -8.4 | -20.1 |
| Steel | 5.4 | -10.3 | -7.0 | -13.2 | -39.6 | -11.2 | -17.4 |
| Non-metallic Minerals | 5.4 | -4.0 | 4.4 | 0.7 | -14.3 | -2.4 | -2.2 |
| Cement | 5.3 | -4.5 | 4.3 | 0.0 | -13.7 | -3.0 | -2.0 |
| Automobile | 4.6 | -6.0 | -35.1 | -23.0 | -64.8 | -11.8 | -43.8 |
| Jeeps and cars | 2.8 | 1.3 | -45.7 | -21.4 | -78.8 | -6.2 | -54.8 |
| Fertilizer | 4.4 | 4.9 | 6.0 | 13.4 | 1.4 | 7.7 | 4.4 |
| Pharmaceutical | 3.6 | -8.7 | -5.2 | -7.5 | 2.5 | -8.3 | -2.7 |
| Paper | 2.3 | -3.2 | 5.1 | -4.8 | -3.4 | -3.7 | 2.3 |
| Electronics | 2 | 36.0 | -7.8 | 118.3 | -67.8 | 59.4 | -31.2 |
| Chemicals | 1.7 | -3.9 | 0.5 | -4.5 | -19.8 | -4.1 | -6.4 |
| Caustic soda | 0.4 | -2.5 | -3.8 | -18.9 | -23.6 | -8.7 | -10.4 |
| Leather products | 0.9 | 0.0 | 10.1 | -6.7 | -45.6 | -2.4 | -9.1 |

Source: Pakistan Bureau of Statistics

Factors that had constrained demand during the pre-Covid period included reduced purchasing power of customers and a higher level of fuel prices. Prices of petrol and diesel remained on the higher side in FY20, compared to their levels in FY19. Similarly, prices of auto parts, such as tyres and lubricants, also rose sharply, increasing the cost of maintenance for vehicles. On the fiscal side, austerity measures like ban on purchase of vehicles (except motorcycles) for use in the

[32] This fixed growth rate was based on inter-survey annual compound growth rate of Small and Household Manufacturing Industries (SHMI) between FY97 and FY07.
[33] The government imposed mobility restrictions in March 2020.

**Automobile Sector Production** **Table 2.14**

| | Number of units produced | | | | Growth | |
|---|---|---|---|---|---|---|
| | FY17 | FY18 | FY19 | FY20 | FY19 | FY20 |
| All cars | 167,405 | 195,895 | 191,526 | 89,875 | -2.2% | -53.1% |
| Cars <800 cc | 38,311 | 47,199 | 32,121 | 33,786 | -31.9% | 5.2% |
| Cars between 800-1000 cc | 35,313 | 49,848 | 56,760 | 17,905 | 13.9% | -68.5% |
| Cars >1000cc | 93,781 | 98,848 | 102,645 | 38,184 | 3.8% | -62.8% |
| Sports utility vehicles | 3,530 | 13,364 | 7,525 | 3,564 | -43.7% | -52.6% |
| Light commercial vehicles | 43,796 | 50,934 | 42,182 | 16,518 | -17.2% | -60.8% |
| Trucks | 7,712 | 9,187 | 6,035 | 2,945 | -34.3% | -51.2% |
| Buses | 1,118 | 784 | 913 | 532 | 16.5% | -41.7% |
| Tractors | 53,975 | 71,894 | 49,902 | 32,608 | -30.6% | -34.7% |
| Motorbikes | 1,632,965 | 1,928,757 | 1,766,423 | 1,370,417 | -8.4% | -22.4% |

Source: Pakistan Automotive Manufacturers Association

public sector subdued the demand further.[34] The ban was applied for both current as well as development expenditures of the government.

