ISSN 1817-9959

CENTRAL BANK OF
TRINIDAD & TOBAGO

Monetary Policy Report

May 2019

Volume XX Number 1

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The Central Bank of Trinidad and Tobago conducts monetary policy geared towards the promotion of low inflation and a stable foreign exchange market that is conducive to sustained growth in output and employment. This Report provides an account of how monetary policy actions support this objective, in light of recent economic developments.

Monetary Policy Report

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Part I – Overview and Outlook

Overview

Global economic growth has continued to lose momentum since the last Monetary Policy Report (MPR) in November 2018. According to the International Monetary Fund's (IMF) April 2019 World Economic Outlook (WEO), global growth in the latter half of 2018 continued to be impacted by trade tensions, lower consumer spending and business investment, tighter financial market conditions, and weak commodity prices. Among advanced economies (AEs), economic activity in the United Kingdom (UK) has been subdued due to lacklustre business and consumer spending. Similarly, economic activity in the Euro Area was impacted by weakened consumer and business sentiment particularly in Germany and Italy. The Japanese economy, which was impacted by a series of natural disasters in the summer of 2018, experienced only modest growth since the latter part of 2018. However, economic activity remained robust in the United States (US), supported by personal consumption expenditure, non-residential fixed investment and net exports.

Economic growth in emerging market and developing economies (EMDEs) was hindered by worsening financial market sentiment and country-specific factors. China has been negatively impacted since mid-2018 by trade tensions and weakening domestic demand while economic activity in India moderated due to lower consumer demand, fixed investment, and government spending. Similarly, activity in Brazil eased on account of reduced fixed investment, household consumption, and government spending. However, growth in Russia reflected good outturns in several sectors, such as services and mining. Growth in the Latin America and Caribbean (LAC) region remained subdued as a result of Argentina's currency crisis, political uncertainty in Brazil and worsening conditions in Venezuela. In the Caribbean, Jamaica experienced moderate growth stemming from both the goods-producing and services sectors in the final quarter of 2018. In Guyana, expansions in the bauxite, livestock and construction sectors boosted growth in 2018. However, in Barbados output growth suffered from fall-offs in construction and other non-traded sectors in early 2019.

Following some tightening in the latter part of 2018, global monetary and financial conditions have eased since the beginning of 2019 as major central banks have kept monetary policy unchanged or have implemented further accommodation measures. The US Federal Reserve (the Fed) maintained its federal funds rates in May and June 2019 in light of continued growth in household spending and consistent job gains. In May, the Fed had signalled a pause in interest rate hikes and a gradual slowing of its balance sheet unwind for the rest of 2019. The European Central Bank (ECB) kept its policy rate unchanged in June 2019 to ensure convergence to its medium-term inflation target, while the Bank of England (BoE) held its bank rate steady at its latest meeting in the face of low inflation and subdued economic activity. Japan also maintained its key policy rate in June 2019 as economic activity moderated. Within the EMDEs, the People's Bank of China (PBoC) reduced its required reserve ratio in early 2019 in order to boost lending and cushion the economic slowdown. The Reserve Bank of India (RBI) made its third consecutive rate cut in June 2019, effectively switching from a neutral to an accommodative stance in response to a deteriorating economic outlook. Most of the major Latin American economies kept benchmark rates unchanged at their most recent meetings in light of subdued economic growth.

Energy prices displayed positive trends over November 2018 to May 2019. Strong seasonal demand over the winter months accounted for the rise in gas prices (7.5 per cent year-on-year) to US$3.16/million British Thermal Units (mmbtu) over the period. Regarding crude oil, an oversupplied market, coupled with slower than anticipated demand, resulted in a drop in prices from US$70.2 per barrel (bbl) West Texas Intermediate (WTI) in September 2018 to US$49/bbl in December 2018. Since the start of 2019, crude prices have recovered (on a month-on-month basis) to reach US$60.84/bbl in May

2019, driven by production cuts by OPEC (Organisation of Petroleum Exporting Countries) and its allies and US sanctions against Venezuela. Over the seven-month period, however, crude oil prices declined (10.1 per cent year-on-year) from US$62.78 per barrel (bbl) West Texas Intermediate (WTI) to US$56.42/bbl.

Domestically, there is evidence of an energy-led recovery in economic activity in 2018. The boost to natural gas output from the Juniper project positively affected downstream production of petrochemicals and liquid natural gas (LNG). At the same time, toward the end of the year, refining output fell substantially as a result of the closure of the Petrotrin refinery. There were also maintenance-related production stoppages at some petrochemical plants in the final quarter of 2018. More recent information shows that natural gas production rose further in the first two months of 2019 with the coming on stream of new gas from the Angelin platform. LNG and petrochemicals output also increased while crude oil production continued to decline owing to mature acreage. The spillover from the energy to the non-energy sectors appeared to be slow and somewhat uneven in 2018, however, based on available data. For example, in the last quarter, the finance, insurance, real estate and other businesses sector as a whole grew marginally, supported by an uptick in commercial banking, despite slow activity in the insurance and real estate sub-sector. Recent data for the first quarter of 2019 show an increase in local sales of cement suggesting a possible pick-up in activity in the construction sector related to key capital projects, particularly government infrastructure works.

The latest data available indicate an increase in the unemployment rate to 4.8 per cent in 2017. The labour market participation rate also declined as some people opted to leave the job market perhaps as a result of difficulty in obtaining employment. More recent data point to a year-on-year rise in retrenchment notices filed with the Ministry of Labour and Small Enterprise Development in 2018 and early 2019, which suggest a further slackening of labour market conditions.

Inflation continues to be low and stable in early 2019 owing to low international food prices and slow demand locally. Headline inflation stood at 1.2 per cent (year-on-year) in May 2019 with core inflation measuring 1.2 per cent. Core inflation, however, accelerated slightly in March 2019 mainly due to faster price increases in the health sub-index while higher mobile phone prices pushed up the communication sub-index. Additionally, the alcoholic beverages and tobacco sub-index increased. Food inflation remained subdued, measuring 1.1 per cent due to persistent declines in fruit prices.

During the first half of fiscal year (FY) 2018/19, the outturn on the Central Government's accounts was a deficit of $1.9 billion, much lower than the corresponding period one year earlier ($3.1 billion). Central Government revenue rose in the review period owing to higher natural gas prices and higher non-tax revenue. Central Government expenditure increased over the six-month period reflecting higher outlays for transfers and subsidies, wages and salaries, and goods and services. There was also higher spending on capital projects. Recent data point to a public debt-to-GDP ratio of 61.9 per cent at end-April 2019, slightly higher than end September 2018 on account of borrowing from both domestic and external sources.

Since the last Monetary Policy Report in November 2018, the Bank kept the repo rate constant at 5.00 per cent at its two monetary policy meetings in December 2018 and March 2019. At the March meeting the Monetary Policy Committee (MPC) noted that the inflation rate was low and stable, but also that the energy sector had slowed since the last quarter of 2018. Furthermore, the non-energy sector had displayed a general steadiness with marked improvements in some sub-sectors. Externally, the Fed signalled a pause in monetary tightening which had helped to slow the further negative movement of the US-TT short-term interest rate differentials.

The Bank has continued to conduct open market operations in light of changing market conditions. Lower fiscal injections over November 2018 to May 2019 relative to the previous seven-month period (April to October 2018) resulted in the Bank injecting a net amount of $4.2 billion in liquidity into the financial system through net maturities of OMOs. Furthermore, sales of foreign exchange by the Central Bank to authorised dealers indirectly withdrew liquidity from the system. Liquidity levels over the period were lower compared to the prior seven-month period, which led to in a rise in daily inter-bank borrowing; however, the interbank rate remained unchanged. Meanwhile, the 3-month TT-US interest rate differential, which remained below parity, narrowed slightly in May 2019 as compared to November 2018.

