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October 2018

Bangladesh Development Update

Powering the economy efficiently

THE WORLD BANK
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Preface

The objective of this report is to share perspectives with the Government of Bangladesh, think tanks and researchers, and the public as well as the Bank's senior management on the state of the economy, outlook, risks, progress on structural policy reforms and key challenges the economy is currently facing. The coverage includes developments in the real sector focusing on poverty, growth, and inflation; external sector developments focusing on the balance of payments, foreign exchange reserves and the exchange rate; fiscal developments focusing on revenue mobilization, public expenditures, and deficit financing; financial sector developments focusing on credit and interest rates; and monetary developments. This update also assesses the progress in the electricity sector and concludes with an exposition of the policy challenges that need to be addressed to enable electricity supply keep up with the fast-growing demand.

Acknowledgements

This report was prepared by a team comprising of Zahid Hussain (Lead Economist), Fan Zhang (Senior Economist), Nazmus Sadat Khan (Economist), Afroza Alam (Research Analyst) and Shegufta Shahriar (Team Associate). A. K. M. Abdullah (Senior Financial Sector Specialist) made valuable contribution on developments in the capital market. Demetrios Papathanasiou (Practice Manager), Jari Vayrynen (Senior Energy Specialist), Ilias Skamnelos (Lead Financial Sector Specialist), Mona Prasad (Lead Economist), and Christian Eigen-Zucchi (Program Leader) provided extremely useful comments. Manuela Francisco (Practice Manager) provided overall guidance in the preparation of this report.

Abbreviations

ADP	Annual Development Plan
ADR	Advance-Deposit Ratio
BAB	Bankers Association of Bangladesh
BB	Bangladesh Bank
BBS	Bangladesh Bureau of Statistics
BCIC	Bangladesh Chemical Industries Corporation
BFIU	Bangladesh Financial Intelligence Unit
BOGMC	Bangladesh Oil, Gas and Mineral Corporation
BOP	Balance of Payment
BPDB	Bangladesh Power Development Board
BSEC	Bangladesh Securities and Exchange Commission
CPD	Centre for Policy Dialogue
CPI	Consumer Price Index
CRR	Cash Reserve Ratio
CY	Calendar Year
DFIs	Development Finance Institutions
DMRTDP	Dhaka Mass Rapid Transit Development Project
DSE	Dhaka Stock Exchange
DSEX	Dhaka Stock Exchange Board Index
EBA	Everything But Arms
EPB	Export Promotion Bureau
EPZ	Export Processing Zone
ESMAP	Energy Sector Management Assistance Program
EU	European Union
FCB	Foreign Commercial Bank
FDI	Foreign Direct Investment
FY	Fiscal Year
GCC	Gulf Cooperation Council
GDP	Gross Domestic Product
GNI	Gross National Income
GNFS	Goods and Non-factor Services
GSP	Generalized Scheme of Preferences
GW	Gigawatts
HDI	Human Development Index
HS	Harmonized System
ICB	Investment Corporation of Bangladesh
ICE	Intercontinental Exchange
ILO	International Labour Organization
IMED	Implementation Monitoring and Evaluation Division
IMF	International Monetary Fund
IPP	Independent Power Producer
KSA	Kingdom of Saudi Arabia
LC	Letter of Credit
LDC	Least Developed Country
LMICs	Low- and Middle-Income Countries
LNG	Liquefied Natural Gas

MDAs	Ministries, Divisions and Agencies
MENA	Middle East and North Africa
MLT	Medium and Long-Term
MoF	Ministry of Finance
MoU	Memorandum of Understanding
MSTPP	Moitri Super Thermal Power Projec
MT	Metric Ton
MUSCCFPP	Matarbari Ultra-Super Critical Coal-Fired Power Project
MW	Megawatt
NBR	National Board of Revenue
NCBs	Nationalized Commercial Banks
NPL	Non-Performing Loan
NSC	National Savings Certificate
NSW	National Single Window
OPEC	Organization of the Petroleum Exporting Countries
OSS	One Stop Shop
PBRL	Padma Bridge Rail Link
PCB	Private Commercial Bank
PD	Project Director
PM2.5	Particulate Matter
PMB	Padma Multipurpose Bridge
POL	Petroleum, Oil, and Lubricants
R&D	Research and Development
RADP	Revised Annual Development Plan
REER	Real Effective Exchange Rate
RMG	Ready-Made Garment
RNPP	Ruppur Nuclear Power Plant
RoO	Rules of Origin
SAFTA	South Asian Free Trade Agreement
SANEM	South Asian Network on Economic Modeling
SCBs	State-owned Commercial Banks
SD	Supplementary Duty
SDGs	Sustainable Development Goals
SOCBs	State Owned Commercial Banks
SOEs	State-owned Enterprises
UAE	United Arab Emirates
UK	United Kingdom
UN	The United Nation
UNESCAP	United Nations Economic and Social Commission for Asia and the Pacific
US	The United States
VAT	Value Added Tax
Y-O-Y	Year-on-Year

Abstract

Strong growth, driven by consumption and public investment, has continued. Macroeconomic stability is strained. Inflation has picked up, driven by food price increases initially and by non-food inflation more recently. Notwithstanding rebound in garment exports and remittances, the current account deficit has widened significantly because of a surge in imports. A large increase in the disbursement of medium and long-term loans helped contain pressure on foreign exchange reserves and moderate the depreciation of the exchange rate. Monetary growth has been subdued because of decline in public sector borrowing from banks and reduced net international reserves, creating room for increased private sector credit growth. However, weak deposit growth and the persistence of high levels of non-performing loans have led to rise in lending rates. The fiscal deficit has increased despite underspending on public investment as revenue growth fell well short of the budget target. Excessive reliance on expensive saving instruments to finance the budget deficit has continued.

Over the near-term, growth is expected to remain resilient, underpinned by strong domestic demand. Inflation is likely to accelerate with rising aggregate demand resulting in part from election related increase in private spending, an expansionary fiscal policy and depreciating exchange rate. The current account deficit and the fiscal deficits are projected to widen, but the risks of both external and public debt distress are low. Downside risks include fiscal slippages aggravated by drying up of assistance for supporting the Rohingyas, delays in banking reforms, loss of monetary policy predictability due to diminished central bank independence and weakening reform momentum in the run-up to the elections. Moving forward, creating more and better jobs by boosting private investments, diversifying exports and building human capital remain the top most policy priorities. In addition to handling macroeconomic imbalances through increased flexibility in the exchange rate and interest rates, this would require ensuring a predictable and efficient system of business regulation, faster progress on the implementation of the mega infrastructure projects, improving financial sector governance, and ensuring an adequate and reliable supply of electricity.

Executive Summary

GDP growth in FY18 remained strong, underpinned by private consumption, public investment, and a recovery in ready-made garment (RMG) exports. Remittances posted 17 percent increase to reach $14.9 billion after declining for two consecutive years. Capital machinery imports have been buoyant. Growth in Agriculture was limited in the beginning of the year due to above-normal flooding, but harvests recovered subsequently. Real private investment flows increased by 8.8 percent over its level the previous year, notwithstanding cumbersome business regulations, substantial infrastructure deficits and mounting policy uncertainties. Bangladesh's competitiveness ranking improved marginally, but the Logistics Performance Index rankings slipped 13 places in 2018 relative to 2016.

Supply shocks accelerated food price inflation from 6 percent in FY17 to 7.1 percent in FY18, pushing headline inflation to 5.8 percent in FY18, from 5.4 percent in FY17. Monetary growth has been below nominal GDP growth, contributing to decline in non-food inflation. However, non-food inflation accelerated from its recent low of 3.5 percent in December to 4.7 percent (y-o-y) in August due to spillovers from higher commodity prices, strong domestic demand and exchange rate depreciation. Food inflation on the other hand slowed to 6 percent in August because of good rice harvests and buildup of stocks.

Interest rates came under pressure as excess liquidity shrank due to credit growth exceeding deposit growth, tightening of the Advance-Deposit Ratio by Bangladesh Bank (BB) and high non-performing loans in the banking system. In March, ceding to pressures from the Bankers Association of Bangladesh, BB reduced the Cash Reserve Ratio from 6.5 percent to 5.5 percent; lowered the repo rate from 6.75 percent to 6 percent, and increased the cap on government holding of deposits in private domestic banks from 25 percent to 50 percent. With the administered rates on the National Savings Certificates (NSCs) unchanged at double digit levels, both deposit and lending rates remained downwardly rigid. Subsequently, the government directed commercial banks to cap the deposit rates at 6 percent and the lending rates at 9 percent. The banks are yet to comply. These developments are an indication that BB autonomy is substantially eroded.

The current account swung into the largest deficit in recent memory, driven by a surge in consumer and capital machinery imports. Despite a recovery in exports, the current account deficit jumped from 0.6 percent of GDP in FY17 to 3.7 percent in FY18, driven by 25.2 percent growth in merchandize imports. BB managed the resulting pressure on the exchange rate through a combination of direct sales of foreign exchange and advising foreign exchange dealers to keep their buying and selling rates stable. The nominal taka-US dollar rate depreciated by 1.8 percent in July-August 2018 following 4 percent depreciation in FY18.

Fiscal underperformance has continued. The fiscal outcomes in FY18 differed markedly from what was envisaged in the original budget. Underperformance in development spending relative to the original budget partially offset a revenue shortfall, thus containing the deficit at around 4.5 percent of GDP. Public debt increased modestly to 32.1 percent of GDP and continues at low risk of debt distress. Excessive reliance on more expensive nonbank sources of domestic financing has continued. Consequently, interest expenditures remained high.

Output growth in FY19 is projected at 7 percent, driven by industry and services on the supply side and private consumption and investment on the demand side. The pace of public investment will remain strong as the implementation of mega projects gain further momentum. Private investment growth will remain subdued due to structural constraints. Continued strength in imports is projected to keep net exports negative despite healthy export growth. Increased investment in manufacturing will re-energize job creation and contribute further to poverty reduction.

Inflation is projected to accelerate as global commodity prices pick up and an expansionary fiscal policy coupled with election-induced rise in private expenditures overheat the economy. Adherence to a tight monetary policy, announced in July, will help contain excess demand. The current account deficit is projected to narrow moderately due to sustained strong imports, owing partly to large import payments associated with foreign debt financed mega projects. Payment obligations will largely be funded by foreign debt accumulation. A large shortfall in government revenue is expected due to reduced taxes on garments and banks and the absence of revenue enhancing administrative measures. Also, additional pressures on expenditures are likely due to expanded export subsidies after the budget was announced, as well as inadequate provisions for bank recapitalizations and spending associated with the Rohingya crisis. Together, these may widen the budget deficit.

With elections approaching, a major domestic risk is the weakening of ongoing efforts to strengthen economic governance. Donor fatigue in providing resources to meet the needs of the Rohingya could increase pressure on the budget, while the quasi-fiscal deficit could rise with increasing international oil prices. Unfavorable weather could further slow poverty reduction among households in agriculture. Rising food inflation may dampen gains made through increased investment in industry, while exacerbating the situation for food-deficit households in agriculture. However, export demand and remittances could surprise on the upside.

External imbalances and tight liquidity need to be handled prudently. Exchange rate flexibility can help BB manage pressures and maintain sufficient foreign exchange reserves. Timely resolution of external imbalances will also contribute to expanding liquidity in the banking system. However, efforts to reduce interest rates without reducing the NSC rates may be futile. Allowing the BB to function independently, avoiding regulatory forbearance, and strengthening banking supervision are high priorities.

Downside risks can be managed by accelerating reforms. The potential for export-led manufacturing growth remains significant as Bangladesh's productivity levels lag the global technological frontier. Slowdown in global trade due to the ongoing tariff escalation between US and China could have adverse effects on Bangladesh's export prospects. Apart from structural reforms to foster diversification of the economy and boosting investments, this requires putting ever-increasing emphasis on education, skills, nutrition and adaptability to rapidly changing technology and global demand. One area where structural reforms could build on success achieved in recent years is in the generation, transmission and distribution of electricity.

Meeting rapidly increasing electricity demand could yield high growth dividends. Implementing comprehensive energy sector reform that targets inefficiencies at different stages of power supply and distribution could boost supply while also limiting reliance on imported fossil fuel. This would not only minimize the direct cost of electricity generation, but also help avoid harmful emissions from fossil fuel-based generation. While the direct cost of coal may appear cheap, coal-fired power generation comes with staggering hidden environmental and health costs borne by the wider society**.** In addition to contributing to global climate change, burning coal releases numerous toxic pollutants.

The following actions are recommended as part of a comprehensive approach to improve electricity supply in Bangladesh:

Better pricing of domestic gas. Rationalizing the gas price would provide better incentive for upstream gas exploration and production and avoid wasteful consumption downstream. Correcting gas prices would save Bangladesh an estimated $4.5 billion (2 percent of GDP) a year, which could also be spent promoting more sustainable long-term growth of the economy.

*More efficient allocation of gas***.** Allocating gas based on transparent market rules rather than ad hoc administrative orders would promote more productive use of gas. In the power sector, prioritizing gas allocation for more efficient plants could increase gas-based electricity generation, reduce unserved energy demand, and minimize the need for more expensive diesel and furnace oil-based plants.

*Incentive-based regulation of power plants***.** Tariffs paid to plants could be linked with their performance, as measured by fuel efficiency or operating costs. Plants would be penalized for falling below some reasonable performance levels and rewarded for exceeding them. Without fundamental changes in incentive structures, corporatizing utilities alone may not guarantee improved operating efficiency.

*Merit-order based power dispatch***.** Dispatching generation in merit order could save the economy an estimated $1.65 billion a year in fuel costs. Merit-based power dispatch could also serve as a powerful tool for monitoring plants' performance and encourage competition among plants.

*Better pricing of electricity***.** A cost-based pricing mechanism is essential for encouraging more efficient consumption, attracting private investment, and strengthening the financial position of distribution utilities so they have the resources needed to invest in and maintain the grid. International experience shows that replacing ad hoc notification of tariff changes with automatic pass-through of fuel costs to electricity prices helps depoliticize the process of tariff rationalization.

Accompany reforms with compensation. Although price reform delivers large economic benefits in the long term, hikes in gas and electricity prices can cause immediate economic distress, especially for the poor and vulnerable. Raising prices gradually while providing targeted social assistance can mitigate the impact. It is therefore important to assess potential poverty and social impacts before tariff reform and provide targeted social assistance to the vulnerable by scaling up existing social programs or implementing new ones. Offsetting price increases requires rapid improvements in efficiency on both the supply and demand side.

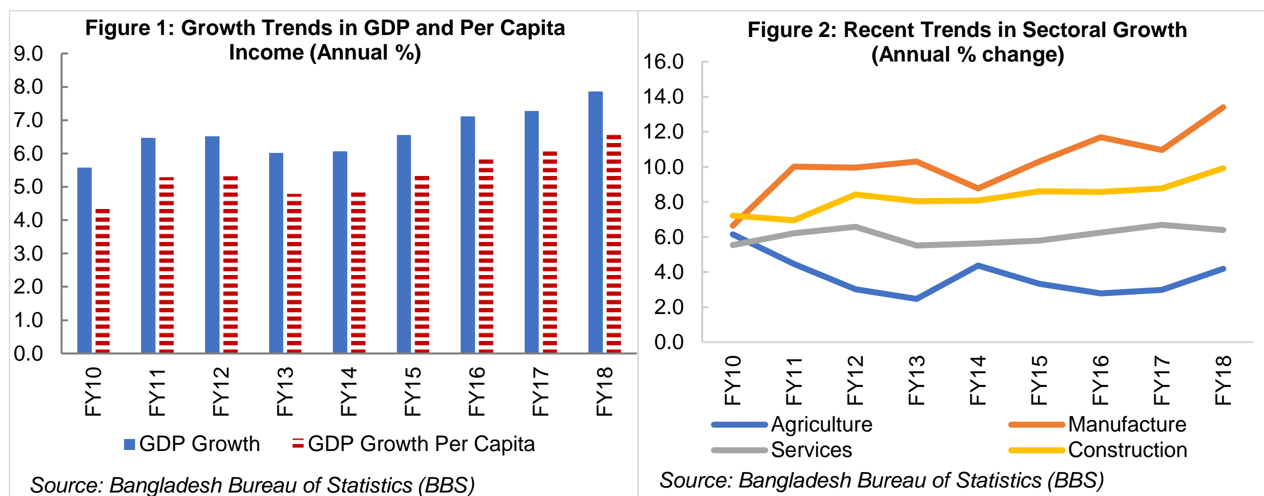
Recent Economic Developments

Bangladesh is moving ahead on the development path at a rapid pace. GDP growth in recent years has benefitted from robust domestic demand, underpinned by strong private consumption growth and a mild recovery in private investment and exports. Ready-made garment exports have grown following a flat year. Remittances have turned around significantly after declining for two years in a row. Agriculture suffered from normal flooding in early FY18, but output recovered subsequently. Momentum in industrial and services growth have been sustained. Supply shock accelerated food price inflation in FY18 while non-food inflation eased. The exchange rate and reserves are under pressure due to a large spike in the current account deficit. The fiscal deficit has increased as well, but the risk of debt distress continues to be low.