In the aftermath of the pandemic, production was completely halted in April 2020, and even when assembling resumed in subsequent months, the industry operated well below its installed capacity. This situation, due to Covid-19, was not specific to Pakistan alone. Across the globe, production of vehicles fell, as demand plummeted due to sharp increase in unemployment levels. All major players in the global automobile industry, except Kia and Hyundai, were projecting to report operating losses.[35] Moreover, automotive production in the US and the EU was estimated to fall by 25 percent in 2020.[36]

## *Construction Allied Industry*

The output of steel and cement industries contracted further in FY20, after declining in FY19 as well. The decline in steel was more acute as it suffered double-digit contraction for the second year in a row. The cement sector, however, which was faring well in the pre-Covid-19 environment, also experienced decline when the lockdowns were imposed. It is worth noting that the contraction in both cement and steel sectors (**Table 2.13**) does not reconcile with the reported expansion in the construction industry (**Table 2.12**). Perhaps this gap has stemmed from the time horizon of data reporting in the National Income Accounts, which, in the case of the construction industry, spanned across July-March FY20, whereas the reporting period for cement and steel in the LSM sector ran for the entire fiscal year.

Analysis of the LSM data in tandem with borrowing pattern for the industry showed that construction activities slowed down, at least in the private sector. After witnessing an expansion of Rs 10.4 billion in consumer financing for house building in FY19, net retirements of Rs 9.3 billion were recorded during FY20. In a similar vein, borrowing by real estate developers decelerated from Rs 8.6 billion in FY19 to Rs 2.6 billion in FY20, owing largely to contraction in demand for fixed investment loans (**Chapter 3**). Analysis on

[34] Austerity measures for financial year 2019-20, Office Memorandum No: 7(1) Exp.IV/2016-812, Finance Division, Government of Pakistan

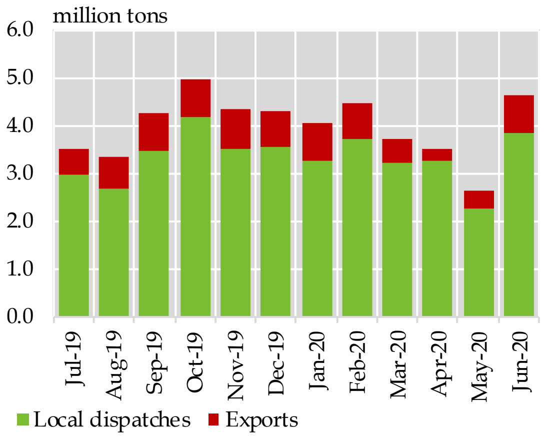
[35] Source: Auto Sector Amid Covid-19, S&P Global, https://www.spglobal.com/en/research-insights/featured/auto-sector-amid-covid-19

[36] Source: European Automobile Manufacturers Association, https://www.acea.be/press-releases/article/eu-car-sales-forecast-2020-record-drop-of-25-expected-this-year-says-acea
Credit FAQ: Q&A: COVID-19 And The Auto Industry--What's Next?, S&P Global Ratings, https://www.spglobal.com/ratings/en/research/articles/200609-credit-faq-q-a-covid-19-and-the-auto-industry-what-s-next-11518344

basis of Covid-19 situation shows the situation deteriorated further after pandemic. Whereas increase in interest rates and ban on non-tax-filers on purchase of property had hurt demand for housing credit in the pre-Covid phase, the impact on demand was accentuated further by mobility restrictions and loss of incomes during the pandemic period.

The steel industry downtrend deepened in FY20. In addition to a slowdown in housing demand, contraction in the automobile industry also played a role in depressing steel output. Production of long steel products, used mainly in construction sector activities, also dipped sharply. Moreover, the contraction in the automobile sector adversely affected flat steel producers throughout the year, as demand remained low.