Consolidated private sector credit, which had been expanding moderately in 2018, dipped in March 2019. Consumer and real estate mortgage lending supported private sector credit; however, growth in lending to businesses was subdued during 2018 and turned negative in early 2019. The growth in consumer credit has been supported by boosts in lending for debt consolidation and refinancing. Additionally, credit card lending remains a strong category of consumer lending, while borrowing for the purchase of motor vehicles continues to decelerate. On the other hand, real estate mortgage lending has been sustained by falling interest rates, but business lending, which had improved marginally by the end of 2018, has declined thus far in 2019 despite early signals of a stabilising non-energy sector.

The local foreign exchange market remained tight despite an increase in authorised dealers' foreign currency purchases from the public. Over November 2018 to May 2019, both purchases and sales of foreign exchange by authorised dealers increased when compared to the corresponding period a year earlier. Energy sector inflows were responsible for approximately 70.0 per cent of the total purchases from the public. On the other hand, the retail and distribution sector, and credit cards, absorbed the majority of foreign currency sales. Furthermore, sales of foreign currency to energy companies rose over the seven-month period as new institutional arrangements were being finalised regarding the companies that replaced Petrotrin following the closure of the refinery. The excess of total sales over total purchases over the period amounted to US$1,030.5.5 million and the Central Bank sold US$826.0 million to authorised dealers. In May 2019, the monthly weighted average selling rate stood at US$1 = TT$6.7819, a slight depreciation from US$1 = TT$6.7813 in November 2018.

Outlook

Global economic growth is expected to decelerate in 2019 based on the drag from the US-China tariff impositions and the lingering effects of recent financial market pressures on some large EMDEs. According to the IMF's April 2019 WEO, world growth is expected to slow further to 3.3 per cent in 2019 and pick up modestly to 3.6 per cent in 2020. Activity in both AEs and EMDEs should slow in 2019 but LAC is expected to continue to recover over the medium term, supported mainly by a pick-up in private consumption and investment growth. Several downside risks to global growth remain, such as an escalation of the on-going trade dispute between the US and China, a "no deal[1]" withdrawal of the United Kingdom from the European Union (Brexit), and a faster-than-envisioned economic slowdown (hard-landing) in China.

International crude oil prices will continue to be influenced by supply side factors, namely US sanctions on select producers and OPEC-led production cuts in 2019. Natural gas prices are expected to gain momentum in the second half of 2019 as seasonal factors could result in intensified demand.

The domestic economy is again expected to gain impetus from developments in the energy sector. Over the short term, Trinidad and Tobago is expected to benefit from higher energy sector production on account of new capacity from the Angelin field, which was brought online in February 2019. Natural gas output will improve with knock-on impacts on LNG, NGLs and petrochemicals. However, crude oil production is expected to continue to decline given the mature acreage in the domestic basin. The outlook for the non-energy sector is linked to the anticipated fiscal stimulus in the second half of the current financial year, including on announced road and other infrastructure projects.

Inflationary conditions will likely remain contained over the short term. Domestic demand is not anticipated to pick up sharply and, although international food

[1] A "no deal" Brexit is a scenario where the UK and the European Union have not ratified a Withdrawal Agreement by 12 April 2019. This is likely to lead to a period of uncertainty, however, in this situation Contingency Action Plans will apply.

prices have risen since the end of 2018, further increases are expected to be measured during 2019. However, prices may accelerate mildly given that some fiscal and infrastructural measures could provide upward impetus.

Trinidad and Tobago's overall external accounts are expected to remain in deficit in 2019. However, growth in the current account is expected to be driven by increasing global energy prices and higher external demand based on improvements in economic performance among several major trading partners. Furthermore, developments within the energy sector in 2019, namely the start-up of the Angelin platform in the first quarter, could underpin an improved current account surplus.

Monetary policy would have to carefully balance domestic and external conditions. Considerations include the need to support greater vibrancy in the domestic economy against the backdrop of muted inflation and possible surges in liquidity associated with higher net domestic fiscal injections as capital spending accelerates. On the external front, the unsettled state of global energy markets adds a degree of uncertainty to anticipated foreign exchange inflows, while the situation in neighbouring Venezuela can have important short term financial costs to Trinidad and Tobago depending on the scale of associated migration. At the same time, the pause in interest rate hikes by the US Federal Reserve has eased the pressure on Trinidad and Tobago and emerging markets in general for defensive rate increases. All in all, the conduct of monetary policy for the rest of 2019 will remain a delicate balancing act and must be calibrated against potentially fast moving domestic and international developments.

Table Ia: Trinidad and Tobago: Summary Economic Indicators for 2017-2019

	2017	2018	Jan - May 2018	Jan - May 2019
Real Sector Activity				
Gross Domestic Product (GDP)[1]				
GDP at Current Market Prices (TT$ Billions)	150.8	158.5	n.a.	n.a.
Real GDP Growth (%)	-1.9	1.9	n.a.	n.a.
Energy Sector				
Total Depth Drilled (metres)	121,396.4	110,181.5	15,937.7*	9,509.5*
Crude Oil Production (b/d)	71,839.4	63,533.3	69,323.5*	59,020.5*
Crude Oil Exports (000 bbls)	9,971.7	8,047.0	1,641.8*	3,662.1*
Refinery Throughput (b/d)[1]	130,788.8	118,617.2	129,108.0*	-
Natural Gas Production (mmcf/d)	3,356.2	3,585.1	3,743.5*	3,798.0*
Natural Gas Utilisation (mmcf/d)	3,178.0	3,378.0	3,499.5*	3,614.0*
LNG Production (000 cubic metres)	25,072.8	28,449.5	9,756.6**	9,721.4**
Fertiliser Production (000 tonnes)	5,595.0	5,431.1	933.7*	985.8*
Fertiliser Exports (000 tonnes)	5,140.8	4,924.3	788.3*	935.5*
Methanol Production (000 tonnes)	4,974.9	5,081.3	849.0*	901.8*
Energy Commodity Price Index (ECPI) (Jan 2007 = 100)	83.5	99.0	96.7**	87.8**
Non-Energy				
Local Sales of Cement (000 tonnes)	497.3	483.8	119.3***	122.8***
New Motor Vehicle Sales	14,153.0	13,815.0	47,68.0**	43,66.0**
Average Daily Job Vacancy Advertisements	451.0	357.0	388.0**	351.0**
Prices (Average)				
Year-on-Year Per Cent Change				
Producer Prices	1.9	-0.3	-0.6***	0.2***
Headline Inflation	1.9	1.0	0.9**	1.3**
Food Inflation	2.9	1.1	2.5**	0.2**
Core Inflation	1.6	1.0	0.6**	1.5**
Monetary (End of Period)				
Year-on-Year Per Cent Change				
Private Sector Credit	4.6	4.3	5.9 ^	3.5 ^
Consumer Lending	5.1	6.0	6.5 ^	6.0 ^
Business Lending	1.3	0.2	3.8 ^	-4.3 ^
Real Estate Mortgages	8.0	6.6	7.7 ^	8.8 ^
M-1A	-3.0	2.2	-1.7 ^	0.8 ^
M-2	-2.1	3.1	-0.8 ^	2.4 ^
Commercial Banks' Daily Average Excess Reserves (TT$ millions)	3,060.6	3,254.3	2,571.2	2,791.4
TT 91 day Treasury Bill Rate (End of Period; Per Cent)	1.21	1.30	1.18	1.25
Fiscal (October-September)				
Overall Fiscal Balance (TT$ Millions)	-13,531.4r	-5,351.6p	-3,136.7 ^	-1,850.9 ^
Overall Fiscal Balance to GDP	-9.1	-3.4	n.a.	n.a.
Financial Stability - Commercial Banks				
Non-Performing Loans (Per Cent)	2.9	3.1	3.2 ^	3.0 ^
Capital Adequacy Ratio (Per Cent)	21.0	20.9	22.2 ^	21.9 ^
Capital Market				
Composite Price Index (1983 = 100; end of period)	1,266.4	1,302.5	1,247.1	1,355.3
Volume of Shares Traded (millions)	84.6	72.3	29.8	29.1
Mutual Funds Under Management (Billions)	43.2	44.3	43.0 ^	45.3 ^
External				
US$ Millions				
Authorised Dealers Sales of Foreign Exchange to Public	5,195.3	5,677.4	2,254.5	2,559.0
Authorised Dealers Purchases of Foreign Exchange from Public	3,606.9	4,101.4	1,588.8	1,812.2
CBTT Sales to Authorised Dealers	1,816.0	1,501.0	645.0	610.0
Net Official Reserves (End of Period)	8,369.8	7,575.0	7,965.4	7,150.6

Sources: Central Bank of Trinidad and Tobago, Central Statistical Office, Trinidad and Tobago Stock Exchange and Ministry of Energy and Energy Industries

1 GDP at current market prices and real GDP growth are sourced from the Central Statistical Office (CSO).
2 Petrotrin's Refinery was closed in November 2018.
* For January-February.
** For January-April.
*** For January-March.
^ As at March.
^ ^ For October - March.
r Revised.
p Provisional.
n.a. Not Available.