Resilient economy

Bangladesh has achieved outstanding success in both poverty eradication and human development. Defying many odds, Bangladesh has continued to make progress in improving the lives and livelihood of its people. The recently published Human Development Report 2018 put Bangladesh in the medium human development category—positioning it at 136 out of 189 countries and territories with a HDI value for 2017 of 0.608. Between 1990 and 2017, Bangladesh's HDI value increased 57.1 percent. During the same period, Bangladesh's life expectancy at birth increased by 14.4 years, mean years of schooling increased by 3 years and expected years of schooling increased by 5.8 years. Bangladesh's GNI per capita increased by about 178.6 percent between 1990 and 2017.

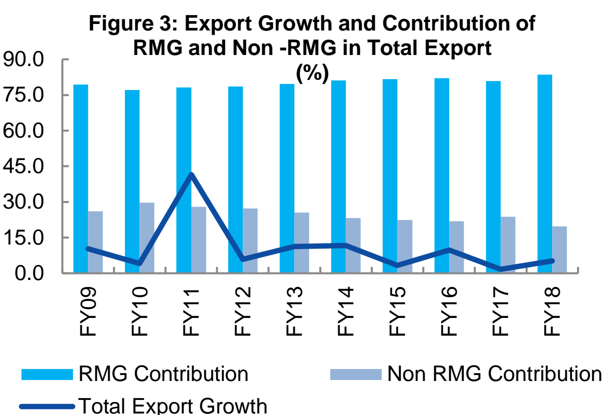
Economic growth remains strong. The economy is estimated to have grown by 7.86 percent in FY18 by the Bangladesh Bureau of Statistics (BBS), the highest rate in Bangladesh's history and the third consecutive year of at least 7 percent plus growth (Figure 1). Growth is reported to have been led by manufacturing and construction, benefiting from robust domestic demand (Figure 2). The contribution of industry was 3.75 percentage points, of which manufacturing contributed 2.8 percentage points to total growth (Annex Table 1) in FY18. Garment exports, which accounted for 83.4 percent of exports, grew by 8.8 percent (in nominal dollar terms) in FY18, a notable recovery from the 0.2 percent growth posted in FY17. Construction, fueled by



strong manufacturing growth as well as large amounts of remittance inflows, grew by an estimated 9.9 percent, maintaining its 8-plus percent growth record for nearly a decade. Remittances through formal channels reached $14.9 billion in FY18, which is equivalent to about 5.4 percent of GDP and 40.5 percent of merchandize exports.

Export diversification remains elusive. Export earnings regained resilience, although the 5.3 percent growth remained below the FY18 target of 8.2 percent. Still, the growth performance of the ready-made garment (RMG) exceeded the annual target of 7.1 percent set for the sector. The 9.5 percent decline in export of non-RMG products dragged down the total exports (Figure 3). Exports remain highly concentrated even within garments. A few items, most notably shirts, trousers, jackets, t-shirts, and sweaters account for more than 80 percent of RMG exports. As Table-1 shows, at the HS-8-digit level, the top 4 knitwear products together accounted for 68.9 percent of total exports and the top 4 woven products accounted for 70 percent of total woven exports in FY18.[1] The comparable figures for China, India, Malaysia and Vietnam range from 20 to 50 percent. There thus exists massive opportunities for generating exports in new products (and thus diversification) within the RMG sector, given the expected growth of global apparel demand in the future. Diversification within RMG has the potential to drive rapid export expansion. Available projections suggest that the annual global apparel consumption could exceed $2.5 trillion by 2025 (from currently USD 1.8 trillion), boosting exports of clothing from various suppliers.

Figure 3: Export Growth and Contribution of RMG and Non -RMG in Total Export (%)



Source: Export Promotion Bureau (EPB)

Table 1: Top Five Garments Items

	FY18	
	US$ million	% of total
Knitwear		
Men's		
Over/Car Coats (Cotton, Knitted or Crocheted)	5866.9	38.6
Over/Car Coats (Man-Made Fibers, Knitted or Crocheted)	1926.7	12.7
Over/Car Coats (Other Textiles, Knitted or Crocheted)	1070.1	7.0
Woman's		
Over/Car Coats (Wool, Knitted or Crocheted)	819.9	5.4
Over/Car Coats (Cotton, Knitted or Crocheted)	788.3	5.2
Total	**10471.9**	**68.9**
Woven		
Men's		
Overcoats, Capes, Cloaks (Wool or Fine Animal Hair)	5209.0	33.8
Overcoats, Capes Cloaks (Cotton)	2877.5	18.7
Overcoats, Capes, Cloaks (Man-Made Fibers)	1668.0	10.8
Overcoats, Capes, Cloaks (Other Textiles)	645.9	4.2
Anoraks, Wind Jackets/Cheaters (Wool/Fine Anima Hair)	403.0	2.6
Total	**10803.4**	**70.0**

Source: Export Promotion Bureau
Note: All products are based on 8 digit Harmonized System (HS) code

[1] Note that there are 105 8-digit HS codes in knitwear and 111 in woven products.

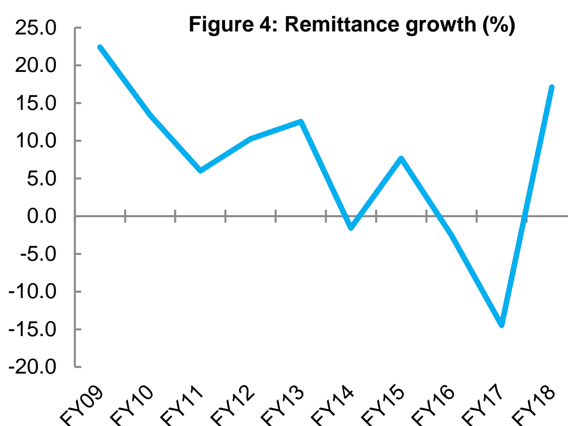
Growth of exports to the traditional markets have out-performed that in the non-traditional markets in FY18 as well. Exports to the EU grew by 10.3 percent. The phase-out of the initial shock emanating from Brexit and improvements in the global economic outlook contributed. Bangladesh is on course to graduate from the LDC status in 2024. It will enjoy the Everything But Arms (EBA) benefits in EU markets till 2027 after which benefits accruing from the Duty Free-Quota Free market access and the relaxed rules of origin (RoO) in place for LDCs are most likely be phased out. Accessing GSP plus will require compliance with the 27 UN/ILO Conventions. Also, Brexit will call for renegotiation of trading relations with the UK. Growth in exports to the US was only 2.3 percent. This is attributable to loss of price competitiveness and lack of product diversification. Other prime competitors of Bangladesh experienced significant growth in the US market.[2] Apparel imports in the US market have been experiencing a decelerating growth trend in recent years. Average duties on import of apparels and clothing accessories in the US were highest in 2017, when they reached 14.2 percent. Bangladesh exports faced the highest tariff of 15.2 percent in the US market amongst 232 exporting countries, territories or jurisdictions, while the global average tariff of all imports to the US was only 1.4 percent.[3] In a buyer-driven market, Bangladesh's exporters are subject to continuing pressure from major buying companies and retail chains.

Product and market diversification are critical for building resilience. External shocks in the form of reduced demand, higher price of cotton imports, or higher tariff in Europe, can have a major impact on the garments industry. Many of the Bangladesh's current strengths are thinly based. Cheap labor cost and lax enforcement of fire, safety, and regulations allowed outbidding competitors such as Vietnam, Sri Lanka, Pakistan, and India. However, as evident from recent history, headwinds can emerge unexpectedly and in no time. Bangladesh may soon find itself losing market share as trade alliances and tariff preferences shift. The cost of labor is increasing and will increase further as the living wage movement gains ground. Improved compliance with fire and safety codes has also raised the cost of production. Initiatives towards export and market diversification have failed to yield visible results. Exports of a promising non-RMG item (leather and leather products) is facing a major setback due to relocation to Savar Tannery Estate. This prolonged process caused disruption in production. To stimulate exports of high value-added items, the government banned export of crust leather. As experienced earlier in the case of ban on export of raw jute, these policies have not worked to stimulate growth of value added products in leather. Both these sectors are facing significant deficits in skills and technology. Going forward, sector-specific targeted programs and more emphasis on research and development (R&D) will be needed.

[2] Vietnam registered over 7 percent growth in the US apparel market, followed by Mexico at 5.33 percent, India at 1.19 percent and Pakistan at 1 percent in 2017. Vietnam is taking advantage of China's displacement much better than her close competitors such as Bangladesh. China, the largest exporter of apparel products, also had a decline in export earnings as well as market share in the US. In general, however, RMG imports by the US has been on the decline in recent years.

[3] Centre for Policy Dialogue, Integrated Review of Bangladesh Economy, June 2018.

Officially recorded remittance flow recovered impressively, growing 17.1 percent in FY18, following successive declines in two previous years (Figure 4). The recovery has been spread over several countries, including GCC, US, UK and others (Table 2). The rise in crude oil price, increase in the number of Bangladeshis working abroad, change in policies in Saudi Arabia (a rise in the minimum wage and a change in the *akama* system), depreciation of the taka, and effective action against illegal money transfers are likely to have contributed to the recovery.[4] Note however that the level of remittance was still 2.4 percent lower than the $15.3 billion level achieved in FY15, the highest ever in Bangladesh. The composition of remittance inflows is broadly unchanged with about 56 percent of remittance earnings coming from the Gulf countries, reflecting the concentration of migrants in the Middle East.[5] The number of migrants from Bangladesh has risen significantly in recent years. Between 2013 and 2017, about 2.32 million people joined the migrant labor force. The growth was significant because of Saudi Arabia opening its market in 2015 for Bangladeshi migrants. Average monthly out-migration increased from about 35,520 in 2014 to 84,000 in 2017. The Saudi government recently stopped recruitment of foreign workers in 12 jobs categories and majority of Bangladeshi low skilled migrant workers fall into these categories. As a result, growth of out-migration to Saudi Arabia slowed considerably to just 1.2 percent in FY18. This notwithstanding, about 0.9 million additional Bangladeshi workers joined the migrant labor force in FY18.



Source: Bangladesh Bank

Table 2: Accounting for Remittance (in million US$)

	Change in FY17	% of total Change	Change in FY18	% of total Change
GCC	**-1237.6**	**57.2**	**1238.2**	**56.6**
o/w KSA	-692.9	32.1	324.3	14.8
Qatar	144.5	-6.7	266.6	12.2
Others	**-924.2**	**42.8**	**949.1**	**43.4**
o/w UK	-54.0	2.5	297.0	13.6
USA	-725.0	33.5	307.5	14.1
Gross Decline	**-2479.9**		**0.0**	
Gross Increase	**318.2**		**2187.3**	
Net decline/increase	**-2161.7**		**2187.3**	

Source: WB staff estimation based on Bangladesh Bank data

[4] Globally, after two consecutive years of decline, remittance flows to low- and middle-income countries (LMICs) in 2017 has rebounded, increasing by 8.5 percent to reach USD 466 billion (World Bank, 2018).

[5] In keeping with the trends over the last two fiscal years, during the first seven months (July-January) of FY18, out-migration to GCC countries grew by 26.8 percent, accounting for 49 percent of total outflow in FY18 through January.

Real investments increased by 10.5 percent over its level in FY17. While the private investment to GDP ratio increased marginally from 23.1 to 23.3 percent, public investment increased from 7.4 percent of GDP in FY17 to nearly 8 percent in FY18. Public investments expanded by about 16 percent, accounting for 33.8 percent of total investment. Private real investment growth increased from 8.1 percent in FY17 to 8.8 percent in FY18. Construction continued to dominate, constituting over two-third of total gross capital formation followed by investment in plant and machinery which account for about one-fifth. Based on data on capital machinery imports, the bulk of investments outside construction appears to be in textiles, garments, motor vehicles, and infrastructure. Foreign Direct Investment (FDI), however, declined from $1.65 billion in FY17 to $1.58 billion in FY18. Note also that the share of FDI in form of equity capital is only around one-fourth of total inflows. Bangladesh improved it's score on all three components—institutions, infrastructure and macroeconomic environment--of the Global Competitiveness Index in 2017, leading to an improvement in the overall ranking from 106 in 2016 to 99 in 2017. Notwithstanding the improvement, Bangladesh's ranking in 2017 remained below all countries in East Asia, except Cambodia, and all countries in South Asia, except Pakistan.[6] Also, Bangladesh slipped one place—from 176 to 177—on the Ease of Doing Business Ranking 2018 and was well behind all countries in East and South Asia.[7] Bangladesh's ranking on the Logistics Performance Index slipped 13 places in 2018 relative to 2016.[8]

Stable headline inflation

Headline inflation accelerated in FY18 due to supply shock induced increase in food price inflation while non-food inflation slowed. The relaxation of barriers to importing rice combined with good boro harvests led to a deceleration of food inflation, but non-food inflation has begun to rise in recent months because of domestic demand growth fueled by a rise in remittances and private credit as well as exchange rate depreciation.

Supply shocks accelerated food price inflation. Headline inflation picked up to 5.8 percent in FY18, compared with 5.4 percent in FY17 (which was the lowest inflation rate in last five years). Production shortfall due to floods led to sharp increases in food inflation to 7.1 percent in FY18, compared with 6 percent in FY17. The acceleration in headline inflation was contained by decline in non-food inflation from 4.6 percent in FY17 to 3.7 percent in FY18 (Figure 5). Supply shocks and delayed policy response explain the surge in food prices. FY18 started with low stocks of food in both public and private sector as production of rice and wheat declined by 2.6 percent in FY17 after stagnating at the same level in the preceding two years. Production of rice declined by 9.4 lac MT and wheat production by 0.4 lac MT. In addition to production losses, weak management of public food stock exacerbated the food deficit in FY17. Public food stock replenishment through import and domestic procurement of rice was inadequate to stabilize the market price. The decision on duty reduction on rice import came with a lag and unsuccessful attempts to import rice through public channels

[6] World Economic Forum, Global Competitiveness Index 2017.

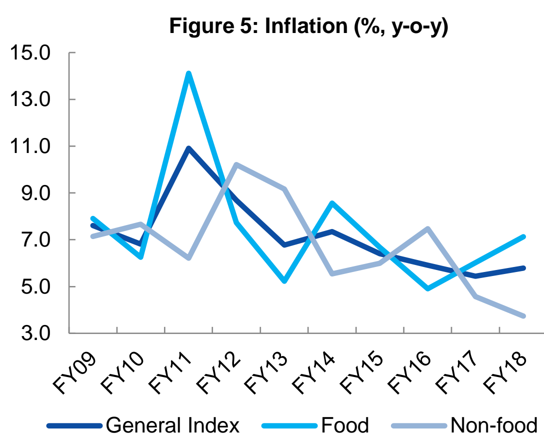
[7] The World Bank, Ease of Doing Business Indicators 2018.