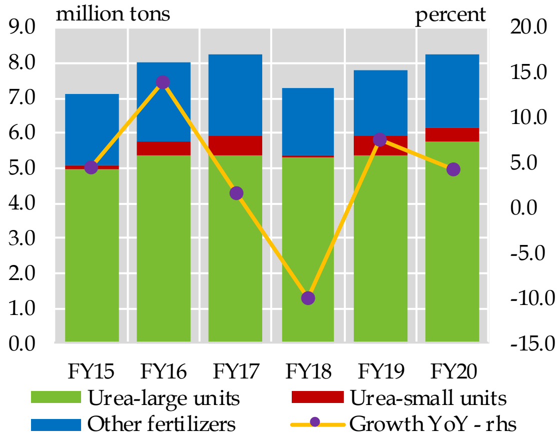
**Cement Sales** **Figure 2.9**




Source: All Pakistan Cement Manufacturers Association

The cement industry's output grew steadily during the year up until the Covid-19 outbreak. After a dull Q1-FY20, the output of the cement industry started to turn positive in the following two quarters. Robust local sales in the north and export-led activity in the south facilitated this growth. Increase in local dispatches during this period also indicated gradual recovery in construction-allied industries, especially in Punjab and Khyber Pakhtunkhwa. On the other hand, exports of clinker – a product produced in the manufacturing process of Portland cement – gained traction in the international market. However, after the Covid-19 outbreak, the cement industry's output started to fall in Q4-FY20. Local dispatches declined and exports also suffered a drop; however, they recovered sharply as soon as the restrictions were softened towards the end of Q4-FY20 (**Figure 2.9**).

**Fertilizer Production & Growth** **Figure 2.10**




Source: National Fertilizer Development Centre

## *Fertilizer*

The fertilizer sector's output expanded by 4.4 percent in FY20 on the back of impressive performance by large urea firms and, to an extent, recovery in production of other fertilizer products (**Table 2.13**).[37] It was one of the few industries that remained insulated from the Covid-19 lockdowns, which aided its output. The demand for fertilizer products remained largely intact, as the agriculture sector's economic activities remained immune to strict mobility restrictions observed mainly in urban centers.

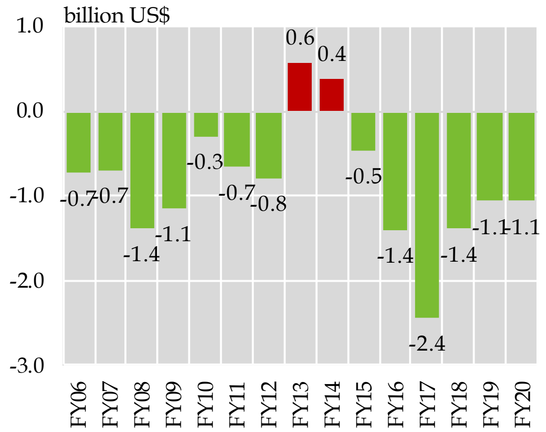
Output of larger urea processing units rose by 8.4 percent in FY20 compared to a negligible growth in FY19. It was the highest ever output by these plants. Together with the relatively smaller units, production crossed 6 million tons for the first time in the country's history (**Figure 2.10**). Smaller units' output

[37] The analysis of urea production in this section relates to production on the basis of fiscal year, whereas the earlier discussion in the agriculture section of the chapter relates to urea offtake, and is based on cropping seasons, which explains the apparent variation in numbers. Moreover, the YoY growth is slightly different from LSM

dropped due to gas supply disruptions. However, lower output from these facilities did not affect the overall production given their minor share in the industry (6.3 percent in FY20). As there was no corresponding increase in the installed capacity during this period, the performance can be attributed to enhanced operational efficiency of larger urea plants.[38]

In addition to urea, the production of other fertilizer products also recovered. After contracting in the last two years, this segment grew by 9.8 percent during FY20. Double digit growth was observed in processing of Calcium Ammonium Nitrate and Nitro Phosphate (20.4 and 31.3 percent respectively), which more than offset the decline in Di-Ammonium Phosphate, Single Super-Phosphate and other Nitrogen-Phosphorus-Potassium (NPK) products.

**Net Food Exports** **Figure 2.11**




Source: Pakistan Bureau of Statistics

## *Food*

The food industry's output shrank by 2.6 percent in FY20, on the top of 5.6 percent contraction observed last year. Most of the activity in food processing group is concentrated within tobacco, sugar and edible oil industries. In FY20, output of edible oil industry expanded in line with last few year's trend. On the other hand, production of sugar and tobacco industry declined in FY20 compared to last year.