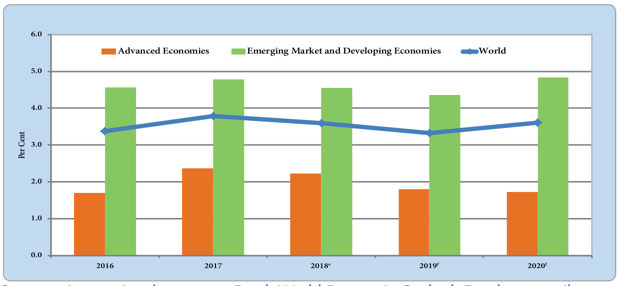
Part II – International and Regional Monetary Policy Developments

Global economic growth slowed in 2018, underpinned by a deceleration in trade and investment amid prolonged trade policy tension and tariff hikes, tighter financial market conditions and weaker-than-expected outturn in commodity prices. The International Monetary Fund (IMF), in its April 2019 World Economic Outlook (WEO), estimated an expansion in global growth of 3.6 per cent in 2018, slower than 3.8 per cent one year earlier **(Chart IIa)**. *Although growth momentum remained robust in the United States (US), economic activity was fragile in other major advanced economies (AE) such as the United Kingdom (UK) whose economic performance in 2018 was the weakest since the second quarter in 2012. Real GDP growth stalled in emerging market and developing economies (EMDEs) driven by worsening global financial market sentiments. Meanwhile, real GDP growth in the Latin America and Caribbean (LAC) region remained subdued during 2018. Inflation rates among several of the AEs and EMDEs remained modest while rates in the LAC region were generally contained.*

Advanced Economies

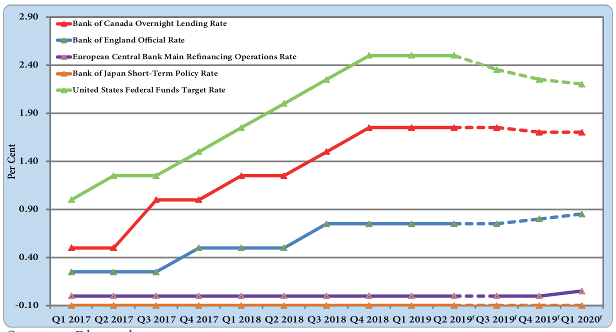
In June 2019, the US Federal Reserve (the Fed) maintained its federal funds range at 2.25 to 2.50 per cent amidst continued growth in household spending, consistent job gains in several industries and persistently low inflation **(Chart IIb)**. Before that, in May, the Federal Open Market Committee (FOMC) indicated that it will be patient about future adjustments to the target for the federal funds rate, as well as signalled the gradual slowing of the unwinding of its balance sheet this year. Economic growth in the US expanded by 3.2 per cent (year-on-year) in the first quarter of 2019 on account of increased contributions from personal consumption expenditures, private inventory investment, non-residential fixed investment and net exports **(Chart IIc)**. Meanwhile labour market conditions improved, reflective of a lower unemployment rate[2] and increasing average weekly earnings in early 2019.

Chart IIa:
Global Growth: Real GDP
(Annual Per Cent Change)



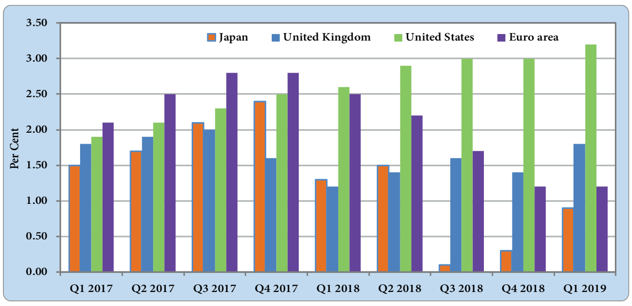
Source: International Monetary Fund, World Economic Outlook Database, April 2019

Chart IIb:
Selected Advanced Economies – Policy Rates
(Per cent)



Source: Bloomberg

Chart IIc:
Selected Advanced Economies - Real GDP Growth
(Year-on-Year Per cent Change)



Source: Bloomberg

[2] The unemployment rate was unchanged at 3.6 per cent in May 2019 from the previous month while average weekly earnings on private non-farm payrolls increased by 6 cents to $27.83 in May 2019 from the previous month.

Against the backdrop of below-target inflation and subdued economic activity, the Bank of England (BoE) held the bank rate at 0.75 per cent and maintained the stock of sterling non-financial investment-grade corporate bond purchases at £10.0 billion (US$13.1 billion) and the stock of UK government bond purchases at £435.0 billion (US$569.9 billion) in May 2019. Higher household consumption, government spending, and fixed investment were largely responsible for the below-potential expansion of 1.8 per cent (year-on-year) in the UK economy in the first quarter of 2019. More recently, the UK's inflation rate measured 1.9 per cent in May 2019, below the target of 2.0 per cent **(Chart IId)**.

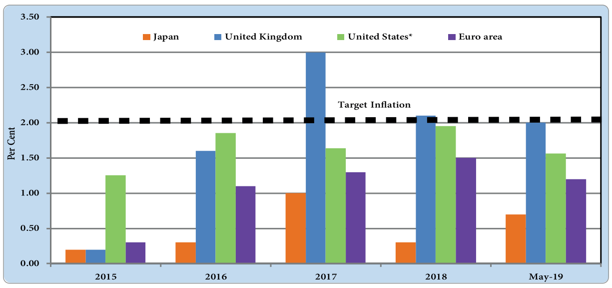
Meanwhile, the ECB maintained its benchmark refinancing rate at 0.0 per cent as inflation trended downward. In addition, the Governing Council of the ECB expects the key interest rates to remain at their present levels, at least through the summer of 2019, to ensure convergence to or around its medium-term inflation target of 2.0 per cent. In addition, from September 2019, a new series of quarterly, targeted longer-term refinancing operations (TLTRO III) will be launched. Economic growth in the Euro Area slowed to 1.2 per cent in the first quarter of 2019, compared with growth of 2.4 per cent in the similar quarter of 2018. In May 2019, Euro Area inflation rate was recorded at 1.2 per cent, lower than the previous month's rate of 1.7 per cent due to a slowdown in prices relating to services, energy, and food and alcohol and tobacco.

The moderate expansion in Japan's economic activity prompted the Bank of Japan (BoJ) to maintain its key short-term interest rate at -0.1 per cent and the target for the 10-year government bond yield at around 0.0 per cent. More recent data for the Japanese economy show an expansion of 0.8 per cent (year-on-year) in the first quarter of 2019, supported by external demand. However, inflation remained stubbornly low at 0.7 per cent (year-on-year) in May 2019.

Emerging Market and Developing Economies

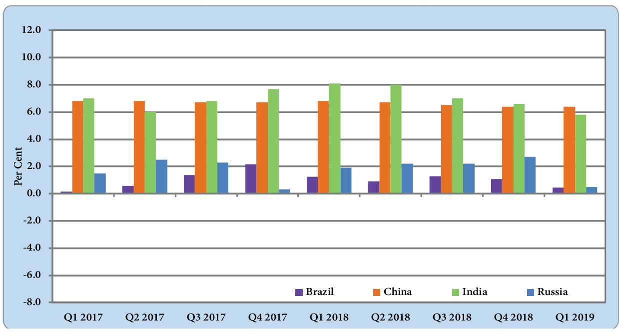
In order to boost lending and cushion the effects of an economic slowdown, the People's Bank of China (PBoC) reduced its required reserve ratio by a 100 basis points (in two equal stages) in January 2019. The Chinese economy continues to grapple with the US tariffs on its exports and weakening domestic demand. Economic activity is also being impacted by regulatory measures aimed at forestalling shadow financial intermediation. Real GDP growth in China expanded by 6.4 per cent (year-on-year) in the first quarter of 2019, amid an increase in industrial output and strengthening consumer demand **(Chart IIe)**. Meanwhile, higher food price increases in China in May 2019 resulted in an acceleration of the year-on-year inflation rate to 2.7 per cent, but this was still below the target rate[3] of 3.0 per cent.