[8] The World Bank, Connecting to Compete 2018.

eventually transmitted confusing signals to the market. Consequently, the price of rice and hence, food inflation, rose sharply.

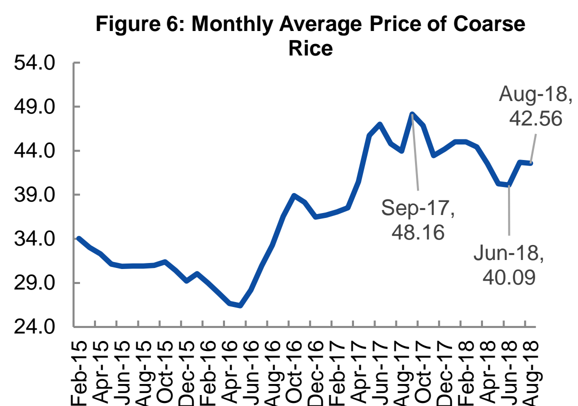
The inflation trends have reversed more recently. After peaking at 7.9 percent in September 2017, food inflation slowed steadily to 6 percent in August 2018 while non-food inflation picked up to 4.7 percent after bottoming out at 3.1 percent in January-February. Headline inflation has continued to ease to 5.5 percent, driven entirely by slower food inflation. It appears that lower rice prices (Figure 6) resulting from good boro harvests and the surge in rice and wheat imports played a major role in reducing food price inflation. Sustained high domestic demand, resulting from increased remittances and private credit growth, as well as exchange rate depreciation and seasonal factors such as Eid in June and August helped non-food inflation.

Figure 5: Inflation (%, y-o-y)



Source: Bangladesh Bureau of Statistics

Figure 6: Monthly Average Price of Coarse Rice



Source: Trading Corporations of Bangladesh

Monetary outcomes were below target. Broad money growth remained subdued at 9.2 percent in FY18 despite 17 percent growth in credit to the private sector. Monetary growth was well below the 13.9 percent growth in nominal GDP. Reserve money growth slowed sharply from 16.3 percent in FY17 to 4 percent in FY18 reflecting, on the asset side, largely a weaker balance of payments that led to an easing in the growth of net foreign assets (from 15.1 percent in FY17 to 0.48 percent in FY18) of BB. On the liability side of reserve money, there was a sharp deceleration in the growth of the stock of currency outside banks from 14.3 percent in FY17 to 2.4 percent in FY18 while growth of deposits held with BB slowed from 20.5 percent to 7.4 percent respectively. The 14.7 percent total domestic credit growth was short of BB's 15.8 percent target for the year because of 2.5 percent decline in credit to the central government. Private sector credit grew nearly 17 percent, exceeding the BB target marginally (Table 3). BB has taken a passive approach to domestic liquidity management. It has been reinjecting only part of the liquidity losses from the market due to its foreign exchange market intervention on the supply side.

After tightening monetary conditions early in 2018, subsequent easing of key elements of the macroprudential framework raises concerns about the autonomous conduct of monetary policy. In January, Bangladesh Bank (BB) announced a tightening of monetary policy by lowering the Advance-Deposit Ratio (ADR) from 85 percent to 83.5 percent. This combined with a much slower growth in deposit (10.3 percent) relative to growth in domestic

Table 3: Monetary Program Performance									
(Annual percentage change)									
	FY 15		FY 16		FY 17		FY 18		FY19
	Target	Actual	Target	Actual	Target	Actual	Target	Actual	Target
Net Foreign Assets	3.6	18.2	11.1	23.2	10.1	14.4	0.1	-0.8	-1.6
Net Domestic Assets	20.2	10.7	16.2	14.2	17.3	9.7	17.9	12.8	16.2
Domestic credit	17.4	10.0	15.5	14.2	16.4	11.2	15.8	14.7	15.9
Public Sector credit	25.3	-2.6	18.7	2.6	16.1	-12.0	8.3	-0.5	8.5
Private Sector credit	15.5	13.2	14.8	16.8	16.5	15.7	16.8	16.9	16.8
Broad Money	16.5	12.4	15.0	16.3	15.5	10.9	13.3	9.2	12.0
Reserve Money	15.9	14.3	14.3	30.1	14.0	16.3	12.0	4.0	7.0
Inflation (end of period average)	6.5	6.4	6.1	5.9	5.3-5.6	5.4	5.5	5.8	5.6
Growth	6.5-6.8	6.6	6.8-6.9	7.1	7.2	7.2	7.4	7.9	7.8

Source: Bangladesh Bank and Bangladesh Bureau of Statistics

credit as well as elevated non-performing loans led to a liquidity crunch in parts of the banking system, thus putting upward pressure on deposit and lending rates. Ceding to pressures from the Bankers Association of Bangladesh (BAB) through the Ministry of Finance, BB eased monetary policy in March by reducing the Cash Reserve Ratio from 6.5 percent to 5.5 percent and the repo rate from 6.75 percent to 6 percent. It also increased the cap on government ministries and agencies holding of deposits in private domestic banks from 25 percent to 50 percent. With the administered rates on the National Savings Certificates unchanged at double digit levels, financial sector distortions remain, and deposit and lending rates continue at high levels. The government instructed the commercial banks (through BAB) to cap average deposit rates at 6 percent and lending rates at 9 percent, but banks are yet to comply. There are growing concerns about regulatory capture in the face of strong lobbyists influencing monetary policy through the Ministry of Finance (MoF).

Struggling financial sector

The performance of the banking sector and solvency of some financial intermediaries has remained a concern because of limited action to address defaults, improve risk management and strengthen corporate governance. Persistent weaknesses owe largely to the legacy of loans to larger borrowers, who lack incentives to repay, given legal limitations on recoveries.

The performance of the banking sector remained off-track in FY18. Many key targets were missed, while high-profile irregularities remain unresolved. High levels of non-performing loans (NPLs) have persisted in recent years.[9] State-owned Commercial Banks SCB) account for most NPLs in the banking sector. The volume of NPL increased to Tk. 893.4 billion at end-June 2018, constituting 10.4 percent of total loans, from Tk. 743 billion at end-December 2017, or 9.3 percent of total loans. The six SCBs accounted for 48 percent of total NPLs while the 40

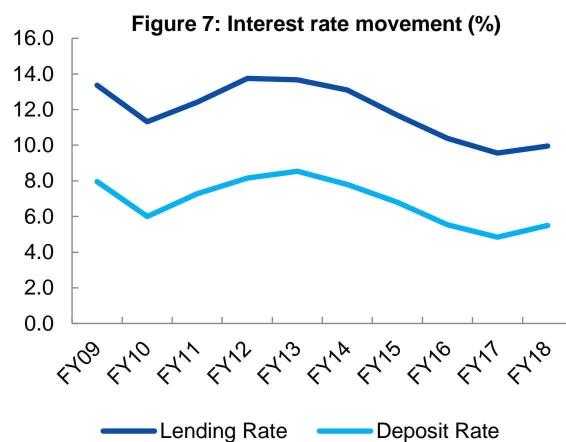
[9] High NPLs appear to be a South Asian phenomenon. A cross-country comparison of NPLs shows that five South Asian countries, Bangladesh, Bhutan, India, Maldives, and Pakistan, had NPLs exceeding 8 percent of total loans in 2017. On the other hand, eight South-East Asian countries, Brunei, Cambodia, Indonesia, Malaysia, Philippines, Singapore, Thailand, and Vietnam, all had NPLs below 4 percent of total loans in 2017. CPD June 2018.

Private Commercial Banks (PCBs) accounted for 43.6 percent of total NPLs.[10] If rescheduled and restructured advances were considered, then the gross stressed advance would have been even higher for each category of banks.[11] Commercial loans and the RMG sector had the highest share of NPLs (23.9 percent and 14.5 percent respectively) against their 23.1 percent and 11.7 percent of total outstanding loans in the banking industry in 2017.[12] More than four-fifths of gross NPLs (87 percent) were bad loans. Sub-standard and doubtful categories constituted 7.5 percent and 5.5 percent respectively. Financial fraud, lack of proper due diligence in loan sanctions, political influence on loan disbursement, lax efforts to recover loans, and the failure to undertake effective measures against loan defaulters have sustained high NPLs in the banks. The legal framework for dealing with non-performing loans, consisting of the Money Loan Court Act 2003 and Bankruptcy Act 1997, needs to be strengthened. The number of judges handling NPLs is inadequate, and the backlog of cases, already heavy, is accumulating.

Supervision and remediation of problem banks needs to be strengthened. The government has injected large amounts of capital into the troubled state-owned banks and indirectly to private banks, but in the absence of firm remedial action, performance has not improved. The role and mandate of state-owned banks need to be eventually addressed as well, not just their financial performance.

Excess liquidity shrank. Elevated NPLs, high dependency on National Savings Certificates and BB intervention in foreign exchange market contributed to recent drying of excess liquidity in the banking system. Total liquid assets of banks decreased by nearly 7 percent through May 2018 relative to end-June 2017. The reduction in the cash reserve ratio (CRR) has not been reflected in lower interest rates; both lending and deposit rates in fact increased since the decrease in CRR (Figure 7). However, the call money rate has decreased from 4.3 percent in April to 1.67 percent in August 2018 before rising back to over 4 percent in September. While the BB directed banks to reduce the interest rate spread from 5 percent to 4 percent, the weighted average interest rate spread of scheduled banks stood at 4.45 percent in June 2018. Indeed, due to the high cost of funds, inefficiencies in the financial system and the perceived high risks of lending

Figure 7: Interest rate movement (%)



Source: Bangladesh Bank

[10]An emerging concern is the presence of significant insider lending in private banks. According to BB data, bank directors borrowed Tk. 1076.95 billion from each other's privately-owned banks as of March 2018. This constituted 13.3 percent of total outstanding loans in the banking sector. Per banking regulations, a bank can provide up to 25 percent of its capital to a single borrower, including a bank's director. Bangladesh appears to be an exception in allowing shareholders to be bank directors when compared with the best practices in the rest of the world, including India. India's Banking Regulation Act 1949 does not allow industrialists or business persons to become a director of any bank.

[11]A total of Tk. 48.2 billion adversely classified loans were written-off from the banks' balance sheet till December 2017, which was Tk. 44.7 billion at the end of CY16. However, out of the total written off loans, banks were able to recover Tk. 10.5 billion in 2017.

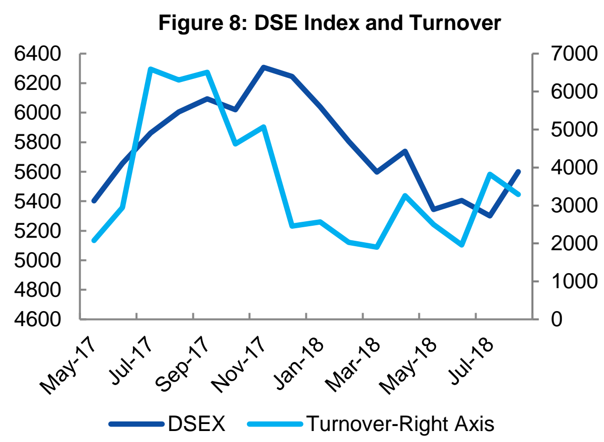
[12] Bangladesh Bank, Financial Stability Report 2017.

in Bangladesh, commercial banks tend to keep lending rates elevated. The response to the directed 9 percent cap on lending rates has largely taken the form of reduced lending as evidenced by the Tk. 60.6 billion decline in the stock of private sector credit in July relative to June 2018.

New banks continue to gain regulatory approval. A new bank was granted license recently and approval of two more is under consideration. According to the Bank Company (Amendment) Act 2013, the BB grants licenses to new commercial banks after evaluating the need for more banks and the overall state of the economy. This principle is not being followed in approving new licenses and the number of banks is already high. As of May 2018, Bangladesh had 57 commercial banks comprised of 6 SCBs, 2 DFIs, 40 Private Commercial Banks (PCB), and 9 Foreign Commercial Banks (FCB). Cross-country comparison indicates that the total number of banks in Bangladesh is high by global standards.[13] Bangladesh also has a high geographic density of commercial bank branches. Globally, Bangladesh has the 8th highest geographic concentration of commercial bank branches, excluding the microstates having a land area of less than 1000 square kilometer. This puts Bangladesh in the same class of countries that include financial hubs such as Japan and tax havens like Luxembourg.

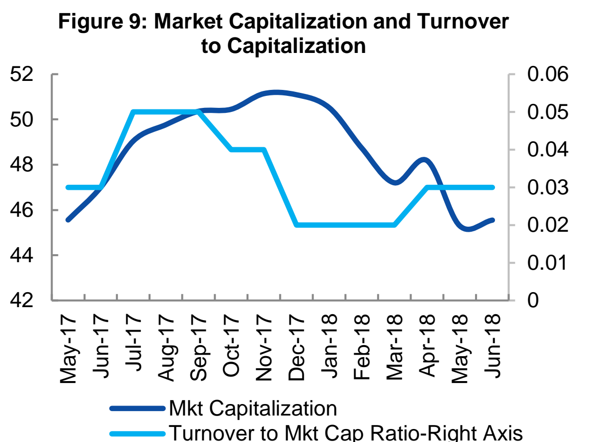
Capital markets remained volatile. After rising strongly in 2017, equities have been on downward trend since January 2018, with significant volatility (Figure 8). The DSEX, the benchmark index of the main bourse Dhaka Stock Exchange, increased from 5323 in February to 6337 in November 2017, rising 1,014 points (19 percent). The DSEX subsequently retreated from this high, dipping as low as 5263 on July 30, 2018, a decline of about 17 percent in the first seven months of 2018, before recovering to 5619 at the end of August.

Figure 8: DSE Index and Turnover



Source: Dhaka Stock Exchange

Figure 9: Market Capitalization and Turnover to Capitalization



Source: Dhaka Stock Exchange

These trends are strongly influenced by the policy environment and the institutional investors. The BB's contractionary monetary policy stance in early 2018 to curb both inflation and private sector credit growth had negative impacts on banking sector liquidity, which, in the absence of big ticket institutional investments from foreign or domestic sources, had a major impact on trading volumes. With conditions easing in July, turnover jumped, and the general price level of stocks has risen (Figure 9). Institutional investors appear to have played

[13] See CPD, State of the Bangladesh economy in 2017-18, June 2018.

a significant role in recent market volatility. Investors such as PCBs, Investment Corporation of Bangladesh (ICB), mutual funds and brokerage houses have been important market players in the stock market, taking investment-related decisions based on the prospects of the companies listed in the market. High excess liquidity in the banking system in 2017, induced banks to make large investments in the stock market, contributing to the bullish trend during the year. The government advice for mandatory 10-year extension of maturity of about 30 closed end mutual funds has raised new concerns. The directive involves around $1 billion in Assets Under Management that were to be made open-end funds or wound up by 2023 and enable investors to get their investments back. A section of fund managers successfully lobbied to get the maturity period of the mutual funds extended across the board for another 10 years to maintain their access to funds. Extending the mutual funds' term without the consent of the investors sends a negative signal, damages confidence, and impedes the development of the institutional investor base, a much-desired objective.

The impediments to making capital markets play a significant role in the provision of long-term finance need to be addressed. A well-functioning government debt market is the foundation for capital market development, as it sets the risk-free rate and benchmark for pricing other instruments. While the basic architecture is working well, the market making function is currently not being fulfilled as the government is not issuing sufficient market-based instruments, such as treasury bonds, leading to the absence of a benchmark government bond yield curve that would trigger the development of other key markets. The corporate debt market is limited, with currently only one issue listed on the Dhaka Stock Exchange. Issues by non-financial corporations have been few, with the stronger companies largely relying on retained earnings and/or bank financing. Key impediments relate to the trading structure, tax incentives, regulatory disincentives, limited confidence in related professional services (audit, credit rating), lack of diversity in debt products, and underdeveloped institutional investors. Signing agreements with the consortium of Shanghai Stock Exchange and Shenzen Stock Exchange is one good step forward in developing the capital markets. The consortium of strategic investors was selected through competitive bidding process, helping the main bourse of the country make tangible progress in demutualizing the exchange.