As things stand, Pakistan remained a net food importing country in value terms in FY20, despite witnessing improvement in its trade balance. The food trade balance remained at last year's level of negative US$ 1.1 billion (**Figure 2.11**). As also highlighted previously in SBP's Annual Report for FY19, for an agriculture- based economy like Pakistan, the trend in food imports does not bode well from a food security standpoint. Lack of modernization and low-productivity in the agriculture sector has a knock-on effect on the food-processing sector. For instance, the relatively low yields of oilseeds in the country make domestic edible oil processing industry dependent on imports of palm oil and oilseeds. Not only does this restrict growth of the industry as it only caters to meeting domestic demand, it also costs significant amount of foreign exchange. In a similar vein, low yield of pulses and milk also entails imports of these items.

**Changes in FED on Cigarettes** **Table 2.15**

| Timeline | Tier | (Price=P in PKR/1000 cigarettes) | FED |
|---|---|---|---|
| Jun-16 | Tier 1 | > 4,000 | 3,436 |
| | Tier 2 | < 4,000 | 1,534 |
| May-17 | Tier 1 | > 4,500 | 3,740 |
| | Tier 2 | 2,925 < P < 4,500 | 1,670 |
| | Tier 3 | < 2,925 | 800 |
| Apr-18 | Tier 1 | > 4,500 | 3,964 |
| | Tier 2 | 2,925 < P < 4,500 | 1,770 |
| | Tier 3 | < 2,925 | 848 |
| Sep-18 | Tier 1 | > 4500 | 4,500 |
| | Tier 2 | 2,925 < P < 4,500 | 1,840 |
| | Tier 3 | < 2,925 | 1,250 |
| Jun-19 | Tier 1 | > 5,960 | 5,200 |
| | Tier 2 | < 5,960 | 1,650 |

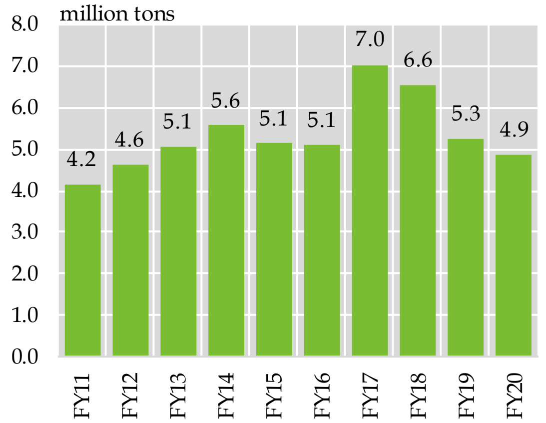
Source: Federal Board of Revenue

Meanwhile, a fall in the cigarette production can be attributed to the re-introduction of the two-tier excise duty structure in FY20 in place of the three-tier structure that had remained in place for the past couple of years (**Table 2.15**). Moreover, the duty was significantly increased compared to last year. The rationale for this measure was to discourage tobacco

[38] Sources: (1) Half Yearly Financial Statements, 30 June 2020, Fauji Fertilizers Company Limited and (2) Half Yearly Report 2020, Engro Fertilizers.

consumption as well as to increase revenues. Arguably, tobacco usage may not have fallen as envisioned, given the relatively inelastic nature of cigarette consumption; it may have just driven the consumers away from the formal market towards the informal one.

**Sugar Production Trend** **Figure 2.12**




Source: Pakistan Bureau of Statistics

Output of the sugar industry declined by 7.2 percent after dropping 19.9 percent last year (**Figure 2.12**). Lower availability of raw material (sugarcane) was one of the primary reasons for below-par results. The sugarcane production declined 1.4 percent in FY20, which directly affected the upstream sugar processing industry. This can be traced back to lower area under the crop in FY20 of 1.0 million hectares, against 1.1 million hectares last year.