Chart IId:
Selected Advanced Economies – Headline Inflation
(Year-on-Year Per cent Change)



Source: Bloomberg
* Core PCE Price Index.

Chart IIe:
BRICS Countries – Quarterly Real GDP Growth
(Year-on-Year Per cent Change)



Source: Bloomberg

[3] Central Bank inflation target rates and ranges for selected Emerging Market and Developing Economies: China (3.0 per cent), Russia (4.0 per cent), Brazil (4.25 +/-2.5 per cent), India (4.0+/-2.0 per cent).

In response to a worsening economic outlook, the Reserve Bank of India (RBI) cut its benchmark rate in June by 25 basis points to 5.75 per cent, bringing total rate cuts to 75 basis points for 2019. Amid weaker consumer demand and fixed investment, India's economic growth slowed further in the first quarter of 2019 to 5.8 per cent, the lowest rate since 2014. Meanwhile, inflation, at 3.2 per cent (year-on-year) in May 2019, remained below the midpoint of the RBI's target range of 4.0 per cent.

Brazil's high degree of economic slack, reflected in its low industrial capacity utilisation indices and the unemployment rate, prompted the Central Bank of Brazil to maintain its SELIC rate at its historic low of 6.5 per cent in May 2019. The decision also took into account the convergence of inflation towards its target rate. Real GDP eased to 0.5 per cent (year-on year) in the first quarter of 2019 due to a slowdown in household consumption and fixed investment. Brazil's inflation rate decreased marginally to 4.7 per cent (year-on-year) in May 2019 primarily due to lower consumer prices of food, non-alcoholic beverages and transport.

Most of the major economies in the Latin American region kept benchmark interest rates unchanged in early 2019 amid subdued economic growth **(Table IIa)**.

The Caribbean

In an effort to support inflation returning within the target range of 4.0 to 6.0 per cent, the Bank of Jamaica (BOJ) reduced its policy interest rate by 25 basis points to a historic low of 1.25 per cent in March 2019. The reduction of the interest rate is aimed at stimulating a pick-up in private sector credit and economic activity. The BOJ expects that inflation will continue to fall below the target range at various points over the next eight quarters in the context of low core inflation and large seasonal fluctuations in agricultural prices. According to the Statistical Institute of Jamaica, the domestic economy grew by 2.0 per cent over the final quarter of 2018, owing to increased production in both the Services Industries and Goods Producing Industries.

Economic growth in Guyana is estimated to have expanded by 4.1 per cent in 2018 supported by growth in bauxite, livestock and construction. Meanwhile, the economy's inflation rate accelerated to 1.4 per cent (year-on-year) in February 2019 on account of increasing food prices. Barbados' twelve-month moving average rate of inflation slowed to 2.5 per cent in March 2019 compared to 4.7 per cent for the same period in 2018. Real GDP growth in Barbados contracted by 0.2 per cent (year-on-year) in the first quarter of 2019 as the moderate gains in tourism were outweighed by the fall-off in construction, and other non-trade sectors.

Table IIa: Selected Key Central Bank Policy Rates in the Region (Per Cent Per Annum)

	Current Rate[1]	Last Change	Amount of Change
Chile	2.50	Jun. 2019	-0.50
Colombia	4.25	Apr. 2018	-0.25
Peru	2.75	Mar. 2018	-0.25
Mexico	8.25	Dec. 2018	+0.25
Brazil	6.50	Mar. 2018	-0.25

Sources: Banco Central de Chile, Banco Central de Colombia, Central Reserve Bank of Peru, Banco de Mexico and Banco Central do Brasil.

1 As at June 24, 2019.

Box 1

The Implications of an Inverted US Treasury Yield Curve for US Economic Outlook and Monetary Policy in Trinidad and Tobago

The Treasury yield curve has often been seen by economists and other financial market participants as an indicator of future economic activity, inflation and interest rates. More specifically, an inverted[1] yield curve is often considered a harbinger of recession. This phenomenon was highlighted in a number of studies, such as Estrella and Mishkin (1995)[2]; Estrella and Trubin (2006)[3]; and Wright (2006)[4], who determined that the spread between the 3-month and 10-year US Treasury rates can be useful in macroeconomic forecasting since a negative differential exhibits a positive statistical relationship with recessions. Historically, the slope of the US yield curve displayed an inversion in the months prior to a recession **(Figure 1)**. The 1990s recession caused by the savings and loan crisis, and the 2001 recession triggered by the Dot-com crash, were both foreshadowed by a 3-month and 10-year Treasury rate inversion roughly six months before. Additionally, the global financial crisis in 2007, prompted by the sub-prime mortgage crisis, occurred roughly nine months after an inversion of the Treasury curve. Given these occurrences, the inversion which occurred in March, May , and June 2019 has prompted concerns about another pending recession in the US. These fears are also somewhat reflected in the NY Federal Reserve and Bloomberg recession probability indices[5] **(Figure 2)** which both show upticks in the probability of a recession during 2019 and 2020.

Previously, US Treasury curve inversions often occurred in response to excessively high inflation which prompted the Fed to raise the federal funds rate to slow growth. Monetary policy tightening would therefore act to reduce overheating in the economy, resulting in reduced expectations of future inflationary pressures, and consequently inverting the yield curve. However, economic growth in the US currently remains at around 3.0 per cent while inflation continues to be below the 2.0 per cent target. In light of this, the reasons for the inversion and rise in the recession indices might instead be rooted in weak economic data worldwide and the anticipation of lower global growth. Additionally, major issues such as trade policy uncertainty, China's economic slowdown, Brexit uncertainty, tighter financial conditions, and weaker commodity prices have dampened the medium-term outlook.

These conditions increase the potential for a sharp decline in market sentiment which could trigger portfolio reallocations away from risky assets and into safer long-term US treasuries, resulting in a fall in the long-term yields. Furthermore, short-term treasury rates have been steadily increasing, reflecting the consistent quarterly increase in the federal funds rate since December 2017. As a result, the conflicting movements of the short-and long-term treasuries flattened the curve before transitioning into an inversion.

Given these issues, what could be the implication for the US? Uncertainty surrounding US-China trade policy persist; negotiations with respect to Brexit have also run into substantial delays and may continue to place pressures on the UK economy; and further slowing of the global economy will continue to place downward pressures on long-term US yields as investors seek safer instruments. On the other hand, global economic deceleration may cause major central banks to become dovish and pause monetary policy tightening. At its May 2019 press conference[6], the Fed reiterated these risks; nonetheless, they mentioned that these concerns have moderated somewhat because of accommodative shifts in monetary and fiscal policy in some economies. However, in a more recent speech, Fed Chairman Jerome Powell pointed to the uncertainty surrounding trade negotiations, and suggested that the Fed "will act as appropriate to sustain the expansion". In light of the recent volatility in financial markets stemming from the trade tensions, and considering that the Fed is expected to remain accommodative and supportive of the expansion, a rate cut seems plausible during the second half of 2019 **(Figure 3)**.

As US inflation remains well contained, the Fed will have some room to intervene and reduce short-term rates if trade tensions continue to place downward pressures on economic conditions. Additionally, given that weak global economic conditions remain a concern, financial markets may continue to seek safer US long-term securities, placing downward pressures on the longer term US yields. However, it is unlikely that the US Treasury curve will continue to display an inversion for an extended period, as a potential rate cut may be on the cards for the Fed. With respect to monetary policy in Trinidad and Tobago, the economic circumstances surrounding the US and the dovish sentiments of monetary authorities could reduce the negative short-term yield differentials while possibly widening the longer-term differentials in favour of the domestic economy. This may assist in limiting capital outflows and in reducing foreign exchange market pressures.