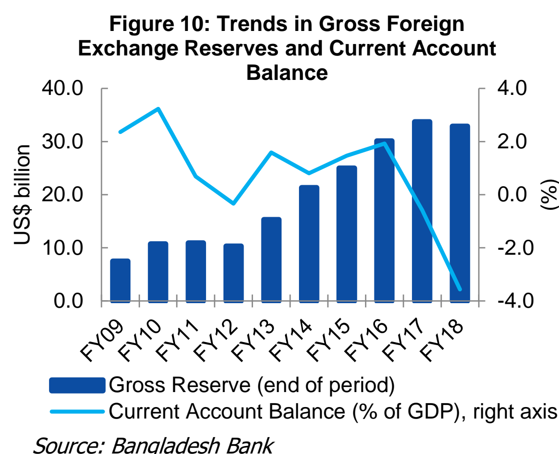
Sliding external balances

Exchange rate and the foreign exchange reserves came under pressure with the emergence of deficit in the overall balance of payments for the first time since FY11. This resulted from large increases in trade, services and income account deficits. A surge in financial account surplus coupled with shedding of reserves by BB moderated the extent of depreciation of the exchange rate.

External deficit widened significantly. The overall balance of payments, for the first time since FY11, turned into a $885 million deficit in FY18, compared with $3.25 billion surplus the previous year. This resulted from an increase in the current account deficit from $1.3 billion in FY17 to $9.8 billion in FY18 (Figure 10). All parts of the current account saw palpable increases: (i) the trade deficit doubled from $9.5 billion to $18.3 billion, driven primarily by 25.2 percent growth in merchandize imports; (i) the services account deficit increased from $3.3 billion to $4.8 billion, driven by 21 percent growth in payments for transportation and 78 percent growth in "other" payments; and (iii) income account deficit increased from $1.9 billion to $2.4 billion, driven by 28.3 percent growth in income payments. Rice import

surpassed 32-years old record, imports related to large scale infrastructure projects contributed significantly as did import of capital goods (Table 4). The surge in import of rice resulted from crop losses in two successive floods and the need to replenish stocks. Implementation of many important public-sector infrastructure projects boosted import of capital goods. In view of US-Iran tensions, OPEC policy, and demand-supply dynamics in the global market, petroleum prices have risen in recent times leading to increase in payments because of petroleum product imports.[14] Increase in payments for transport services is a consequence of increase in the volume of merchandize imports. Capital flights through over-invoicing of imports are typically high before the election and these may also have played a role in boosting the value of merchandize imports (Box 1). Similar anxieties and/or corporate income tax reductions in the United States are likely to have induced foreign investors to repatriate profits. Rebound in exports and remittances provided some respite and a record high foreign aid disbursement cushioned the pressure on the overall balance.

Figure 10: Trends in Gross Foreign Exchange Reserves and Current Account Balance



Source: Bangladesh Bank

Table 4: Selected Balance of Payments Indicators

(US$ million, unless otherwise indicated)

Items	FY14	FY15	FY16	FY17	FY18
Trade balance	**-6794**	**-6965**	**-6460**	**-9472**	**-18258**
Merchandise export f.o.b. (inc. EPZ)	29777	30697	33441	34019	36205
Growth (%)	**12.1**	**3.1**	**8.9**	**1.7**	**6.4**
Merchandise import f.o.b. (inc. EPZ)	-36571	-37662	-39901	-43491	-54463
Growth (%)	**8.9**	**3.0**	**5.9**	**9.0**	**25.2**
Services (net)	-4099	-3186	-2708	-3288	-4574
Income (net)	-2635	-2869	-1915	-1870	-2392
Workers' remittance	14116	15170	14717	12769	14982
Growth (%)	**-1.5**	**7.5**	**-3.0**	**-13.2**	**17.3**
Current Account Balance	**1402**	**2875**	**4262**	**-1331**	**-9780**
Capital account (net)	645	496	478	400	292
Financial account	**2686**	**1925**	**944**	**4247**	**9076**
o/w Foreign direct investment (net)	1432	1830	1285	1653	1583
MLT loans (excludes suppliers credit)	2277	2472	3033	3218	5785
Growth (%)	**9.2**	**8.6**	**22.7**	**6.1**	**79.8**
Other short-term loans (net)	-838	-105	-435	1030	1947
Trade Credit (net)	-340	-2508	-2101	-1185	-1270
Errors and omissions	750	-923	-634	-147	-473
Overall Balance	**5483.00**	**4373**	**5050**	**3169**	**-885**

Source: Bangladesh Bank

The current account deficit was supported by a large financial account surplus. A large part of the imports, particularly for infrastructure-related projects, was underwritten by foreign aid and suppliers' credits. Net medium and long-term (MLT) loans disbursement amounted

[14] With Bangladesh's leading export items experiencing a price fall in major destination countries and global prices of raw materials and other commodities on the rise, Bangladesh's terms of trade deteriorated further.

to $4.67 billion in FY18, compared with $2.29 billion the previous year. The commercial banks brought in $1.6 billion through $1.3 billion increase in foreign currency denominated liabilities and $260 million liquidation of foreign currency denominated assets. FDI plus portfolio investment amounted to nearly $1.9 billion which together with net $1.95 billion inflow of short term loans also contributed towards easing the pressure on the exchange rate and reserves.

Box 1: Capital flight or growth?

Capital flight from Bangladesh has been a concern for quite a while now. Earlier, in their 2017 report, the Washington-based institute Global Financial Integrity estimated USD 53-75 billion illicit financial outflows during 2005-2014, accounting for 12-17 percent of the country's total trade. According to the study, a significant amount of this money laundering has been conducted through international trade. Recent rise in imports have raised new questions on the transparency of trade related payments and whether illegal capital flights are taking place through misinvoicing.

Some increase in import is understandable due to the large mega projects that are being implemented. A rise in capital goods and machinery import is therefore expected. However, a 25.2 percent import increase in a financial year is rare. So, what has really caused this rise in imports? The table below shows the y-o-y percentage increase of different components of imports in FY17 and FY18 (Table 5).

A quick look reveals several components that experienced unusual growth. Most notable is the 140.48 percent increase in rice imports. However, much of this increase is due to flood-related production loss and the subsequent slashing of import duty on rice in September. Import of some raw materials (i.e. raw cotton, yarn, textiles and staple fiber) used as inputs to RMG products also experienced high growth in FY18. Though RMG export growth was decent in FY18, this increase is unusual considering the price of these materials in the world market. The section marked as 'others' increased 25.23 percent, which is again uncommon, and it is not clear which products within this category are responsible for this.

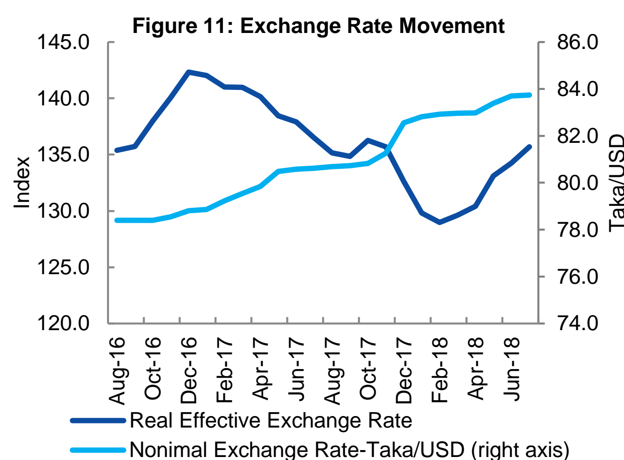
The possibility of illicit fund outflow through over invoicing in some of these imports cannot be ruled out, but it is difficult to make an accurate estimation of outflow. According to the guidelines, banks must ensure that importers don't have bills of entry pending for submission beyond the stipulated period of four months against any advance remittance for imports. There is evidence that some importers are not abiding by this rule. According to Bangladesh Bank estimates, about 7 percent of the LCs remains unsettled with no bill of entry submitted. Recently, Bangladesh Financial Intelligence Unit (BFIU) has reported capital flight amounting to Tk 40 billion in disguise of imports and exports and accused a group of business without naming. They passed their information to NBR and other law-enforcement agencies to conduct further investigation. The BB have also recently fined Janata Bank Tk. 1 million for having overdue bills of entry against import.

These actions indicate that it is possible to detect illegal capital flights through trade. The MoU signed between NBR and BFIU in February has potential of making some headway if implemented properly. There is the possibility that capital flight has already affected the liquidity situation, exchange rate and reserves in a significant way. Trade mispricing and capital flight are historically found to be more extensive during the election years. However, with political will and prudent financial sector management it is possible to reduce illegal capital flight.

Table 5: Merchandise Imports			
	Growth (%, YoY) FY 2016-17	Growth (%, YoY) FY 2017-18	Difference FY18-FY17 (in US$ million)
Food Grains (Rice and Wheat)	21.2	140.9	1812.4
Other Food Items	19.9	3.4	144.9
Consumer & Intermediate Goods	**4.5**	**18.0**	**3842.4**
o/w POL	27.3	26.0	754.7
Raw Cotton	12.7	27.9	706.5
Yarn	0.2	19.2	379.2
Textile & Articles Thereof	-2.9	13.6	821.5
Capital Goods & Others	**11.2**	**31.7**	**4671.7**
o/w Iron, Steel & Other Base Metals	16.5	28.1	1060.9
Capital Goods/Machinery	7.3	43.1	1645.6
Others	10.6	27.6	1965.2
Others n.i.e	**11.2**	**25.7**	**1388.7**
Grand Total	**9.0**	**25.2**	11860.1
O/W Imports by EPZ	-2.9	17.7	565.3
Grand Total	**9.0**	**25.2**	**11860.1**

Source: Bangladesh Bank

The nominal taka-US dollar rate depreciated in both nominal and real terms in FY18. The nominal taka-dollar rate in the interbank market depreciated by 3.9 percent while the Real Effective Exchange Rate (REER) depreciated by 2.7 percent in FY18 (Figure 11). BB intervened to smoothen exchange rate adjustment by selling over $2.3 billion in FY18. BB has also exerted pressure on the authorized foreign exchange dealers to keep buying and selling rates stable.[15] Such suppression of exchange rate correction unsettles the foreign exchange market inducing exporters to delay repatriation of export proceeds and under-invoice exports while importers rush to banks to open LCs and lock the exchange rate. So far, net international reserves reserves have remained at over $28.7 billion (equivalent to 5.4 months of GNFS imports in FY18) in mid-September 2018, which is barely adequate. To prevent further reserve depletion and avoid the risk of a volatile exchange market, BB will need to allow greater exchange rate flexibility.



[15] Many authorized dealers are allegedly misreporting the true exchange rate to BB by understating the extent of taka depreciation and charging the additional costs to operational expenses.

Usual fiscal trends

History repeated itself on the fiscal front. The overall budget deficit outturn fell short of the original 5 percent of GDP target, but the deficit in FY18 increased relative to last year as expenditure outpaced growth in revenues. Domestic financing of budget deficit, drawn entirely from expensive non-bank sources, remained sizeable. The share of current in total government expenditure is rising, driven by increased interest payments and subsidies. The number of projects in the development portfolio continued to increase during year while the original ADP size is cut, thus thinning out scarce financial and time resources, resulting in usual implementation delays.

Overall budget deficit increased. The FY18 fiscal deficit was 4.5 percent of GDP, the fifth straight year in which the deficit-to-GDP ratio fell well short of the 5 percent budget target. Slower than programmed implementation of the Annual Development Program (ADP), in common with previous budgets, more than compensated for the revenue underperformance (Table 6). However, the deficit increased relative to last year as expenditure growth outpaced growth in revenues. Heavy reliance on domestic financing, underpinned by buoyant sale of high yielding national savings certificates (NSC), continued. At the same time, there was significant improvement in the utilization of concessional foreign resources. The debt incurred from domestic sources comes with a relatively high interest rate. As a result, the overall interest payment burden of the government has been increasing rapidly over the past years.

Table 6: Fiscal Outcomes

(Taka in billion)

	FY14	FY15	FY16	FY17	FY18
Total Revenue	**1403.8**	**1459.7**	**1729.5**	**2012.1**	**2382.1**
	(10.4)	**(9.6)**	**(10.0)**	**(10.2)**	**(10.6)**
o/w Tax Revenue	1160.3	1288.0	1518.9	1780.8	2073.1
	(8.6)	(8.5)	(8.8)	(9.0)	(9.2)
Total Expenditure	**1882.1**	**2043.8**	**2384.3**	**2695.0**	**3388.0**
	(14.0)	**(13.5)**	**(13.8)**	**(13.6)**	**(15.1)**
o/w Current Expenditure	1105.6	1189.9	1444.3	1644.9	1885.0
	(8.2)	(7.9)	(8.3)	(8.3)	(8.4)
ADP	553.3	603.8	793.5	840.9	1185.0
	(4.1)	(4.0)	(4.6)	(4.3)	(5.3)
Others	223.1	250.0	146.6	209.1	318.0
	(1.7)	(1.6)	(0.8)	(1.1)	(1.4)
Deficit	**-478.3**	**-584.2**	**-654.8**	**-682.9**	**-1005.9**
	(-3.6)	**(-3.9)**	**(-3.8)**	**(-3.5)**	**(-4.5)**
Net External Financing	**97.1**	**72.3**	**147.4**	**123.0**	**411.6**
	(0.7)	**(0.5)**	**(0.9)**	**(0.6)**	**(1.8)**
Net Domestic Financing	**381.4**	**511.7**	**507.3**	**559.9**	**594.4**
	(2.8)	**(3.4)**	**(2.9)**	**(2.8)**	**(2.6)**
o/w Non-Bank Borrowing (Net)	199.7	506.6	401.2	643.6	474.9
	(1.5)	(3.3)	(2.3)	(3.3)	(2.1)

Source: *Ministry of Finance*
Note: Numbers in parenthesis represent percentage of GDP

Both tax and non-tax revenues missed the original budget target by a large margin in FY18. This has been the trend for six consecutive fiscal years. Income tax collection could only meet

two-thirds of its planned target. A large shortfall was also recorded in case of VAT and Supplementary Duties (SD), while non-tax revenue collection remained well below the target. Thanks to high import growth, revenue collected from customs duties was close to the target. Indeed, failure to implement planned policy reforms, weak institutional capacities and absence of the needed administrative efforts have resulted in lack of improvement in mobilizing additional revenue. A plethora of tax exemptions that are in place prevented even more robust responses of the income tax and VAT. The mismatch between targeted level of revenue mobilization and actual attainment has been a recurring phenomenon. Deficit in non-tax revenue mobilization has further accentuated the shortfall.

Expenditure target undershot as well. Undershooting characterizes all major components of the budget (revenue, expenditures, deficit, and financing of deficit as shown in Box-2), but it is most pronounced in case of development expenditures. While total expenditures have remained at less than 14 percent of GDP, current expenditure to GDP ratio has been increasing, driven by high growth in wages, interests and subsidies. Expenditure on subsidy began to fall since FY14, both as a percentage of the GDP and that of the budget, bottoming out in FY16 over the last nine years before rising again from FY17. Soft international commodity prices, particularly petroleum and fertilizer, and domestic power price adjustments contributed to the decline in subsidy. These tailwinds have now faded almost completely.

FY18 ADP was cut by Tk. 75.5 billion to bring its size down to Tk. 1483.81 billion. The number of unapproved ADP projects given allocation in the revised ADP (RADP) has been rising. A total of 311 fresh projects were included in the FY18 RADP, the highest in last 10 years. The total allocation for these projects was Tk. 96.78 billion, of which the project aid component was only Tk. 3.94 billion.[16] Low physical progress has undermined quality of overall ADP implementation. Data from IMED covering FY01-17 suggest that about 65 percent projects were stated as completed without their physical progress being fully finished. Monitoring of physical progress by implementing agencies is lackluster as is submission of project completion reports and initiatives to respond to the problems identified by the IMED.