## *Petroleum*

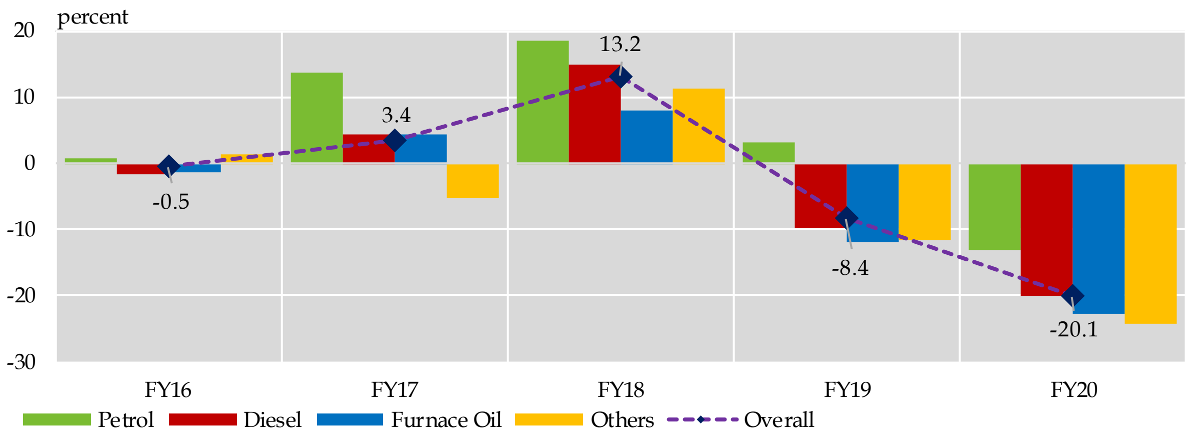
The petroleum industry was already reeling from the curbs on furnace oil production and economic slowdown in the pre-Covid-19 period. Post-outbreak mobility restrictions further diminished demand for energy products, which adversely affected the industry. The output eventually fell by 20.1 percent in FY20 compared to 8.4 percent contraction in the previous year (**Figure 2.13**).

After falling by 11.9 percent in FY19, the furnace oil output fell another 22.6 percent as a consequence of the government's policy to reduce its reliance on furnace oil-based electricity generating units. Increase in electricity generation from hydel sources and from coal did reduce dependency on furnace oil (FO) based units (**Figure 2.14**). The gradual phasing out of FO from the energy mix should be a concern for the industry because the production processes of number of refineries are outdated and produce large quantities of environmentally hazardous high-sulphur furnace oil.[39] Since refinery upgradation projects take years to complete, further delays in investment by refineries in modernizing their plants would affect the POL sector's performance for the foreseeable period.

## *Textile and Leather*

The textile sector was showing signs of

**Petroleum Industry, Product-wise Growth (Annual YoY, FY16-FY20)** **Figure 2.13**

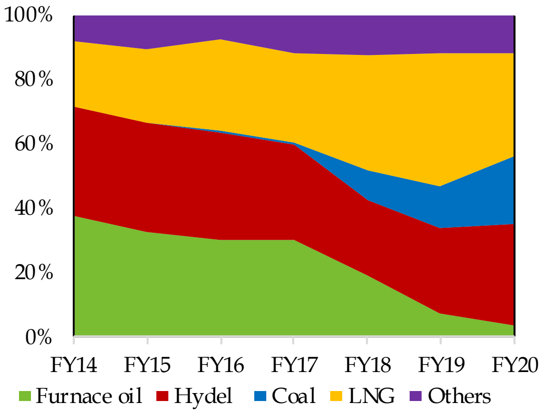



Source: Pakistan Bureau of Statistics

[39] Source: MoF (2020). "Energy". In *Pakistan Economic Survey*. Islamabad: Ministry of Finance (pp.273-285).

stability in the pre-Covid-19 period as it posted positive growth, unlike last year. During the Jul-Feb FY20 period, textile production rose by 0.4 percent, as compared to 0.1 percent contraction in the same period last year. Market-based exchange rate regime, continued concessionary access to the EU, and US-China trade tensions, all played a crucial role in supporting the competitiveness of the domestic textile industry (**Chapter 6**).