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[1] A yield curve inversion occurs when the yields on long-term treasuries fall below the yields on short-term treasuries.

[2] Estrella, Arturo, and Frederic S Mishkin. 1995. "Predicting U.S. Recessions: Financial Variables as Leading Indicators." National Bureau of Economic Research - Working Paper Series.

[3] Estrella, Arturo, and Mary R. Trubin. 2006. "The Yield Curve as a Leading Indicator: Some Practical Issues." Current Issues in Economics and Finance (Federal Reserve Bank of New York) 12, no. 5.

[4] Wright, Jonathan H. 2006. "The Yield Curve and Predicting Recessions." Finance and Economics Discussion Series. Washington, D.C.: Divisions of Research & Statistics and Monetary Affairs - Federal Reserve Board.

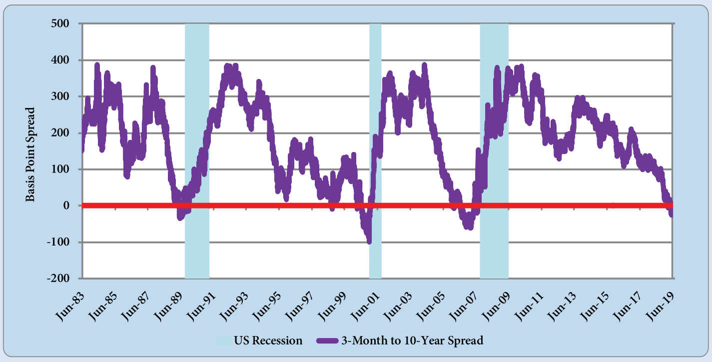
[5] The indices give a sense of the future state of an economy by taking into account economic variables that tend to move before changes in the overall economy. The Bloomberg index also incorporates historical values of GDP, non-farm payroll employment, industrial production index, manufacturing and trade sales, and personal income excluding transfer payments.

[6] Powell, J. 2019. Transcript of Chair Powell's Press Conference. May 1st 2019.

Box 1 (Cont'd)

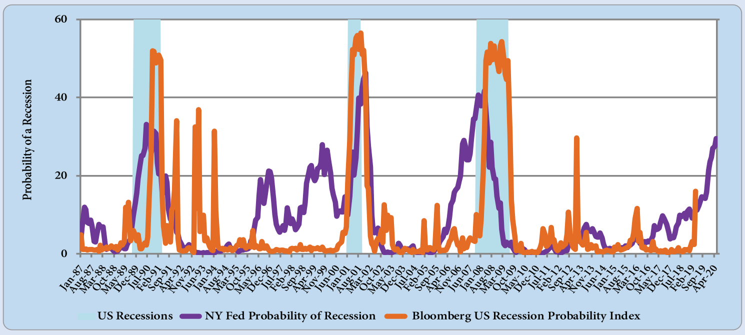
The Implications of an Inverted US Treasury Yield Curve for US Economic Outlook and Monetary Policy in Trinidad and Tobago

Figure 1
US 3-Month to 10-Year Treasury Spread and US Recessions



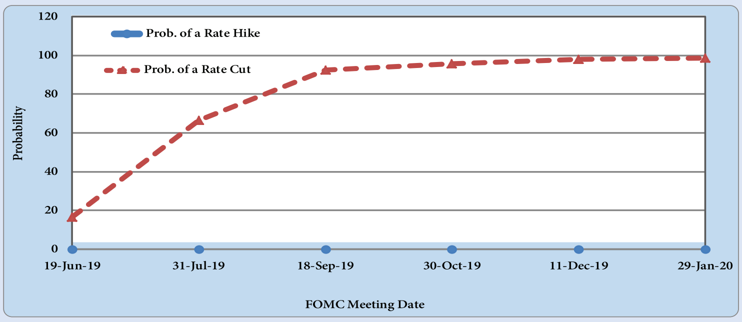
Sources: Bloomberg, National Bureau of Economic Research (NBER) and Central Bank of Trinidad and Tobago

Figure 2
Probability of Recession Indices and US Recessions



Sources: Bloomberg and National Bureau of Economic Research (NBER)

Figure 3
Bloomberg Fed Funds Probabilities (as at June 6, 2019)



Source: Bloomberg

Part III – Domestic Economic Conditions

Overall activity in the domestic economy was checked in the second half of 2018 primarily by declines in crude oil output and a moderation in natural gas production. Higher natural gas prices boosted government revenue while inflation remained contained during 2018 and into 2019.

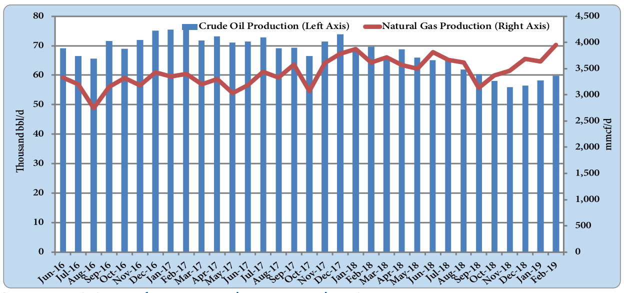
a) Real Economic Activity

Following an energy-led boost in economic activity in the first half of 2018, maintenance-related shutdowns of some petrochemical plants helped curb activity in the latter part of the year. In the fourth quarter of 2018, upstream energy sector activity saw a year-on-year decline in crude oil production (19.5 per cent) while natural gas output was more or less stable (0.5 per cent). The production of oil continues to be hindered by challenges related to mature acreage, while the muted result in natural gas production reflects a levelling off of increases associated with the added output from the Juniper field **(Chart IIIa)**. Meanwhile, the midstream sub-sector was adversely affected by the closure of the Petrotrin refinery at the end of 2018, which led to an 87.8 per cent decline in refinery throughput (year-on-year). The output of natural gas liquids fell by 20.7 per cent but LNG production rose by 6.1 per cent. Further downstream, output was curtailed because of scheduled maintenance activities of some companies. Fertiliser production fell 5.6 per cent, as urea production fell by 48.8 per cent due to scheduled maintenance at the Nutrien's urea plant while Methanol production declined 1.7 per cent because of maintenance works at the MHTL's M5000 methanol plant.

Energy sector output in early 2019 improved slightly despite a continued deterioration in crude oil output. Natural gas production was up 1.5 per cent (year-on-year) during January to February 2019 while LNG, methanol and fertiliser output all expanded year-on-year.

Central Bank indicators show that activity in the non-energy sector slipped year-on-year in the fourth quarter of 2018 following three quarters of more or less flat growth. An uptick in real economic activity in commercial banking in the fourth quarter of 2018 outweighed declining activity in the insurance sub-sector, resulting in marginal growth in the finance, insurance, real estate and other businesses sector. While capacity utilisation remained relatively unchanged at 68 per cent, the manufacturing sector recorded a small downtick (-0.6 per cent), while activity of food processors seemed to be leveling off. Within the transport, storage and communication sector, there was slower port, airline and hired-cars activity. Flooding, which particularly affected vegetables and root crops, caused a falloff in agricultural output in the final quarter of 2018. A dip in electricity generation—due to several plant shutdowns in the energy sector—resulted in lower activity in the electricity and water sector. Activity in the construction sector was muted but more recent data on local cement sales for the first quarter of 2019 suggest an uptick in the sector possibly owing to accelerated government infrastructural works. The distribution sector is estimated to have contracted during the quarter. Retail sales, a major indicator of distribution activity, fell by 1.2 per cent year-on-year, largely on account of reduced sales of motor vehicles and parts (-3.0 per cent), household appliances and furnishings (-6.1 per cent), textiles and wearing apparels (-3.9 per cent) and in supermarkets and groceries (-6.5 per cent). These outweighed increases in other sub-categories of the index including dry goods (1.7 per cent) and materials and hardware (2.9 per cent).