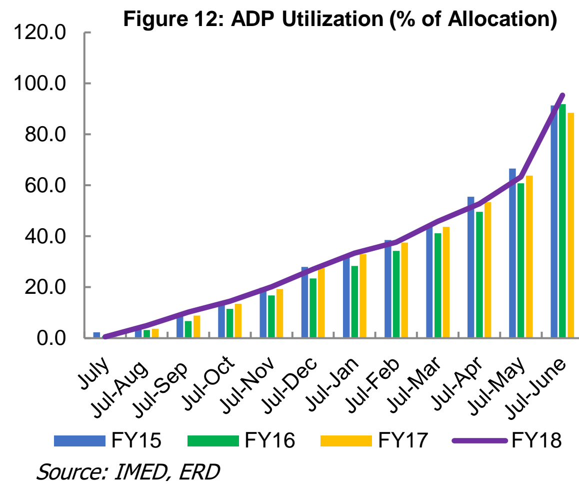
The 'fast track' projects are not moving fast enough. The government has prioritized ten mega projects under the 'fast track' initiative.[17] Eight out of these ten had initially received an allocation of Tk. 309.29 billion which is 19.8 percent of total ADP allocation for FY18. Most of these projects are scheduled to be completed after 2020. The overall progress of the 'fast track' projects has been below the respective targets. Although five projects have made visible progress, many projects are behind the schedule.

[16] A few mega projects with high project cost such as Mirsarai 150 MW Duel Fuel Power Plant, Dhaka-Ashulia Elevated Expressway, Extension of Hazrat Shahjalal International Airport etc. were included in the RADP.

[17] These include: Padma Multipurpose Bridge (PMB), Dhaka Mass Rapid Transit Development Project (DMRTDP) known as Metro Rail project, 2x1200 MW Ruppur Nuclear Power Plant (RNPP), Matarbari 2x600 MW Ultra-Super Critical Coal-Fired Power Project (MUSCCFPP), 2x660 MW Moitri Super Thermal Power Project (MSTPP), LNG gas terminal for importing liquid gas project, Deep Seaport at Sonadia in Cox's Bazar and Deep Seaport at Paira, Patuakhali, Padma Bridge Rail Link (PBRL) project and Construction of Single Line Dual Gauge Track from Dohazari Ramu-Cox's Bazar and Ramu to Ghundum near Myanmar Border. Among these, the Sonadia deep sea port project has been shelved for now.

ADP expenditures spike significantly in the fourth quarter and more specifically in June of each fiscal year (Figure 12). The expenditure spikes are related to a lack of effectiveness in implementing and managing the development budget. These result from pressure on Ministries, Divisions and Agencies (MDAs) to compensate for the low budget execution rates in the period leading up to the year-end and the collective impact of many financial accounting issues which causes the backloading of expenditure within each fiscal year. Procurement plans are typically completed during the first quarter of the fiscal year, delaying the procurement and compressing expenditure effectively into three quarters. For both construction projects and major procurements, there is a tendency for PDs to back load payments as a means of exerting control over the contractor. Once the budget and ADP has been agreed, the actual authorization for fund release by the Finance Division takes some time, especially when it involves foreign currency accounts. This reduces the time for actual spending. Finalization of the Revised Annual Development Program (RADP) is required before the funds release for Q4 takes place. This can delay till May. It then takes some time before the funds reach the agencies, impacting upon the timing of Q4-expenditure. Furthermore, there are requests for additional movements of budgets between projects in the same ministry after the RADP is completed which further delays expenditure.

Figure 12: ADP Utilization (% of Allocation)



Source: IMED, ERD

State-owned enterprises remain a fiscal drain. Financial losses of SOEs, especially those in the energy and financial sectors, continue to stress the government budget. The losses of the power sector SOEs for FY17 are estimated at about Tk. 51.4 billion (US$620 million), or 0.3 percent of GDP. These losses stood at Tk. 38.6 billion (0.22 percent of GDP) in FY16, and over Tk. 72 billion (0.5 percent of GDP) in FY15. The increase in losses was mainly due to underpricing of energy products in domestic markets. Adjustments of electricity tariffs reduced losses at the Power Development Board in FY16, but cost increases expanded BPDB losses in FY17. Biman, the national airlines, and Bangladesh Chemical Industries Corporation (BCIC), the public-sector chemicals corporation, were the other main loss-makers. The losses of the SOEs have exacerbated the fragilities at the Nationalized Commercial Banks (NCBs), which are directed to provide loans to these agencies. Data from the Bangladesh Bank show a total of 10 banks, including the seven state-owned banks, faced a capital shortfall of Tk. 233.6 billion at end-March 2018.[18] These add to the fiscal risk and make future divestment of these banks more expensive for the Government. The Government has recapitalized the state-owned banks by injecting over Tk. 145 billion since 2009, yet the shortfalls have persisted due to lingering weaknesses in their corporate governance.

[18] They are Bangladesh Krishi Bank, Sonali, BASIC, Rupali, Janata, Agrani, Rajshahi Krishi Unnayan Bank, Bangladesh Commerce Bank, ICB Islamic Bank and Farmers Bank.

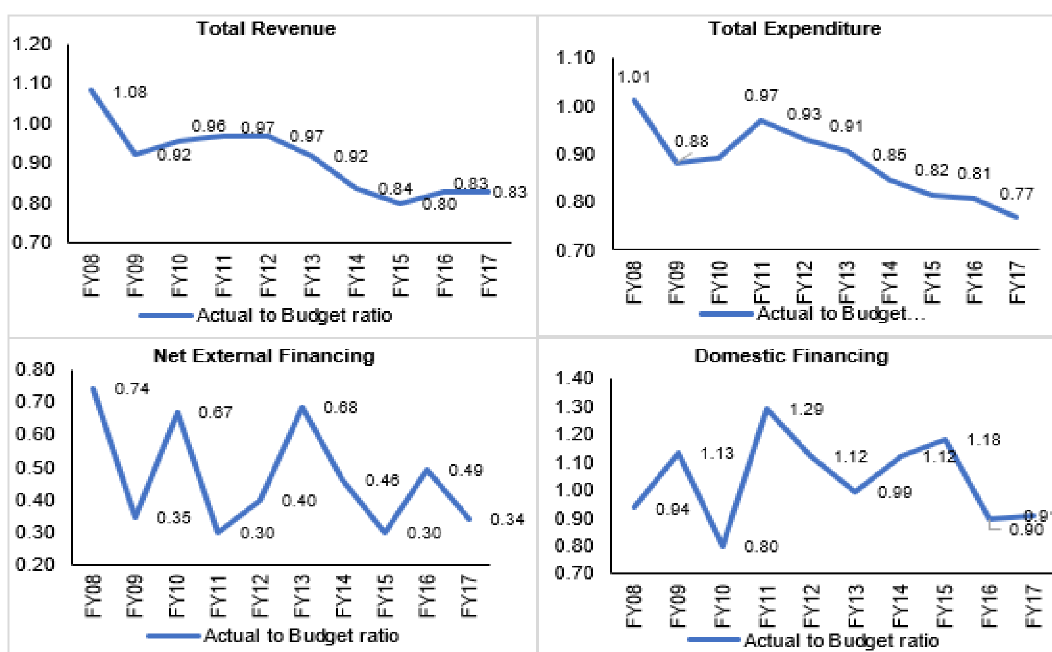
Focusing on higher quality spending will need to be a priority to continue improving outcomes. The government is confronted with the dual challenge of increasing public spending on health and education, and at the same time improving the standard of service and performance of these sectors. In view of the government's commitment to attain the SDGs, particularly in areas such as education and health, ensuring adequate allocations for these two SDGs are important since they have complementary effects on other SDGs. Notwithstanding the marginal rise in budgetary allocations for the social sectors over the past years, Bangladesh is among the bottom in the world on the ratio of public expenditure on education and health to GDP.[19] However, government could increase the public spending by a large amount but this does not necessarily mean it would improve education and health outcomes; the quality of spending will need equal, if not more, attention.

Box 2: The key fiscal challenges

Shrinking fiscal space. The total revenue to GDP ratio has stagnated within the range of 9.6 to 10.2 percent of GDP during last five years. Tax-GDP ratio has varied between 8.5 to 9 percent during the same period. Current expenditure to GDP ratio on the other hand has increased from 8.2 percent of GDP in FY14 to 8.7 percent in FY18, driven by high growth in wages, interests and subsidies. However, fiscal deficit has remained modest, thanks to large and increasing development expenditure implementation shortfall, resulting in a stable public debt to GDP ratio.

Low and declining budget implementation rate. Underperformance relative to the original budget targets have been glaring in the areas of expenditures, revenues and external financing. As shown in Figure 13, actual total expenditures as a ratio of original budget declined from 0.97 in FY11 to 0.77 in FY17 while total revenue collection as a ratio of original budget target fell from 0.97 in FY11 to 0.83 in FY17. Realization of the net external financing target has been highly volatile ranging from as high as 74 percent in FY08 to as low as 30 percent in FY11 and FY15. Low implementation rate is both a reflection of unrealistic budgeting and implementation capacity deficits.

Figure 13: Budget implementation performance



[19] SANEM, Thinking Aloud Volume 4, Issues 5 and 6, October-November 2017.

Outlook

On the middle-income highway

Strong output growth, close to 7 percent, is expected to continue. The stimulus to growth will most likely come from investment and consumption while high import growth will outweigh the direct growth contribution of resilient exports. Inflation is projected to increase due to overheating resulting from the excess of actual over potential output as well as the pass-through effects of a depreciating exchange rate. The current account deficit will persist in the near term with investment driven growth in imports outpacing the growth of exports in a weakening global trading environment. Fiscal deficit will expand moderately without posing serious risk of debt sustainability. The potential impact of contingent liabilities from high NPLs of SCBs could result in higher domestic debt, but the magnitude of the risk is manageable with adequate provisions against bad loans.

Global growth is expected to moderate.[20] Global growth is projected to reach 3.1 percent in 2018 and edge down to 2.9 percent by 2020, as global slack dissipates, trade and investment moderate, and financing conditions tighten. Growth in advanced economies is predicted to decelerate toward potential rates as monetary policy normalizes and the effects of U.S. fiscal stimulus wane. Notwithstanding the ongoing global expansion, only 45 percent of countries are expected to experience a further acceleration of growth this year, down from 55 percent in 2017. Global activity is still lagging previous expansions despite a decade-long recovery from the global financial crisis. Global growth projections are above estimates of potential, suggesting that capacity constraints will become more binding and inflation will continue to rise. Recent trade policy changes are not expected to have a material effect on **U.S**. growth, which is projected to reach 2.7 percent in 2018 and edge down to 2.5 percent in 2019. As fiscal and monetary stimuli fade, growth is forecast to slow to 2 percent in 2020. Amid continued monetary policy stimulus, growth in the **Euro Area** is projected to be 2.1 percent in 2018. It is forecast to slow to 1.7 percent in 2019 and 1.5 percent in 2020, as slack dissipates, higher oil prices weigh on consumption, monetary accommodation is gradually unwound, and borrowing costs increase. Net exports are also expected to become a drag on near-term growth, as the earlier strengthening of the euro and improving domestic demand translate into a narrowing of the sizable current account surplus. Positive spillovers from expansionary U.S. fiscal policy are expected to be limited. Growth in the **Middle East and North Africa** (MENA) is expected to rebound from last year—when it decelerated to 1.6 percent due to oil production cuts and fiscal adjustments among oil exporters—and reach 3 percent in 2018. Activity among oil exporters is picking up in response to an easing of fiscal stances and momentum from the non-oil sector.

Global trade is projected to slow. Global goods trade growth rose to 4.6 percent in 2017, three times the pace observed the previous year, and momentum remained sustained in early 2018. This pickup was led by strong trade flows in Asia and Europe. Services trade also gained strength last year. Overall, growth in global trade of goods and services combined is expected to moderate to 4.3 percent in 2018. The additional fiscal stimulus in the United States is expected to lift U.S. import growth, benefiting key U.S. trading partners (Bangladesh is one of

[20] The discussion on global growth and commodity prices outlook draws heavily from the World Bank, Global Economic Prospects, June 2018.

them). A projected deceleration of capital spending in China and in most advanced economies will contribute to more moderate global trade growth, edging down to 4 percent by 2020. Over the medium term, structural factors—including slower growth of global value chains and a reduced appetite for further trade liberalization—will continue to constrain global trade growth. These factors have contributed to the decline in the long-run income elasticity of trade over the last decade.

Mixed outlook on commodity prices. Crude oil prices rose 10 percent in the first quarter of 2018 and have averaged $67 per barrel (bbl) over the first half of 2018.[21] Oil demand has been robust. Oil prices are expected to average $70/bbl in 2018 and $69/bbl in 2019. Metals' prices are expected to increase 9 percent in 2018, reflecting strong demand, but then moderate in 2019. Agricultural prices gained 4 percent during the first half of 2018 compared to a year earlier, following three years of price stability. The price uptick was primarily driven by lower plantings of wheat and maize in the United States, as well as some weather-related disruptions to soybean production in South America. Lower plantings have contributed to a decline in stocks-to-use ratios—a measure of global supply availability relative to demand—for some grains. However, these remain high by historical standards, reducing the likelihood of a food price spike.

Growth in Bangladesh projected to remain resilient. Increased public spending on infrastructure, along with robust private investments, exports and remittance inflows, will support growth, although adverse weather conditions, regulatory unpredictability and a problematic banking sector are likely to limit the prospects. Apart from a favorable exchange rate, the rising shipment of higher value-added items, brighter image of Bangladesh's garment sector after remediation, automation of production and relative political calm combined with rebound in the economies of Bangladesh's major export destinations from the shocks of Brexit and general elections in many EU countries should help prop up export growth further. A good number of new factories are expected to come into operation in the next couple of years with entrepreneurs investing to capture the shifted work orders from China. Export growth in July-August 2018, however, declined to 2.5 percent with a reduction in garment growth to 3.8 percent and 4 percent decline in non-garment exports. Remittances turnaround is expected to persist as GCC economies benefit from higher oil prices and incentives for remitting through informal channels remain weak. Note that remittance growth in the first two months of FY19 was down to 7.7 percent. Private investment is likely to maintain recent 8-9 percent growth induced by progress on infrastructure development prospects, strong domestic demand and stronger global markets. These, in addition to the country's reforming business environment, inform our forecast for Bangladesh to creep towards achieving a 7 percent growth rate in FY19-20 (Table 7). The economy has once again shown resilience to the lingering effects of repeated flooding in 2017 and the ongoing accommodation of over 700,000 additional Rohingya refugees.

[21] An agreement between most members of the Organization of the Petroleum Exporting Countries (OPEC) and some non-OPEC oil producers to extend output cuts to the end of 2018 boosted prices in late 2017 and into 2018—despite further increases in U.S. oil production.