**Share of Sources in Electricity Generation** **Figure 2.14**

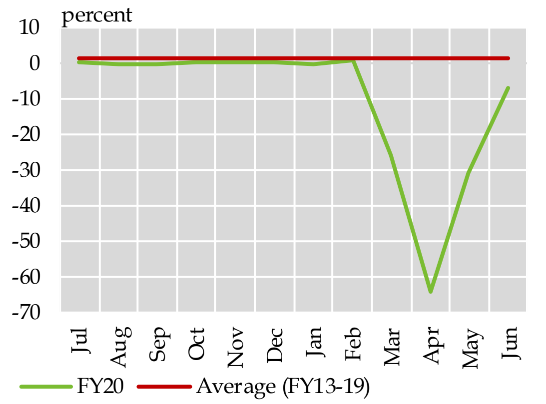



Source: NEPRA

The signs of recovery in the textile sector were evident further from exports data, which showed the highest growth in H1 since FY14. Activities in the apparel segment picked up in particular. Since China faced the onset of Covid-19 and subsequent lockdowns earlier than other countries, Pakistan along with a few other textile exporters managed to increase their share in some western markets at the start of Q3-FY20. However, this proved to be short-lived, as the government imposed lockdowns to contain the spread of the virus by late March (**Figure 2.15**). Export orders eventually dried up under the "Great Lockdown". With both demand and supply affected, the textile sector could not keep up its growth momentum and hence contracted sharply. The fallout of Covid-19 resulted in an output contraction of 10.4 percent in FY20, compared to the almost zero-growth in the last year. On quarterly basis, the production shrank by more than one-third in Q4-FY20 on YoY basis, dragging the overall FY20 growth downwards.

The developments in the leather industry were not much different. Output of the industry expanded by 10.1 percent during Jul-Feb FY20 compared to negligible growth during same period last year. Substantial growth in export orders of leather articles helps explain the output of the domestic leather industry. Another welcome development before the onset of Covid-19 was the diversification in exports away from the traditional EU market to destinations such as Australia, Brazil, and the US.

**Textile Sector Growth (Monthly YoY)** **Figure 2.15**




Source: Pakistan Bureau of Statistics

## *Electronics*

The output of the electronics sector contracted by 34.8 percent in FY20 compared to an impressive growth of 59.4 percent in the preceding year. Last year's performance can be traced back to an expansion in the production of electric motors. The expansion was attributed to increase in demand for water extraction pumps, particularly the solar powered, in the agriculture sector. However, as the market for these motors saturated, the growth apparently stalled in FY20.

Furthermore, the electronics sector was also affected by the subdued demand for consumer electronics, especially during the Covid-19 lockdowns. As retail markets across the country were shut down, and demand ebbed, production of consumer durables also decreased. In the pre-Covid-19 period, the production of deep freezers posted growth of 7.0 percent, while that of air-conditioners and refrigerators fell by 29.3 and 14.4 percent respectively. However, by the end of FY20, output of deep-freezers, air-conditioners and refrigerators, all had fallen, by 57.7, 58.3 and 33.9 percent respectively.

## 2.4 Services

Services sector had already experienced a notable deceleration in FY19, posting only a 3.8 percent growth compared to the average growth rate of 6.2 percent during the previous FY16-FY18 period. It is worth noting that in FY20, the services sector was already feeling the pinch from a slowdown in the industrial sector as well as from imports. Finally, the onset of Covid-19 significantly dampened the services sector growth to -0.6 percent; this contraction is unprecedented in Pakistan's economic history.

**Performance of the Services Sector** **Table 2.16**

percent

| | Share in GDP-FY20 | Growth | |
|---|---|---|---|
| | | FY19R | FY20P |
| Wholesale & retail trade | 18.2 | 1.1 | -3.4 |
| Transport, storage & communication | 12.3 | 4.6 | -7.1 |
| Finance & insurance | 3.6 | 5.0 | 0.8 |
| Housing services | 7.0 | 4.0 | 4.0 |
| General government services | 8.6 | 5.2 | 3.9 |
| Other private services | 11.8 | 5.8 | 5.4 |
| **Services** | **61.4** | **3.8** | **-0.6** |