Chart IIIa:
Crude Oil and Natural Gas Production



Source: Ministry of Energy and Energy Industries

b) Retail Prices

Inflation continues its low and stable trend in early 2019 underpinned by subdued aggregate demand and low international food prices **(Chart IIIb)**. During the period October 2018 to May 2019, headline inflation was relatively unmoved, measuring 1.0 per cent (year-on-year) at the beginning of the period and 1.2 per cent in May. Over the eight-month period, headline inflation peaked at 1.5 per cent in March. Core inflation, which omits the volatile food component, measured 1.3 per cent in October and accelerated slightly to 1.6 per cent during the opening quarter of 2019. Core inflation subsequently slowed to 1.2 per cent by May 2019. Food inflation, which has been persistently low, rose from -0.2 per cent and peaked at 1.1 per cent in May 2019.

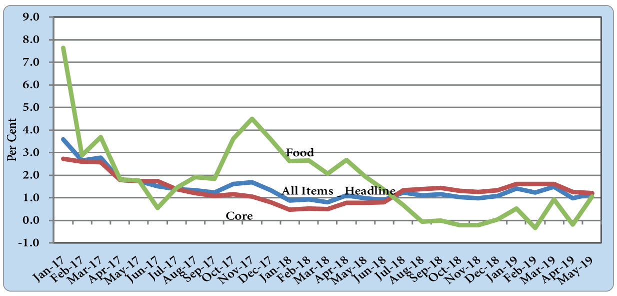
Core inflation was notably impacted by faster price increases in the health sub-index, which measured 5.3 per cent in January 2019 compared to 0.7 per cent in October 2018. This was primarily because of faster price increases in the cost of medical services (11.2 per cent in January compared to -3.3 per cent in October). The health sub-index again experienced notable growth in February, measuring 6.0 per cent owing to higher prices for prescription medication and over-the-counter pharmaceuticals. The health sub-index rounded out the quarter measuring 6.1 per cent in March. The communication sub-index also experienced a price increase in the opening quarter of the year (0.3 per cent) following a price decline (0.1) per cent in the fourth quarter, driven by higher prices for mobile phones. The alcoholic beverages and tobacco sub-index also increased to 0.4 per cent in March 2019 from -0.2 per cent in October 2018. Core inflation was also affected by slower price increases of the housing sub-index in April (0.7 per cent) as costs associated with home ownership slowed (0.7 per cent compared to 2.8 per cent).

Food inflation was largely negative over the eight-month period. Food prices were impacted by persistent price declines in a number of categories. Notably the fruit sub-index, declined consistently over the period, and the bread and cereals sub-index declined from November through March. Food prices were also impacted by the pass through of international food prices, evidenced by persistent declines in the FAO food price index for the period under review. Food prices were at their highest in May 2019 over the eight-month period, measuring 1.1 per cent. This was largely driven by a 3.4 per cent increase in meat prices on account of price increases for goat, chicken and lamb. One month prior (April 2019) meat prices decelerated (1.0 per cent) on account of slower price increases for chicken (0.8 per cent).

Producers' Prices and Building Material Prices

Producer price inflation, as measured by the Producer Price Index (PPI) of the CSO, remained generally muted (0.2 per cent) in the opening quarter of 2019. Most of the sub-indices reflected minimal price growth, with the exception of the drink and tobacco sub-index which registered a marginal decline. The Index of Retail Prices of Buildings Materials grew 1.0 per cent in the opening quarter of 2019 year-on-year. All costs measured by the index increased in the first quarter of 2019, with the exception of site preparation and finishing, joinery works which both declined 0.1 per cent. Walls and roofs incurred the largest price increase of 1.8 per cent.

Chart IIIb:
Index of Retail Prices
(Year-on-Year Per Cent Change)



Source: Central Statistical Office

Table IIIa: Index of Retail Prices (Per Cent Change)

January 2015 = 100	Year-on-Year		
	Weights	Mar-2019	May-2019
Headline Inflation	***1000***	**1.0**	**1.2**
Food and Non-Alcoholic Beverages	*173*	-0.2	1.1
Bread and Cereals	*33*	-0.4	-0.4
Meat	*31*	1.0	3.4
Fish	*11*	0.3	-1.3
Vegetables	*24*	-3.0	1.5
Fruits	*6*	-3.5	-1.9
Milk, Cheese and Eggs	*21*	-2.0	-0.9
Butter, Margarine, Edible Oils	*10*	-0.1	0.7
Sugar, Jam, Confectionery, etc.	*6*	-1.5	-0.9
Food Products NEC	*13*	5.0	6.4
Non-Alcoholic Beverages	*18*	1.0	0.6
Core Inflation	*827*	**1.3**	**1.2**
Alcoholic Beverages and Tobacco	*8.7*	1.1	1.6
Clothing and Footwear	*56.7*	-1.9	-2.4
Furnishings, Household Equipment and Routine Maintenance	*67.2*	0.1	0.1
Health	*40.6*	5.1	4.7
Of which: *Medical Services*	*10.4*	5.8	5.8
Housing, Water, Electricity, Gas and Other Fuels	*274.6*	0.7	0.7
Of which: *Rent*	*21.5*	2.0	2.0
Home Ownership	*193.3*	0.7	0.7
Education	*9.9*	0.0	0.0
Recreation and Culture	*65.5*	0.7	0.7
Hotels, Cafes and Restaurants	*24.9*	2.2	2.2
Transport	*147.4*	2.3	2.3
Communication	*45.1*	0.4	0.4
Miscellaneous Goods and Other Services	*85.9*	2.9	2.9

Source: Central Statistical Office

Box 2

Inflation Targeting Regimes in Major Developed Economies Under Review

Inflation targeting (IT) is a monetary policy regime in which a central bank establishes an explicit target for the inflation rate (or range) over the medium term, which it announces to the public[1]. IT can either be applied in a strict form (full-fledged IT) or in more flexible forms (IT Lite and Flexible IT), differentiated mainly by the extent to which the commitment to an inflation target is institutionalised as the sole objective of monetary policy and by how openly the target is communicated to the public. In 1990, New Zealand became the first country to formally adopt inflation targeting when it unveiled its full-fledged IT framework. Since then many other advanced economies (AEs) and emerging market economies (EMEs) have adopted various forms of this regime.

IT has become a popular monetary policy regime for several reasons with IT being the regime of choice among AEs. To begin, influenced by IT's success in reducing inflation in New Zealand, many countries saw it as a means of improving their inflation records. After adopting IT, several AEs and EMEs benefitted from declines in both the average level and volatility of inflation. Some countries have also resorted to IT in response to challenges in conducting monetary policy using conventional approaches, for example, contradictory or inconsistent fiscal policy. Inflation targeting has also been shown to improve economic prospects in both AEs and EMEs, perhaps because it reduces the dampening effect of high inflation on growth.

In Trinidad and Tobago, in 2002 the Central Bank introduced a monetary framework which uses a policy interest rate (the 'repo' rate) to influence short-term interest rates, credit, aggregate demand, and ultimately inflation. This operates alongside a managed exchange rate regime which has supported the low inflation objective. While this arrangement has generally served the country well, the 'repo' rate framework has nsome weaknessess. In addition, given the country's open capital account, the Central Bank in taking monetary policy decisions is always cognizant of the trajectory of international interest rates since rising interest rate differential between domestic and international interest rates could increase pressures on the domestic foreign exchange market[2]. In an IT regime, which allows greater exchange rate flexibility, monetary policy would be less constrained by the movements in international interest rates and would be able to focus more on inflation and employment or economic conditions.

Aspects of an IT monetary framework can be beneficial to Trinidad and Tobago. On a broad level, macroeconomic management can benefit from the institutional improvements that must accompany an IT regime, such as better coordination of monetary and fiscal policies, improvement in statistical and forecasting capabilities, and increased Central Bank accountability for its policy actions and performance. While full-fledged IT focusing solely on inflation may not be appropriate for TT, a flexible IT regime might deserve consideration in the future. It would enable the Bank to relax the price stability objective and pursue supplementary objectives if necessary (for example, in cases of financial instability). In addition, since communication with the public is an important aspect of an IT regime, the Bank will be able to influence the public's expectations about inflation to aid in achieving its inflation objective (the expectations channel). Further, since IT will require greater coordination with the Central Government, the framework can possibly improve liquidity management in the financial system and improve the overall conduct of monetary policy.