Table 7: Bangladesh Macro Outlook Indicators				
(annual % change, unless indicated otherwise)				
		Projections		
	2018	2019	2020	2021
Real GDP growth, at constant market prices	7.7	7.0	6.8	7.0
Private Consumption	9.0	7.1	7.2	7.5
Government Consumption	15.1	11.4	10.0	11.5
Gross Fixed Capital Investment	11.4	8.9	7.8	8.3
Exports, Goods and Services	4.5	4.9	5.1	6.3
Imports, Goods and Services	20.6	10.1	9.5	10.9
Real GDP growth, at constant factor prices	7.7	7.0	6.7	5.6
Agriculture	3.1	3.1	3.1	3.2
Industry	12.0	9.5	9.6	9.7
Services	6.3	6.5	5.8	6.7
Inflation (Consumer Price Index)	5.8	6.7	6.2	5.9
Current Account Balance (percent of GDP)	-3.6	-3.4	-2.4	-2.2
Financial Account balance (percent of GDP)	3.3	3.4	3.4	3.4
Capital Account Balance (percent of GDP)	0.1	0.2	0.2	0.2
Net Foreign Direct Investment (percent of GDP)	0.6	1.0	1.0	0.9
Fiscal Balance (percent of GDP)	-4.5	-4.6	-4.7	-4.7
Central Government Debt (percent of GDP)	31.3	32.6	34.2	35.7
Primary Balance (percent of GDP)	-2.8	-2.8	-2.7	2.7

Source: WB staff estimation; Bangladesh Bureau of Statistics; Bangladesh Bank, Ministry of Finance

Macroeconomic stability likely to be challenged further. With actual output already exceeding the potential by 0.6 percent of potential output in FY18, sustaining 7 percent plus growth by maintaining strong domestic demand brings with it the risk of accelerating inflation. Inflation is thus projected to increase driven largely by demand pull in the run up to elections with pre-existing overheating pressure anchored in the excess of actual over potential output. Aggregate demand is likely to be stimulated by both an expansionary fiscal policy and rise in nonpublic spending in an election year. Together with the increase in incomes from growing exports and remittances, this will increase domestic demand and add to pressure from the already depreciating exchange rates and uptrend in international prices of some of Bangladesh's key imports such as fertilizer and industrial raw materials. Monetary policy recently turned to an expansionary stance and private sector credit growth has reached a recent high. Excessive private credit growth is a concern because of inadequate application of macro-prudential regulations relating to credit risk management. The banking system is already fragile due to contraction in deposit growth, capital shortfalls and bad loans.[22] Continued strong growth in payments because of industrial raw material imports, import of LNG, mega project related imports and rise in oil prices could be expected to keep the current account in deficit over the medium-term as well. Over the short-term, a sizeable foreign reserve will allow the BB to control the pace of currency weakening. Over the long-term, the taka is likely to weaken further due to higher inflation and an overvalued real effective exchange rate. A large shortfall in revenue relative to the budget target due to reduced tax at source on exports[23] and corporate income tax rates on banks as well as lack of any revenue

[22] Mispricing of risks cannot be ruled out in the banking industry, as both global and Bangladesh's own experience shows.

[23] The NBR reduced withholding tax on the total proceeds from exports for all items to 0.6 percent from 0.7 percent through a notification issued on September 6, 2018.

increasing reforms in tax administration and additional pressures on expenditures due to the Rohingyas, rising subsidies[24] and the elections could lead to increased budget deficit. A modest increase in public debt is thus projected.

The risk of debt distress remains low, notwithstanding fiscal expansion. The joint Bank-Fund Debt Sustainability Analysis completed in May 2018 reaffirmed the previous assessment that the risk of both external and overall debt distress continues to be low. While the threshold for the external debt service to revenue is breached temporarily under the most extreme stress test scenario, the risk of external debt distress is judged to be low given the small and temporary nature of the breach. The government remains committed to the 5 percent of GDP deficit target for FY19-21. As in previous years, the FY19 budget targets ambitious increases for both revenues and expenditures – 30.8 percent and 25.1 percent relative to the revised FY18 budget respectively. As is usually the case, spending will be adjusted in response to weaker revenues due to the delay in tax policy and administrative reforms. Issuance of National Savings Certificates continues to exceed the budgeted amount by a large margin. By the end-June 2018, the stock of National Savings Certificates reached 2.1 times the amount compared to outstanding central government borrowing from the banking sector. The relatively high level of the total public debt service to revenue ratio underscores the need to boost revenues. The budget faces risks from spending pressures ahead of the parliamentary elections and additional costs associated with the Rohingya refugees.

Contingent liabilities from high non-performing loans (NPLs) in state owned commercial banks (SOCBs) and guarantees to state-owned enterprises could result in higher domestic debt. While the NPLs approach 30 percent of total SOCBs loans, the total amount represents only about 2 percent of GDP. This amount provides a magnitude of the potential risk to the government's balance sheet. Actual NPLs are most likely to be higher than reported and could increase in the future, but bank's provisions against bad loans mitigate the fiscal risk. Total guarantees against loans negotiated by various state-owned financial and non-financial enterprises has increased from about $7.5 billion at end-June 2017 to $8.7 billion at end-June 2018, over 62 percent of which is in the power sector. However, the potential impact is still manageable, given the low level of debt to GDP ratio, if these are systematically monitored and funding mechanisms for dealing with them, should these risks realize, are put in place.

Monetary policy vigilance needed. The decision to ease monetary policy in March 2018 was motivated by the tightening of liquidity conditions with broad money growth below the nominal GDP growth and the risk that banks may have to sharply cut financing to businesses. The policy stance announced in July 2018 is appropriately contractionary with the 12 percent broad money growth target kept short of the projected 14 percent increase in nominal GDP, guarding against upside inflation risk emanating from increasing international oil prices, exchange rate depreciation and high inflationary expectations.[25] It also provides sufficient

[24] The government has expanded the list of exports eligible for cash incentives to include some more nontraditional goods. The apparel sector gets 5 percent cash incentive for exporting goods to traditional destinations like the US, Canada and the EU. The rate is 8 percent for new markets. On September 10, 2018, BB added 9 more items to the list of cash subsidies for exports—medicines, motorcycles, chemical products, razor and razor blades, ceramics etc. The first consignment of imported LNG reached Bangladesh in April 2018 and in view of this a Tk. 25-30 billion additional subsidy burden is likely to arise. Overall, the subsidy for power (BPDB) and gas (Pertobangla) is set to increase by around 22 percent to Tk. 90-95 billion in FY19. Meanwhile, due to upward trend in international energy and fertilizer prices, agriculture subsidy is likely to increase by 5.6 percent to Tk. 95 billion while subsidy for export sector may register 12.5 percent increase to Tk. 45 billion in FY19.

[25] Bangladesh Bank, Monetary Policy Statement, July – December 2018.

accommodation to private sector credit with a growth target of 16.8 percent, which can be adjusted if the economic conditions warrant. The emphasis on market-based reduction of nominal interest rate, rather than through directives, is very timely and ought to be heeded. There can be no sustainable decrease in interest rate without a decrease in inflationary expectation, increased intermediation efficiency through decrease in non-performing loans and excessive operating expenditures and decreased risk-free rates. These cannot be achieved if poor performing banks continue to be unconditionally recapitalized; loan defaulters bailed out with impunity; and the NSC interest rates and sales policy remain as they are. More attention is needed to stem the erosion of Bangladesh's international price competitiveness given that the currency depreciation last year was lower relative to peer economies while inflation was higher. This requires allowing greater exchange rate flexibility which will also help stem shrinking reserve adequacy (now down to 5 months of imports).

Currently, BB operates a quantity-based policy regime that aims to keep broad money growth in line with its inflation objective. Over the medium-term, it plans to strengthen the monetary policy transmission mechanism by moving towards interest rate targeting, emphasizing the importance of price stability as the primary monetary policy objective; greater exchange rate flexibility, further development of financial markets; and strengthened forecasting of banking and government sector liquidity. Enhanced supervision of weak banks and targeted conditional liquidity support rather than a broad easing of monetary policy is better suited to addressing liquidity problems in individual banks. High NPLs and weak bank governance point to potential financial stability risks from rapid credit growth, requiring macroprudential measures to mitigate these risks. The new ADR limits should be strictly enforced and relaxing the existing caps on credit growth in the state-owned banks need to be avoided. After a long period of appreciation, the Taka real exchange rate recently started to depreciate vis a vis trading partners. While excessive exchange rate fluctuations are undesirable and thus intervention in the market is warranted to avoid large movements, BB should continue to gradually increase exchange rate flexibility. Enhanced flexibility would help buffer the economy against external shocks, preserve the level of reserves, and increase monetary policy autonomy.

Risks and challenges

Staying on track

While Bangladesh is vulnerable to the vagaries of global trade, the downside risks are predominantly domestic. A major domestic risk is the weakening of ongoing efforts to improve economic governance as the election approaches. Further erosion of the capital base of the state-owned commercial banks, increasing subsidies, stagnating revenue mobilization and donor fatigue in providing resources to meet the needs of the Rohingya could undermine fiscal balance. Export demand and remittances could surprise on the upside. The best defense against downside risks is acceleration of policy and structural reforms.

Risks to the outlook remain tilted to the downside. Despite Bangladesh's limited integration in the global supply chain and financial markets, it is not totally immune from the disruptive forces in these arenas. The latter include the possibility of disruptive financial market developments, escalating trade protectionism, heightened geopolitical tensions, and renewed

volatility in oil prices.[26] In case a combination of these downside risks materializes, it could trigger a sharper-than-expected slowdown in global growth. This in turn can have severe negative effects on Bangladesh's export diversification prospects. There is also the possibility that growth in major economies may surprise on the upside, with positive spillovers to trading partners. Rapid reconstruction progress in war-torn areas represents an important upside risk to the demand for migrant labor from Bangladesh. Upside oil price risks primarily arise from geopolitical developments involving key oil-producers in the Middle East and North Africa—particularly those related to the reinstatement of sanctions on Iran. In addition, the recent imposition of sanctions on Venezuela could lead to further declines in Venezuela's oil production. Downside price risks include a loosening of the OPEC/non-OPEC planned cuts, faster-than-expected U.S. shale oil production; or lower demand for oil because of higher prices.

Box 3: Tariff escalation and Bangladesh - Opportunity or Risk?

The United States escalated tariffs on imports from China, the European Union (EU), Canada, Mexico and India who in turn retaliated by imposing higher tariffs on US exports to them. An all-out tariff escalation has significant implications for developing countries, ones that are likely to be quite different than those for developed nations. Developing countries may face higher tariff barriers while exporting their products to other countries which may be detrimental to export-oriented growth. The fact that most *growth miracles* of the last century, including Japan and South Korea, were driven by increasing exports to developed countries proves how important this might be. If developing countries retaliate with higher tariffs on imports to keep their current account deficits in check, this will lead to higher prices for imported products and a substitution of high quality foreign products with the domestic ones. The overall outcome is a reduction in purchasing power due to reduced income and inflation.

In response to US's 25 percent tariff on USD 34 billion worth of Chinese exports, China placed a reciprocal tariff on American exports—including soybean and cotton—to China worth the same amount. In a bid to find alternatives elsewhere, China decided to lower or cancel tariff on thousands of goods from Bangladesh, India and three other countries. Unfortunately, Bangladesh does not have the diversified production capacity to cash in on these tariff reductions. The US imposed an additional 10 percent tariff on USD 200 billion worth of Chinese goods—roughly half of the total US import from the country. It is not clear how many alternatives, if any, to Chinese goods Bangladesh will be able to provide American consumers with. Note that the Chinese goods targeted by the second round US tariffs do not include most Chinese-made clothing.

Restrictions on global trade might be an opportunity as well as a risk for developing countries. Prices of some key primary commodities, such as, cotton, soyabean, and maize in futures markets traded in NASDAQ and International Commodities Exchange (ICE) started declining significantly (10 percent and more) soon after all these started. For Bangladesh, cotton is important for textile and RMG industries, and soybean and maize for edible oil, poultry, fish, and livestock industries. Savings from cheaper import of these raw materials could result in lower production cost and increased competitiveness of these industrial sub-sectors in Bangladesh, all else equal. However, Bangladesh needs to import about 60-65 percent of its yarn for export-oriented woven products, mostly from China and India. Yarn production in China and India will be costlier, as they largely depend on US

[26] Global economic uncertainty has increased with increased trade tensions in the second half of September 2018. According to the IMF, trade tensions will cut peak GDP growth by 0.5 percentage points, with a long-term loss of about 0.3 percentage points. Downside risks are up.

cotton to produce yarn. Also, Bangladesh cannot replace overnight the Chinese and Indian yarn manufacturers with the US cotton supply as raw material for the domestic spinning mills to substitute yarn imports.

What if the US imposes a blanket tariff on all RMG imports? US has kept some countries out of the new tariffs on different products, but it is not certain whether the tariff on RMG products would be imposed only on China or on all countries. The impact of the possible tariff on apparel products on Bangladesh would depend on how the US imposes it. Bangladesh's export will be affected if the tariff is imposed on all countries. However, Bangladesh will benefit if the tariff is imposed only on China and other big countries. The tariff may be only on China and few other countries if the US imposes it on anti-dumping ground. The tariff might be imposed on all countries if it is imposed on other grounds such as "Make in America".

Trade tensions continue to mount. The US announced on September 17, 2018 their intention to impose 10 percent tariffs on $200 billion worth of Chinese goods, which would rise to 25 percent by the start of 2019. China responded, imposing 5 percent and 10 percent levies on $60 billion worth of American goods. The latest round of escalation is large enough to rattle global trade, raise prices on a much wider array of products and reshape complicated supply networks.

Increases in worldwide barriers to trade is on balance most likely to hurt. Analysis[27] done so far show that a coordinated global withdrawal of tariff commitments from all existing bilateral/regional trade agreements, as well as from unilateral preferential schemes coupled with an increase in the cost of traded services, could result in annual worldwide real income losses of 0.3 percent or US$211 billion relative to the baseline after three years. An important share of these losses is likely to be concentrated in regions such as East Asia and Pacific and Latin America and the Caribbean which together account for close to one-third of the global decline in welfare. A worldwide increase in tariffs up to legally allowed bound rates coupled with an increase in the cost of traded services would translate into annual global real income losses of 0.8 percent or more than US$634 billion relative to the baseline after three years. The distortion to the global trading system would be significant and result in an annual decline of global trade of 9 percent or more than US$2.6 trillion relative to the baseline in 2020. This certainly is bad news for Bangladesh's export product and market diversification prospects.

With election approaching, a major domestic risk is the weakening of ongoing efforts to improve economic governance. This could affect confidence and investment. Sustained increases in non-performing loans and weak governance in banking could impair credit growth particularly if there is a growth slowdown in the economy. In addition, further erosion of the capital base of the state-owned commercial banks could undermine fiscal balance. Donor fatigue in providing resources to meet the needs of the Rohingya could increase pressure on the budget, while the quasi-fiscal deficit could rise with increasing international oil prices. Unfavorable weather could further slow poverty reduction among households in agriculture. Rising food inflation may dampen gains made through increased investment in industry, while exacerbating the situation for food-deficit households in agriculture. However, export demand and remittances could surprise on the upside.

[27] Zornitsa Kutlina-Dimitrova and Csilla Lakatos, The Global Costs of Protectionism, Policy Research Working Paper 8277, The World Bank, December 2017

Slow progress in resolving the Rohingya refugee crisis could add to economic and social risks. An estimated 700,000 Rohingya refugees have entered Cox's Bazaar, Bangladesh since August 2017, giving rise to a near humanitarian crisis. The new arrivals joined some 212,500 Rohingya in Cox's Bazar that had fled in earlier waves of displacement. The refugees are concentrated in two Upazilas of Cox's Bazar District; Ukhia and Teknaf,[28] putting an immense strain on the half a million Bangladeshis who live there, and the local government. The Bangladeshi government continues to keep its borders open and aid incoming refugees in coordination with humanitarian agencies. Infrastructure, health and water services, and the environment, especially fragile forest and land resources, are under massive pressure. The combined support of donors to date has been generous, with humanitarian donors remaining supportive since the influx. Humanitarian needs nevertheless continue to outpace funding. The urgency of the current situation and the likelihood of a protracted and multi-dimensional crisis risk reversed development in the Cox's Bazaar region. While the macroeconomic impact at the national level may not be substantial, absent concessional international assistance, the impact on the national budget and national external and domestic debt is significant. Also, given the uncertainties surrounding the repatriation process, the crisis impact on host communities and the rest of the country could intensify. In the near-term, refugee camps face significant risks from floods and landslides during the monsoons, highlighting the urgent need to upgrade infrastructure. Adequate and timely funding is required to meet lifesaving humanitarian needs, combined with scaled up or restructured development funding on concessional terms to strengthen the resilience of Bangladesh by assisting both host communities and refugees. Concessional financing may be used to support operations that promote the effective delivery of basic services, strengthen and develop critical infrastructure, support social protection, promote job creation by expanding opportunities, promote private sector participation, and even provide necessary budget support as it relates to the impacts of the refugee crisis.