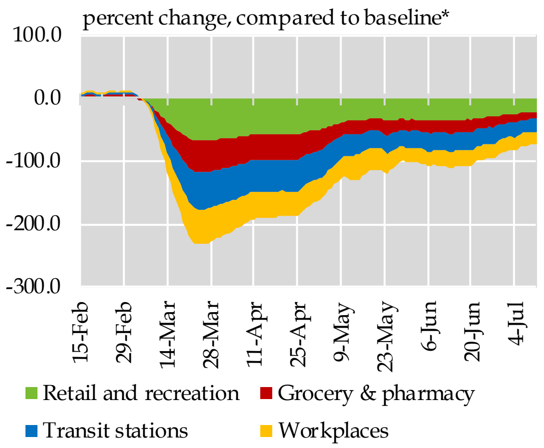
R: Revised P: Provisional

Source: Pakistan Bureau of Statistics

The *wholesale and retail trade* segment, with a share of 18.2 percent in GDP, posted a negative growth of 3.4 percent in FY20 on the back of contraction in LSM and imports (**Table 2.16**). The contraction in imports was due to continued macroeconomic stabilization policies such as monetary tightening and adoption of market-based exchange rate regime. Meanwhile, at the start of FY20, the documentation drive pursued by the government was met with resistance by various trade associations, and these frictions, continued until end-October 2019, when an agreement was finally reached among the stakeholders.

Furthermore, in the aftermath of the Covid-19 outbreak and the imposition of a country-wide strict lockdowns (entailing closure of shopping malls, non-essential retail shops, restaurants, and other commercial centers), economic activity in the *wholesale and retail trade* plunged sharply (**Figure 2.16**). However, in May 2020, with the aim of striking a better balance between lives and livelihoods, the government followed a smart lockdown strategy, which allowed businesses to resume their operations while observing the SOPs. Since then, activity in this segment started to pick up gradually (**Figure 2.16**).

**Mobility Changes (15-days MA)** **Figure 2.16**




* The baseline is the median value, for the corresponding day of the week, during the 5- week period Jan 3–Feb 6, 2020.

Source: Covid-19 Community Mobility Report (Google)

Within the *transport, storage and communication* segment, the transport sector faced major headwinds in FY20 (**Table 2.17**). The disagreement between government and transporters on the issue of axle load control kept surfacing during the year, affecting activities in the transport segment. The regime shift in axle load was intended to curb overloading of vehicles, in order to protect the road infrastructure and also to prevent accidents caused by overloading. However, the measure was met with resistance from certain quarters of the business community and transporters, who argued that it would unnecessarily increase the cost of doing business. Additionally, due to continued economic stabilization measures - monetary tightening, fiscal consolidation and exchange

**GVA Transport, Storage and Communication Sector (Constant Prices)** **Table 2.17**

| percent | Share in FY20 | Growth | |
|---|---|---|---|
| | | FY19R | FY20P |
| Road transport | 71.1 | 5.5 | -9.6 |
| Air transport | 6.6 | 31.6 | -6.5 |
| Railways | 0.4 | 68.6 | -45.7 |
| Water transport | 3.7 | 75.7 | 16.0 |
| Communication | 15.3 | 7.6 | 4.1 |
| Storage | 2.7 | 0.7 | -4.5 |
| Pipeline | 0.1 | 8.0 | -12.2 |
| **Total** | **100** | **4.63** | **-7.08** |

R: Revised P: Provisional

Source: Pakistan Bureau of Statistics

rate adjustments - sales of trucks and buses dropped by 46.1 percent to 3,647 units only in FY20, compared to 6,763 units recorded last year.[40]

Furthermore, from March 2020 onwards, the government suspended transport services (flights, railways and public transport) for nearly six weeks to contain the spread of Covid-19, which ultimately led to a sharp contraction in the transport sector (**Table 2.17**).[41] Subsequently, operations were gradually restored, but lower demand and social distancing SOPs kept the sector's growth in check.

Meanwhile in the *communication* segment, cellular teledensity and broadband penetration rose to 80.0 percent and 39.2 percent respectively by end-June 2020, compared to 76.8 percent and 33.8 percent last year. In particular, PTCL recorded significant growth in internet traffic during the pandemic period, as e-learning, virtual meeting platforms, e-commerce, and other digital transactions gained traction (**Special Section**)[42]

In case of *finance and insurance*, a sharp deceleration in the growth rate of scheduled banks – carrying the largest share in this segment – slowed down the growth rate of the entire sector to 0.8 percent in FY20, from 5.0 percent recorded last year. The onset of Covid-19 in the second half of FY20 further diminished the growth prospects of this segment as a result of lower demand for credit from the private sector (**Chapter 3**). The deterioration in asset quality of the banking sector was also observed with the infection ratio rising to 9.7 percent in FY20 from 8.8 percent last year.