Although IT can provide important benefits, the framework is not without challenges and several countries have been reviewing their IT frameworks for various reasons. A general concern facing central banks in some AEs is how to grapple with the use of IT in the current low-growth economic environment. Since the last global financial crisis, monetary policy has been unable to provide the necessary stimulus to reinvigorate growth, as is the case in the EU. For New Zealand, one challenge arises from the small, open nature of its economy, and the consequent high susceptibility to external shocks and the pass-through of imported inflation. These concerns prompted the Reserve Bank of New Zealand to review its framework and effective April 01, 2019, a new, more flexible framework took effect. In addition to price stability, the new framework includes maximum employment as an objective.

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[1] Alternative monetary policy frameworks include a fixed exchange rate regime; monetary aggregate targeting; and targeting other macroeconomic variables such as price level, nominal GDP growth, or nominal GDP level. Inflation targeting is based on the premise that the best that monetary policy can do to support long-term growth of the economy is to maintain price stability.

[2] Over the last 15 years headline inflation ranged between 0 and 12 per cent and during 2003 to 2008 (a period of boom in energy prices) headline inflation reached an annual average of 7.1 per cent. This accelerated following the global financial crisis (2009-2012) to 8.0 per cent. High inflation can negatively impact real growth over some threshold, which in Trinidad and Tobago has been estimated by one study as 6 per cent (Ramlogan, A., & Sookram, S. (2018). Coordination of Monetary and Fiscal Policies in Trinidad and Tobago. CBTT WP 02/2018). On the other hand, Trinidad and Tobago has also experienced extended periods when inflation was too low to be consistent with domestic price stability.

Box 2 (Cont'd)

Inflation Targeting Regimes in Major Developed Economies Under Review

In the US, the Federal Reserve has grappled with concerns that its 2.0 per cent inflation target may be too low. Ball (2014) argued that a 4.0 per cent long-run target offers greater benefits than the prevailing 2.0 per cent target. Although Ball (2014)[3] maintains that an ideal target remains unknown, "…the United States has lived comfortably with that inflation rate [2.0 per cent] in the past." The primary reason to raise inflation targets is to ease the zero-bound problem—the constraint on monetary policy arising from the fact that nominal interest rates cannot be negative. A higher inflation target raises the long-run levels of nominal interest rates allowing larger decreases in policy rates before the zero-bound is reached. This flexibility makes it easier for a central bank to restore full-employment when an economic slump occurs. Jose de Gregorio (2016)[4] has emphasised that modern-day monetary policy faces two interrelated issues. Firstly, the anaemic nature of present-day economic activity calls into question the appropriateness of certain tools. Secondly, it forces policymakers to be concerned about monetary policy in the future, given that the zero lower bound (ZLB) on interest rates will more than likely be hit more frequently. Jose de Gregorio highlighted that "an aggressive central bank response in the form of easier monetary policy was key to containing the global financial crisis in major advanced economies, and it has supported a very slow recovery."

With similar challenges being faced in Europe and Canada, the modern monetary theory school (MMT) advocates for full abandonment of the inflation targeting ideology, and a larger role for fiscal policy in economic stabilisation. Torres and Curran (2019)[5] have suggested that the idea of closer cooperation between central banks and fiscal authorities is gaining ground. They cite Adam Posen (President of the Peterson Institute for International Economics): "…it's fine to have an inflation target – but tweaking it may not achieve much, and could backfire if central banks still can't hit it…You need real factors to push inflation higher…". The IT regime could be further challenged in the future by the long-term trend of declining global interest rates, which implies that borrowing costs will remain low even after central banks remove all stimulus. Low borrowing costs will expose economies to "boom-bust" financial cycles under inflation targeting, as households may be encouraged to take on excessive debt. With all these considerations in mind, the US Federal Reserve is currently reviewing its policies with the aim of presenting its findings by 2020.

Despite present day challenges, IT will likely remain the preferred monetary policy framework, although improvements to the regime will be made. In the countries where IT is currently being revised, the trend is to allow for greater flexibility. As the Bank continues its routine review of its monetary policy operations and framework to improve monetary policy effectiveness, some aspects of IT might offer fruitful avenues for further investigation and maybe even adoption. However, while noting possible benefits, the Bank is also mindful of the challenges associated with the framework.

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[3] Laurence Ball. (2014). The Case for a Long-Run Inflation Target of Four Percent. IMF Working Paper.

[4] Jose de Gregorio. (2016). Challenges for Monetary Policy in Advanced Economies. Peterson Institute for International Economics. Available online: https://piie.com/blogs/realtime-economic-issues-watch/challenges-monetary-policy-advanced-economies.

[5] See: https://www.bloomberg.com/news/articles/2019-04-05/all-brakes-and-no-engine-central-banks-seek-new-inflation-ideas?srnd=premium.

c) Labour Market

Labour market slack and slow wage growth support the low inflationary environment in which monetary policy is being conducted. According to the latest available data from the Central Statistical Office (CSO), the unemployment rate increased to 4.8 per cent in 2017—the highest rate of unemployment since 2012—from 4.0 per cent in 2016. During 2017, the number of persons employed fell by just under 10 thousand while the labour force contracted by 4.6 thousand persons. This resulted in a small decline in the participation rate from 59.7 per cent in 2016 to 59.2 per cent in 2017.

In the absence of official unemployment data for 2018, retrenchment notices[4] filed with the Ministry of Labour and Small Enterprise Development indicate that retrenchments were higher by over 53.2 per cent (excluding the layoffs due to the closure of the Petrotrin oil refinery) in 2018. In January-May 2019 retrenchments continued to rise, to 631 persons compared with 412 persons in the similar period in 2018. Further, the average number of vacancies advertised in the print media[5] fell by 11.7 per cent (year-on-year) over the first five months of 2019.

Wage increases were moderate in 2018, which assisted in reducing pressures on inflation. The median wage increase reported to the Industrial Court in 2018 was 3.00 per cent, unchanged from 2017. In the second half of 2018, average nominal wages increased on account of a higher wage bill in the energy sector. The Index of Average Weekly Earnings (AWE)[6] increased by 10.1 per cent (year-on-year) during the second half of 2018 as wages in the oil refining sector jumped by 31.0 per cent because of separation packages for ex-Petrotrin workers[7]. When the energy sector is excluded, nominal wages increased by just 0.5 per cent over the last 6 months of 2018 compared with the similar period of 2017.

d) Fiscal Operations

According to data provided by the Ministry of Finance, the Central Government fiscal accounts recorded a deficit of $1.9 billion in the first six months of fiscal year (FY) 2018/19 (October 2018–March 2019). This compares with a deficit of $3.1 billion in the corresponding period one year earlier **(Table IIIb)**. The lower deficit was on account of higher revenue over the period. Higher expenditure, however, resulted in the non-energy fiscal deficit increasing slightly to $7.5 billion from $7.3 billion recorded one year earlier.

Central Government total revenue increased to $21.6 billion in the first six months of FY2018/19. This compares with collections of $18.6 billion in the corresponding period of FY2017/18. Energy revenue rose by 36.2 per cent to $5.6 billion owing to higher natural gas prices[8]. Non-energy receipts increased to $15 billion from $14.4 billion in the first six months of FY 2017/18 primarily on account of higher non-tax revenue. Non-tax revenue was bolstered by higher equity surplus from the Central Bank. Meanwhile, capital revenue also grew reaching $970.4 million in the first six months of FY2018/19 compared with $9.1 million recorded in the similar period one year earlier.

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[4] This indicator for job separation is limited insofar as it only includes registered retrenchment notices, and does not capture other forms of job separation, especially the non-renewal of contracts of temporary or short-term workers. Furthermore, it is important to note that reports of job losses at establishments cannot be equated with an equal rise in the unemployment rate. Official Central Statistical Office (CSO) data on the labour market are not collected from firms and other establishments but from households via the conduct of the Continuous Sample Survey of Population (CSSP). Moreover, persons who have been retrenched or lost their jobs otherwise (expired contract, retired, etc.) and have not sought re-employment during the reference period are not classified as unemployed.