The risks remain tilted to the downside. The key risks include a protracted slowdown in key export markets, contracting large amounts of short-term debt, a rapid build-up of non-concessional debt and contingent liabilities, and disruptions in the run up to elections. The growth in RMG exports has been tepid while its production costs continue to increase. Any slowdown in demand and/or increase in prices of RMG inputs such as cotton and yarn in international markets due to escalating trade protectionism (Box-3) constitute a significant risk given how narrow the export basket currently is. The risk from contracting short term external debt is highlighted by the small and temporary breach of the debt servicing threshold in the short term.[29] While the investments in large infrastructure projects are needed to boost potential growth, higher non-concessional externally financed infrastructure spending could push up the debt path particularly if these projects are subject to the usual time and cost overruns. Contingent liabilities from high non-performing loans in state owned commercial banks could result in higher domestic debt.

[28] There have been successive waves of displacement of the Rohingya population from Rakhine to Bangladesh since the 1990s. In 2013, the Government of Bangladesh estimated that there were 300,000 Rohingya in Bangladesh. Following the initiation of Needs and Population Monitoring in 2017, approximately 210,000 Rohingya have been identified, concentrated in two *upazilas* in Cox's Bazar. These *upazilas* are the areas with the denser population of Rohingya, however, there are Rohingya communities in other parts of Cox's Bazar and in neighbouring districts, mainly Bandarban.

[29] IMF, Article IV Report, June 2018.

Macroeconomic stability and structural reforms can mitigate the downside risks. The materialization of these risks will push back the process of creating more and better jobs for Bangladesh's rapidly expanding young labor force by depressing private investments, slowing human capital formation and constraining export diversification. Macroeconomic stability and structural reforms, which are needed any way to accelerate the middle-income journey without being trapped, provide the best defense against the downside risks.

Ensuring a sound macroeconomic framework will require addressing hot spots in the price situation, exchange rate, banking and fiscal management. On the inflation front, food inflation needs to be reduced further and the rise in nonfood inflation needs to be stemmed. A clear and consistent stance on increasing exchange rate flexibility will give allow non-speculative behavior in export and import trade. Addressing the NPLs problem, better credit risk management, reduced regulatory forbearance, reforming the NSC regime, and allowing BB to conduct monetary policy and financial regulation independently can help lowering and sustaining interest rates at single digits. Last but not the least, rebalancing fiscal policy to expand fiscal space and improve the quality of public spending will help improve service delivery and build quality infrastructure.

Structural reforms will be critical for removing the barriers to export diversification and private investment. Having a competitive real effective exchange rate is a pre-requisite for ensuring the price competitiveness of all exports. In addition, redesigning the existing policy support regime for exports to incentivize technological upgrading in existing exports while eliminating the disincentives for market discovery of new exports by rationalizing the import tariff regime will be important for export diversification. Boosting private investment requires actions aimed at increasing the ease of doing business. The best place to start is to accelerate the implementation of ongoing initiatives to establish one stop shop (OSS) and national single window (NSW), modernize ports, complete a few well located special economic zones, improve the efficiency of electricity generation, transmission and distribution, and ensure regulatory predictability. Beyond these, over the longer term, focusing on governance reforms (rule of law, security, and coordination) to improve competitiveness; limiting elite capture of the policy process and resources (credit, public investment, and regulation); maximizing financing for human development (education and health), and improving the policy regime and systems for protecting the environment will be crucial.

One area where Bangladesh consistently ranks poorly both in the Global Competitiveness Index and in the Ease of Doing Business Indicators is electricity. In what follows we focus more deeply on the key issues that need to be addressed to enable the sector to keep up with the growing needs of the economy.

Energizing electricity: building on success

Bangladesh has made impressive progress in expanding the supply of electricity. Next steps include efforts to further expand access to households and ensure reliability and above all satisfy electricity demand for an economy growing at a fast pace. Moving forward, gas pricing reform, more efficient gas allocation mechanisms, incentive-based regulation of power plants, merit-order based power dispatch, improving end-use energy efficiency, leveraging the large potential for regional power trade to cost-effectively increase electricity supply, and electricity pricing adjustments – combined with a program

of support to alleviate the costs of adjustments to these reforms – would lead to enhancing the contribution of electricity to Bangladesh's growth and development.

Done well, can be better

Bangladesh has made impressive progress in expanding electricity access and reducing power shortages over the past decade**.** The installed generation capacity has more than tripled since 2009, increasing from 4.9 GW in 2009 to 15 GW in 2017. The length of distribution and transmission lines were expanded by roughly 60 percent and 30 percent, respectively, during the same period. Only about 47 percent of Bangladeshis had access to electricity in 2009; by 2017 the share had increased to 80 percent. Thanks to the massive capacity expansion, load shedding has also been drastically reduced, especially since 2014. Power shortages, measured by the share of maximum load shedding to maximum demand declined from 20.9 percent in fiscal 2009 to 10.1 percent in fiscal 2014, and was further cut down to 2.2 percent in fiscal 2016 (BPDB 2016, 2017). Bangladesh has also been a pioneer for innovative energy solutions. Its rural electric cooperatives and the development of off-grid solar home systems initiatives gained worldwide recognition as successful models for extending electricity services to rural population cost efficiently. Bangladesh can build on these good experiences to provide access to the more than 33 million citizens that still live without access to electricity.

Bangladesh still faces enormous needs to further expand access to households, ensure reliability and meet fast growing electricity demand. The country's per capita electricity consumption is roughly a third of India's and a tenth of the world average. As Bangladesh continues its growth trajectory and with more people being connected to the grid, demand for electricity is expected to grow to 34 GW by 2030, more than double the amount of today's installed capacity. Consumers are demanding not only more power but also better service. Reliability of electricity services, according to the latest *Global Competitiveness Report,* ranks 101 among 137 economies (Schwab 2018).

Meeting the power demand, with depleting domestic gas production, would require increased imports of fuel. To address energy supply challenges, Bangladesh intends to rely more heavily on coal because it is the cheapest alternative for scaling up generation capacity massively. The government's 2016 master plan for the power sector proposed increasing the share of electricity generated from coal to 35 percent by 2041, up from 2 percent in 2015. Bangladesh has also started to import liquefied natural gas (LNG) in 2018. Imported LNG is projected to meet 70 percent of domestic gas demand by 2041.

There are alternatives to increase power supply at a lower cost. As a development imperative, improving the supply of electricity with the lowest cost is a first-order concern. Comprehensive energy sector reform that addresses inefficiencies at different stages of power supply could play a big part in making the most use of domestic gas and increasing the supply of electricity cost effectively while limiting the reliance on imported fossil fuel. Specifically, they include (1) promoting exploration and production and more efficient gas allocation, (2)

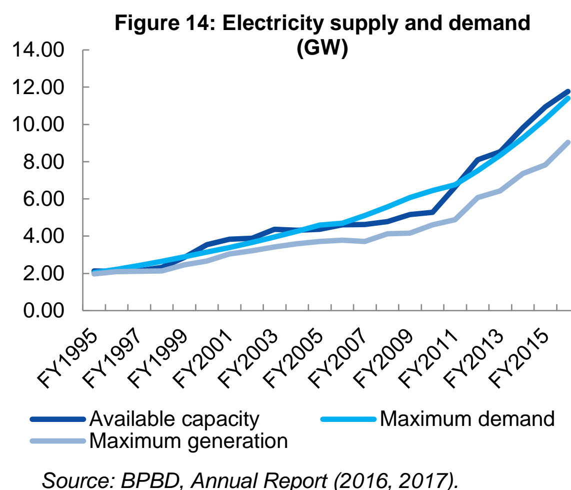
reducing inefficiencies in electricity generation and dispatch, and (3) importing electricity from the neighboring countries.

Reforming gas pricing and allocation policy

Bangladesh faces increasingly severe shortages of indigenous gas. Natural gas dominates the energy landscape. In FY17, natural gas was used to produce 63 percent of the country's electricity. With declining production from the existing gas fields and a rising demand for electricity, Bangladesh faces increasingly severe gas shortages. The shortfall in domestic production was about 962 million cubic feet a day, or 25 percent, in 2017, up from 621 million a day in 2015. Petrobangla, the largest national oil company, projected that, unless significant new production comes online, the demand-supply gap could widen to 1,333.5 million cubic feet a day by 2019 (Petrobangla 2016).

Gas shortages have led to electricity shortages. Less than 80 percent of available capacity is operational most of the time (BPDB 2015, 2016). Gas shortfall is the biggest factor in the low capacity utilization in generation (Ministry of Finance, Bangladesh 2016). In 2014, for example, 10 percent of gas-based capacity was stranded because of a gas shortfall. With power plants utilized at their optimal level, the existing fleet of generating units would have been sufficient to eliminate the power deficit in fiscal 2016 (Figure 14).

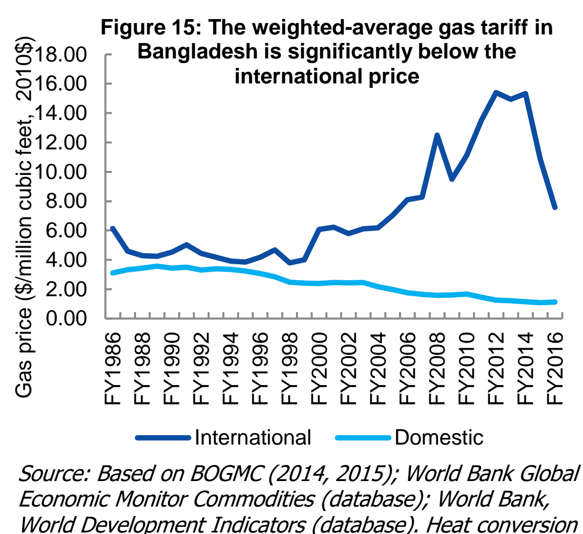
Figure 14: Electricity supply and demand (GW)



Source: BPBD, Annual Report (2016, 2017).

Gas pricing has contributed to gas shortages. Domestic natural gas has been consistently priced below the import parity price in Bangladesh —the landed price of LNG at the nearest international hub (Figure 15). Even with the recent drop in global gas prices, the international LNG price in FY16 was still about 6.7 times the weighted-average domestic gas price and 11 times the gas tariff for power generation (Petrobangla 2016). Gas pricing can also be evaluated against the cost of the cheapest replacement fuel. For power generation, this is the price of furnace oil, which in fiscal 2017 was 19 times the price of gas for power generation in Bangladesh.

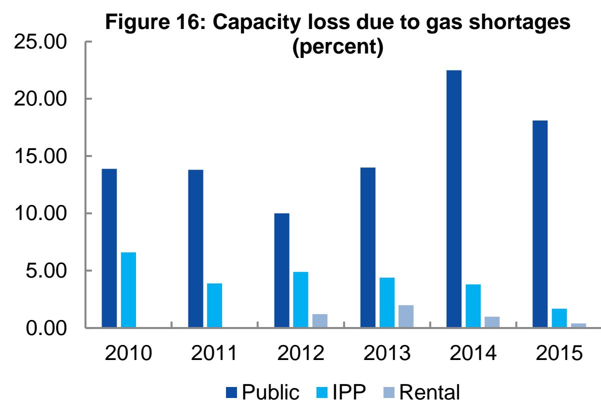
Figure 15: The weighted-average gas tariff in Bangladesh is significantly below the international price



Source: Based on BOGMC (2014, 2015); World Bank Global Economic Monitor Commodities (database); World Bank, World Development Indicators (database). Heat conversion

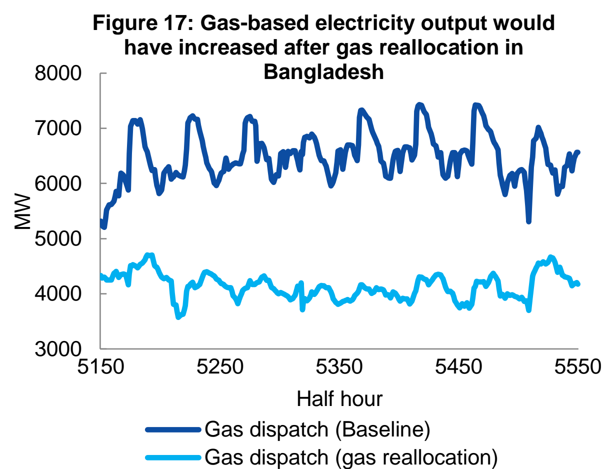
Gas underpricing can lead to inefficient consumption and provides lower incentives for gas exploration and production. The efficiency of gas-based generation in Bangladesh is ranked the 15th lowest in the world. Meanwhile, gas has emerged as the only major fuel for electricity generation, with its share in the fuel mix rising from 40 percent in 1971 to a peak of 93 percent in 2010. On the supply side, several large gas development projects had been abandoned in part due to concerns that current tariffs would not enable cost recovery with reasonable returns (*Financial Express* 2015).

Inefficient allocation of gas further exacerbates the impact of gas shortages. To cope with acute gas shortages, the government began to ration gas in 2010. It is allocated among power plants, fertilizer plants, industries, and compressed natural gas filling stations in accordance with administrative orders rather than a market approach. Within power sector, the allocation scheme gives priority to costlier rental power plants, which account for 23 percent of total installed gas capacity in FY16. During 2010–15, gas constraints led to an average capacity loss of 15 percent for the government's own gas-fired plants, whereas the average capacity loss for rental power plants was only 0.77 percent (Figure 16). This conclusion holds even when the analysis controls for other confounders such as age, capacity, and common regional and yearly shocks.



Source:Daily generation reports, BPDB, January 1, 2010–December 31, 2015
Note: IPP = independent power producer

Prioritizing efficient plants would increase electricity output and reduce unserved energy demand. During hours when there is no power shortage, this increase in production could replace output from uneconomical units such as plants using furnace oil or diesel. A simulation analysis shows that prioritizing more efficient plants in gas allocation would reduce idled gas capacity by 8.1 percent and reduce the electricity shortage by 15.2 percent a year (Figure 17). The use of uneconomical liquid fuel–based units would decline by 4 percent, which would also lead to a reduction in carbon dioxide emissions (Zhang, forthcoming).

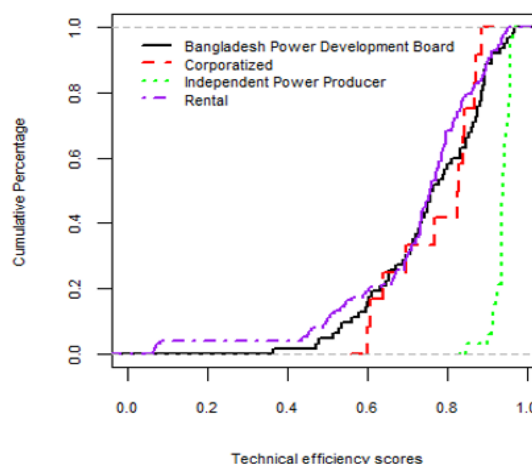


Source: Simulation based on daily reports, BPDB, January 1–December 31, 2014
Note: Figure shows data for part of the year 2014 (between the 5,150th and 5,550th half-hour). The pattern remains the same for the year as a whole.

Reducing inefficiency in electricity generation and distribution

Low generation efficiency is contributed to by inadequate incentive structure. Most generators in Bangladesh are paid under long-term power purchase agreements following rate-of-return regulation. Because generators are not fully exposed to market competition and costs are passed on to consumers, incentives to improve efficiency remain weak. Controlling for differences in plants' physical and technical characteristics (such as age, capacity, technology, location, and dispatch), an analysis reveals an efficiency gap between publicly-owned power plants and independent power producers (IPPs, Figure 18): Compared with an IPP, a gas plant owned by Bangladesh Power Development Board (BPDB) uses 29 percent more gas to produce the same amount of electricity, all else being equal (Zhang, forthcoming).