Meanwhile, the overall usage of e-banking channels, as measured by transactions via Real Time Online Banking (RTOB), ATMs, Point of Sale (POS), internet and mobile phone banking, call center banking and e-commerce, rose by 4.2 percent in volume and 12.2 percent in value during FY20 (**Table 2.18**).[43]

**E-Banking Transactions** **Table 2.18**

Volume in million & value in billion Rupees

| | Volume | | | Value | | |
|---|---|---|---|---|---|---|
| | FY19 | FY20P | Growth | FY19 | FY20P | Growth |
| **E-Banking** | 869.8 | 905.9 | 4.2 | 58,820.7 | 65,987.3 | 12.2 |
| Real time online branches (RTOB) | 187.4 | 173.7 | -7.3 | 49,430.7 | 54,433.2 | 10.1 |
| ATM | 523.3 | 512.1 | -2.1 | 6,399.6 | 6,429.4 | 0.5 |
| Point of sale (POS) | 72.4 | 70.3 | -2.9 | 366.2 | 364.2 | -0.5 |
| Internet banking | 39.7 | 56.6 | 42.6 | 1,722.2 | 2,952.7 | 71.4 |
| Mobile phone banking | 41.1 | 82.8 | 101.5 | 866.8 | 1,763.6 | 103.5 |
| Call centers/IVR banking | 0.3 | 0.2 | -33.3 | 9.2 | 9.3 | 1.1 |
| E-commerce | 5.7 | 10.2 | 78.9 | 26.1 | 34.9 | 33.7 |

P: Provisional

Source: State Bank of Pakistan

[40] Source: PAMA - Pakistan Automotive Manufacturers Association

[41] The operations of private ride-hailing services (Careem, Uber, Swvl and Airlift) were also suspended during the lockdown.

[42] Source: PTCL press release, dated July 15, 2020.

[43] Real Time Online Branches (RTOB) that are connected through Core Banking Application and provide real-time online banking across Pakistan.

Disaggregated data shows further that within e-banking channels, transactions through internet and mobile phone banking increased significantly, both by volume and value, when compared to last year. The rise in payments through these channels is a promising sign and clearly in line with the SBP's National Payment Systems Strategy (NPSS) objectives to transition people from cash-based transactions to digital ones. Furthermore, commercial banks were instructed by the SBP to waive service charges on fund transfers through online banking channels to ensure customer and employee safety during the pandemic, as well as to push digital payments through these two channels (**Special Section**).

Enhanced provision of government services also provided some cushion to the economy. For instance, considering the economic impact of the lockdowns on livelihoods of daily wage earners, the government allocated Rs 203 billion under "Ehsaas Emergency Cash Program". Around Rs 160.5 billion was already distributed among 13.3 million beneficiaries till July 27. Overall government current expenditure rose by 20.1 percent to Rs 8.5 trillion during FY20, compared to Rs 7.1 trillion last year (**Chapter 4**).

In the *other private services* segment, net ICT exports jumped by 36.0 percent YoY, to US$ 784 million (**Table 2.19**). Within this, software consultancy services and computer software witnessed growth of 23.0 percent and 48.3 percent respectively. Importantly, the jump in exports was more pronounced in the second half of FY20.[44] Amid the "Great Lockdown", the rise in ICT-related services exports indicated that Pakistani firms were able to benefit from the rise in global demand for these services. Social distancing measures adopted by governments may have further boosted demand for online services in work-from-home arrangements.[45]

**Pakistan's Trade in Computer Services (Net)** **Table 2.19**

| (thousand US$) | FY19 | FY20P |
|---|---|---|
| **Computer services** | **576,110** | **783,807** |
| Software consultancy services | 245,690 | 302,194 |
| Computer software | 104,362 | 154,722 |
| Hardware consultancy services | 2,145 | 1,942 |
| Maintenance & repairs of computer | 4,640 | 805 |
| Other computer services | 219,273 | 324,144 |

Source: State Bank of Pakistan

[44] The net ICT export rose by 25.4 percent and 46.8 percent in H1-FY20 and H2-FY20, respectively, compared to same period of last year.
[45] WTO (2020). *Trade in Services in the Context of Covid-19*. Information Note May 26, 2020. Geneva: World Trade Organization.