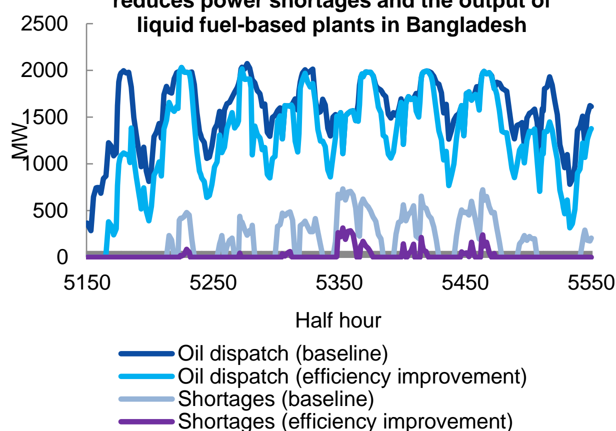
Figure 18: Efficiency of power plants in Bangladesh



Source: Estimated based on plant-level data, BPDB, Annual Report (2012–15).
Note: The technical efficiency score ranges between 0 and 1. It measures the ratio of actual output to maximum feasible output. BPDB = Bangladesh Power Development Board; IPP = independent power producer.

Improving generation efficiency would significantly reduce power shortages. If gas-based BPDB and rental units were to match the fuel efficiency of IPPs (after controlling for differences in physical and technological attributes), a simulation analysis shows that gas-based power generation would increase by 4.5 percent and power shortages would have been reduced by 49 percent in 2014 (Zhang, forthcoming). Meanwhile, the increase in output from gas units would allow liquid fuel-based units to be dispatched less often, reducing liquid fuel consumption by 10 percent (Figure 19).

Figure 19: Improving generation efficiency reduces power shortages and the output of liquid fuel-based plants in Bangladesh



Source: Simulation based on daily reports, BPDB, Jan 1–Dec 31, 2014

Electricity dispatch does not always follow a merit order in Bangladesh. A World Bank study finds that liquid fuel-based rental power plants are often dispatched before gas-based plants, despite an average cost for the former that is 5–12 times higher and an emission intensity that is from 30 to 600 percent greater (World Bank 2015). Technical constraints such as transmission congestion could contribute to out-of-merit dispatch.

Improving dispatch to ensure that the lowest-cost generators are used as much as possible before more expensive generators are brought online could significantly reduce the cost of power generation. The same World Bank study estimates that bringing dispatch to the optimal level would reduce production costs by 63 percent a year with no increase in gas consumption. Improving dispatch efficiency may require some training and investment—to introduce an automated dispatch model, for example, and to increase investment in transmission capacity to eliminate congestions that have prevented evacuation of lower-cost plants in certain locations. But the costs would be small compared with the potential savings.

Electricity is subsidized at both wholesale and retail level in Bangladesh. At the wholesale level, BPDB has sold electricity to distribution companies at a price below its purchase cost. At the retail level, electricity rates vary by consumer category and are subsidized for households and farmers. Electricity subsidies from government transfer reached $489 million in fiscal 2017, in the forms of subsidized cash loans and direct budgetary support (Ministry of Finance, Bangladesh 2018).

Reducing electricity subsidies would incentivize more efficient electricity consumption. Electricity subsidies can inflate demand for electricity and increase the fiscal burden on the government. They also limit the ability of BPDB to invest in expanding the electricity grid and improving the quality of electricity supply. Moreover, the subsidies are regressive. A World Bank study finds that households in the poorest quintile received only 9 percent of residential electricity subsidies in 2012, while those in the highest income quintile received 24 percent (Ahmed, Trimble, and Yoshida 2013).

Another distorting effect of current electricity pricing is that it encourages captive power generation, which is typically less efficient than utility-scale power stations in turning gas into electricity. Industrial and commercial users have at times been overcharged for electricity to compensate the lower rates for households and farmers. Such cross-subsidies have made self-generation less costly than grid electricity for large industrial and commercial users. For businesses, self-generation therefore makes economic sense. Indeed, captive power generation is the second-largest source of gas demand, accounting for 16 percent of gas consumption in fiscal 2016 (Petrobangla 2017). But captive power plants can exacerbate the gas crisis because these plants are typically less efficient than larger scale power stations.

Promoting cross-border electricity trade

Bangladesh could tap into the enormous potential for regional power trade to increase electricity supply cost effectively. Differences in seasonal patterns of energy supply and demand make a case for exchanging electricity across countries in South Asa. Studies have discussed the potential benefits of increased electricity connectivity within South Asia. Timilsina and others (2015) estimate that the potential gains from full regional trade in electricity in South Asia is about $9 billion annual fuel savings and a reduction of carbon dioxide emissions of about 8 percent.

Cross-border power trade has in recent years increased gradually, building confidence in commercial and operational arrangements, and setting the stage for tapping its large potential. Bangladesh imports about 600 MW, up from very little just a few years ago. Potential exists to tap India's market as well as the vast hydropower potential in Nepal and Bhutan in the future. Cross-border links have helped secure cost-effective and needed power supply. There is notably no trade yet with Nepal and Bhutan where there is enormous potential for hydropower, estimated at more than 40 gigawatts (GW) in Nepal alone.

While the ecosystem that supports cross-border electricity trade further develops, developing a strong domestic power sector is also needed to facilitate cross-border cooperation ad trade in electricity. Pricing, infrastructure and regulations that create a predictable environment for sector development can place the sector in an even strong position to manage larger trade flows.

Towards higher efficiency

Notwithstanding great strides in increasing electricity supply over the past decade, Bangladesh still faces enormous challenges in meeting rapidly increasing electricity demand, driven by a fast-growing economy. The government is trying to keep costs under control as it invests heavily in generation to address these challenges. In addition to those efforts, implementing energy sector reforms that target inefficiencies at different stages of power supply could boost supply while also limiting reliance on imported fossil fuels. This would not only help to reduce the direct cost of electricity generation, but also to avoid harmful emissions from fossil fuel-based generation. This is particularly the case for coal, the use of which is planned to increase.

The above analysis suggests the following actions as part of a comprehensive approach to improve electricity supply in Bangladesh:

1. **Pricing of domestic gas**. Rationalizing gas price would provide better incentive for upstream gas exploration and production, and incentivize efficient consumption downstream. Pricing gas at import parity levels could save Bangladesh an estimated $4.5 billion (2 percent of GDP) a year, which could also be spent promoting sustainable long-term growth of the economy (Zhang, forthcoming).
2. **Efficient allocation of gas.** Allocating gas based on transparent market rules rather than administrative orders could promote more productive use of gas. In the power sector, prioritizing gas allocation for more efficient plants could increase gas-based electricity generation, reduce unserved energy demand, and minimize the need for more expensive diesel and furnace oil-based plants.
3. **Incentive-based regulation of power plants.** In the absence of market competition, the use of incentive-based regulation can boost operational efficiency of power plants. The general idea is to link tariffs for plants with their performance measured by fuel efficiency or operating costs for example so that plants would be penalized for falling below some reasonable performance levels and rewarded for exceeding them.

4. **Merit-order based power dispatch.** An efficient dispatch system follows a merit order: At any given time, the system operator meets demand by taking electricity first from the least expensive power plants and then from the next less expensive ones, until all demand is met. By dispatching generation in merit order could save the economy an estimated $1.65 billion a year in fuel cost (World Bank 2015). Merit-based power dispatch could also serve as a powerful tool for monitoring plants' performance and encourage performance improvements.
5. **Pricing of electricity.** A cost-based pricing mechanism is essential for encouraging more efficient consumption, attracting private investment, and strengthening the financial position of distribution utilities so they have the resources needed to invest in and maintaining the grid.
6. **Investment on cross-border transmission capacity to promote greater regional power trade.** Bangladesh could tap into the regional power markets to increase electricity supply cost-effectively. Doing so requires investment on cross-border transmission interconnections.
7. **Accompany any price reforms with appropriate targeted social assistance.** Although price reforms can deliver large economic benefits in the long term, hikes in gas and electricity prices can cause immediate economic distress, especially for the poor and vulnerable. Raising prices gradually while providing targeted social assistance can mitigate the impacts. It is therefore important to assess potential poverty and social impacts before tariff reform. Offsetting price increases also requires rapid improvements in efficiency on both the supply and demand side. Many countries have aided low-income households to adopt energy conservation measures.

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Annex

Table 1: Contribution to Growth

	FY13	FY14	FY15	FY16	FY17	FY18
GDP Growth	**6.0**	**6.1**	**6.6**	**7.1**	**7.3**	**7.9**
	Contribution of Production Sectors (%)					
Industry	2.6	2.3	2.7	3.2	3.1	3.8
o/w Manufacturing	1.8	1.6	1.9	2.3	2.2	2.8
Services	2.9	2.9	3.0	3.2	3.4	3.2
Agriculture	0.4	0.7	0.5	0.4	0.4	0.6
Import duty	0.1	0.2	0.3	0.2	0.3	0.3
	Contribution of Expenditure Components (%)					
Consumption	**3.8**	**3.1**	**4.3**	**2.4**	**5.1**	**7.8**
Private consumption	3.5	2.7	3.8	2.0	4.7	7.0
Government consumption	0.3	0.4	0.4	0.4	0.4	0.8
Investment	**1.6**	**3.0**	**2.2**	**2.8**	**3.3**	**3.5**
Private Investment	0.4	2.2	1.5	2.5	2.0	2.2
Government Investment	1.2	0.8	0.8	0.3	1.3	1.3
Resource Balance	**0.2**	**0.4**	**-1.3**	**1.9**	**-0.9**	**-3.6**
Exports, goods & services	0.5	0.6	-0.5	0.4	-0.4	1.2
Imports, goods & services	0.3	0.3	0.7	-1.5	0.5	4.8
Statistical discrepancy	0.4	-0.4	1.3	0.0	-0.1	0.2

Source: Bangladesh Bureau of Statistics (BBS)

Table 2: Bangladesh Current Macro Economic Indicators

	FY16	**FY17**	**FY18**	**FY19 (Projection)**	**FY19 July**	**FY18 July**
GDP Growth (%)	7.1	7.3	7.7	7.00	..	
Inflation	5.9	5.4	5.8	6.7	5.5	5.6
Export Growth (%)	2.2	-2.3	4.5	4.9	19.9	17.9
Import Growth (%)	-7.1	2.9	20.6	10.1		
Remittance Growth (%)	-2.5	-14.5	17.1		18.2	10.9
Current Account Balance (US$ million)	4262	-1331	-9780	-9470		
Overall Balance of Payments (US$ million)	5050	3169	-885	2476		
Reserves (Months of Import)	7.8	8.0	6.2	6.4		
Exchange Rate (Taka per Dollar)	78.3	79.1	84.1	89.3		
Total Revenue (% of GDP)	10.0	10.2	10.6	11.4		
Total Expenditure (% of GDP)	13.8	13.2	15.1	16.0		
ADP (% of GDP)	4.6	4.3	5.3	5.5		
Fiscal Deficit (% of GDP)	3.8	3.1	4.5	4.5		
ADP Utilization (% of ADP allocation)	91.8	88.5	95.4		0.5	0.5
M2 Growth (%)	16.3	10.9	9.2	15.2	9.6	10.5
Growth of Credit to Public Sector (%)	2.6	-12.0	-0.5	8.5	3.9	-15.3
Growth of Credit to Private Sector (%)	16.8	15.7	16.9	16.8	15.9	16.9

[1] Projections are based on World Bank and government estimates
All growth rates are year-on-year
Source: Bangladesh Bank, Bangladesh Bureau of Statistics, Export Promotion Bureau, Ministry of Finance and WB staff estimate

Table 3: Bangladesh Macroeconomic Indicators

Description	FY13	FY14	FY15	FY16	FY17	FY18
GDP Growth Rates and Per Capita Income						
GDP Growth (%, 2005-06 base year)	6.0	6.1	6.6	7.1	7.3	7.9
GDP Growth Per Capita (%)	4.8	4.8	5.4	5.9	6.1	6.7
Per Capita GDP (current US$)	954.8	1086.8	1212.2	1358.9	1514.6	1652.8
Per Capita GNI (current US$)	1031.6	1159.2	1290.9	1437.1	1579.6	1728.2
Per Capita GDP (US$, official estimate)	976.0	1110.0	1236.0	1385.0	1544.0	1675.0
Per Capita GNI (US$, official estimate)	1054.0	1184.0	1316.0	1465.0	1610.0	1751.0
Per Capita GDP Atlas Method (US$)	935.4	1009.3	1116.0	1255.4	1422.2	1596.2
Per Capita GNI Atlas Method (US$)	1010.7	1076.5	1188.4	1327.7	1483.4	1669.0
Inflation						
Rate of Inflation (CPI, %) (year on year)	6.8	7.3	6.4	5.9	5.4	5.8
Inflation (GDP deflator)	7.2	5.7	5.9	6.7	6.3	5.6
Saving & Investment (% of GDP)						
Gross Domestic Saving	22.0	22.1	22.2	25.0	25.3	22.8
Gross National Saving	30.5	29.2	29.0	30.8	29.6	27.4
Private Investment	21.7	22.0	22.1	23.0	23.1	23.3
Of which: FDI	1.2	0.8	0.9	0.6	0.7	0.6
Public Investment	6.6	6.6	6.8	6.7	7.4	8.0
Central Govt. Budget (% of GDP)						
Total Revenue	10.7	10.4	9.6	10.0	10.2	10.6
Total Expenditure	14.5	13.8	13.5	13.8	13.6	15.1
Overall Budget Deficit	3.8	3.6	3.9	3.8	3.5	4.5
Balance of Payments (% of GDP)						
Trade (merchandize export + merchandize import)	40.1	38.4	35.0	33.1	31.0	32.9
Exports	17.7	17.2	15.7	15.1	13.6	13.1
Imports	22.4	21.2	19.3	18.0	17.4	19.7
Services & Income (net)	-3.7	-3.9	-3.1	-2.1	-2.1	-2.5
Current Transfers	9.9	8.6	8.1	6.9	5.3	5.6
Current Account Balance (including transfers)	1.6	0.8	1.5	1.9	-0.5	-3.5
Public Debt and official reserves						
Total Debt as % of GDP	32.1	31.7	31.8	31.5	30.6	31.2
External Debt (US$ b.)	22.4	24.4	23.9	26.3	28.3	33.0
External Debt as % of GDP	14.9	14.1	12.2	11.9	11.3	12.0
Gross Reserves (US$ b.) (end of period)	15.3	21.3	25.0	30.1	33.7	32.8
Gross Reserves (in months of imports)	5.5	5.8	7.0	7.9	8.0	6.2
Money and Credit						
M2 Growth (%, year-on-year)	16.7	16.1	12.4	16.3	10.9	9.2
Net Domestic Asset Growth (%, year-on-year)	11.8	10.3	10.7	14.2	9.8	12.8
Ratio of Private Sector Credit to GDP (%)	37.7	37.8	37.9	38.7	39.3	40.3
Exchange Rate						
Nominal Period Average (TK/US$)	79.9	77.7	77.7	78.3	79.1	81.6
Nominal End of Period (TK/US$)	77.8	77.6	77.8	78.4	80.6	82.8

Real Effective Exchange Rate-REER Index, 2010=100	98.5	106.9	119.6	131.8	139.0	133.1
Memorandum Items						
GDP at Current. Prices (Taka bill.)	11989.2	13436.7	15158.0	17328.6	19758.2	22504.8
GNI at Current. Prices (Taka bill)	12953.5	14332.2	16142.0	18326.7	20607.2	23531.1
GNI at Current. Prices Atlas Method (US$ bill)	158.3	171.2	191.3	216.3	244.6	278.5
GDP at Current. Prices Atlas Method (US$ bill)	147.0	160.5	179.7	204.5	234.5	266.3
GDP at Current. Prices (US$ bill)	150.1	172.9	195.2	221.4	249.7	275.8
GNI at Current Prices (US$ bill)	162.1	184.4	207.8	234.1	260.5	288.4
Population (mill.) *	157.2	159.1	161.0	162.9	164.9	166.9
Population growth Rate	1.2	1.2	1.2	1.2	1.2	1.2

Source: Bangladesh Bureau of Statistics, Bangladesh Bank, Ministry of Finance, The World Bank and IMF

* Population data is from DECPG.