[5] This indicator is constructed by the Central Bank using the number of employment vacancies advertised in the Daily Express, Newsday and Guardian newspapers.

[6] The Index of Average Weekly Earnings, which is computed by the Central Statistical Office, is based on surveyed companies' employment and wage bill. The average weekly earnings is calculated as the earnings (total amount paid to employees) divided by the number of employees.

[7] These exit payments comprised payments for termination packages; outstanding vacation; back pay; medical and other benefits; and outstanding promotions.

[8] Natural gas prices averaged US$3.36 per million British Thermal Units (mmbtu) in the first six months of FY2018/19 compared with $2.98 per mmbtu in the first six months of FY2017/18.

In the first six months of FY2018/19 aggregate expenditure increased reaching $23.4 billion compared with $21.7 billion in the comparative period one year earlier. The Central Government incurred higher outlays in all categories of recurrent expenditure. Notably, there was higher spending on transfers and subsidies which was due in part to costs associated with the closure of the Petrotrin refinery. Capital spending also increased by 30.5 per cent reaching $1.2 billion.

The Central Government anticipates a higher deficit for FY2018/19[9]. In the 2019 Mid-Year Budget Review, the Central Government revised upwards its projected expenditure by $300.0 million to ensure funding of several infrastructure projects[10] and payment of arrears to commercial suppliers and contractors. Central Government also allocated through supplementation, an additional $1.8 billion for anticipated expenditure in key priority areas[11]. On the revenue side, a reduction in collections of $221.0 million is anticipated for FY2018/19 on account of lower energy receipts as global oil prices remain subdued. As a result, the overall deficit is anticipated to amount to $4.57 billion (2.8 per cent of GDP) at the end of FY2018/19 compared to $4.05 billion (2.5 per cent of GDP) initially budgeted.

Preliminary data reveal that public sector debt increased in the seven months to April 2019. Net of sterilised securities, public debt reached $98.4 billion (61.9 per cent of GDP), on account of disbursements from both domestic and external sources. Thus far, Central Government borrowed roughly $3.8 billion domestically, while principal repayments under the General Development Loans Act amounted to roughly $1.2 billion. In addition, $470.9 million in CLICO zero-coupon bonds matured in November 2018. Consequently, domestic debt outstanding amounted to $45 billion at end-April 2019, compared with $42.9 billion at end-September 2018. On the external front, in November 2018, the Corporación Andina de Fomento (CAF), the Development Bank of Latin America, released the second tranche (US$120.0 million) of a previously contracted loan. Over the period, the Inter-American Development Bank (IDB) also disbursed funds under previously contracted development loans related to, inter alia, the Multiphase Wastewater Rehabilitation Programme and the WASA Modernisation and Wastewater Infrastructure Programme. External debt was recorded at $25.8 billion, $1.2 billion more than the September 2018 figure.

[9] On May 13, 2019, the Minister of Finance presented the mid-year review of the budget for FY2018/2019. Oil and gas price assumptions have been revised to US$60.00 per barrel of oil and US$3.00 per MMBtu from US$65.00 per barrel and US$2.75 per MMBtu, respectively announced at the start of the FY2018/19.

[10] These include: roads, highways, bridges and hospitals.

[11] These include: the Judiciary ($57.682 million), the Service Commissions ($3.0 million), the Office of the Prime Minister ($12 million), the Ministry of Finance ($709 million), the Comptroller of Accounts ($18 million), the Ministry of National Security ($200 million), the Ministry of the Attorney General and Legal Affairs ($50.0 million), the Ministry of Education ($50.0 million), the Ministry of Labour and Small Enterprise Development ($39.3 million), the Ministry of Public Utilities ($200 million), the Ministry of Rural Development and Local Government ($39.0 million), the Ministry of Works and Transport ($85.7 million),the Trinidad and Tobago Police Service ($75.0 million), the Ministry of Foreign and CARICOM Affairs ($1.6 million), the Ministry of Communications ($10.0 million), and the Ministry of Social Development ($227.5 million).

Table IIIb: Summary of Central Government Fiscal Operations (TT$ Millions)

	2016/2017[r]	2017/2018[p]	Oct. 2018 - Mar. 2019	Oct. 2017 - Mar. 2018	2018/2019[rb]	2018/2019[b]
Revenue[1]	**36,180.6**	**42,249.6**	**21,557.0**	**18,556.0**	**47,502.8**	**47,724.2**
Current*	34,870.1	41,411.0	20,586.6	18,546.9	44,528.0	44,715.1
Energy*	7,759.5	10,694.6	5,603.3	4,113.4	13,571.4	13,641.0
Non-Energy*	27,110.6	30,716.3	14,983.4	14,433.5	30,956.6	31,074.0
Capital	1,310.5	838.6	970.4	9.1	2,974.8	3,009.1
Expenditure	**49,712.0**	**47,601.2**	**23,407.9**	**21,692.7**	**52,078.4**	**51,776.3**
Current	46,263.5	44,197.3	22,165.1	20,740.1	47,877.6	46,576.3
Wages and Salaries	9,937.8	9,097.1	4,500.0	4,497.6	9,271.1	9,328.3
Goods and Services	5,827.2	6,088.1	2,364.2	2,228.3	6,997.7	7,000.1
Interest Payments	4,468.4	3,813.3	1,836.5	1,779.9	3,688.9	3,687.2
Transfers and Subsidies[2]	26,030.1	25,198.8	13,464.4	12,234.3	27,919.9	26,560.7
Capital Expenditure and Net Lending	3,448.5	3,403.9	1,242.8	952.6	4,200.8	5,200.0
Overall Non-Energy Balance[3]	**-21,290.9**	**-16,046.3**	**-7,454.1**	**-7,250.1**	**-18,147.0**	**-13,570.2**
Overall Balance	**-13,531.4**	**-5,351.6**	**-1,850.9**	**-3,136.7**	**-4,575.6**	**-4,052.1**
Total Financing (net)	**13,531.4**	**5,351.6**	**1,850.9**	**3,136.7**	**4,575.6**	**4,052.1**
Net Foreign Financing	**3,266.7**	**660.5**	**719.9**	**-280.6**	**218.7**	**225.7**
Net Domestic Financing	10,264.7	4,691.1	1,131.0	3,417.3	4,356.9	3,826.4
Per Cent of GDP						
Revenue	**24.2**	**27.0**	**n.a**	**n.a**	**29.0**	**29.1**
Current	23.3	26.4	n.a	n.a	27.2	27.3
Energy	5.2	6.8	n.a	n.a	8.3	8.3
Non-Energy	18.1	19.6	n.a	n.a	18.9	19.0
Capital	0.9	0.5	n.a	n.a	1.8	1.8
Expenditure	**33.3**	**30.4**	**n.a**	**n.a**	**31.8**	**31.6**
Current	31.0	28.2	n.a	n.a	29.2	28.4
Wages and Salaries	6.7	5.8	n.a	n.a	5.7	5.7
Goods and Services	3.9	3.9	n.a	n.a	4.3	4.3
Interest Payments	3.0	2.4	n.a	n.a	2.3	2.3
Transfers and Subsidies	17.4	16.1	n.a	n.a	17.0	16.2
Capital Expenditure and Net Lending	2.3	2.2	n.a	n.a	2.6	3.2
Overall Non-Energy Balance	**-14.3**	**-10.2**	**n.a**	**n.a**	**-11.1**	**-8.3**
Overall Balance	**-9.1**	**-3.4**	**n.a**	**n.a**	**-2.8**	**-2.5**
Total Financing (net)	**9.1**	**3.4**	**n.a**	**n.a**	**2.8**	**2.5**
Net Foreign Financing	2.2	0.4	n.a	n.a	0.1	0.1
Net Domestic Financing	6.9	3.0	n.a	n.a	2.7	2.3
Memorandum items:						
HSF Transfers (+) / Withdrawals (-)	-1,712.2	0.0	0.0	0.0	0.0	0.0

Source: Ministry of Finance

1 In FY2018, proceeds from the sale of NIF bonds are recorded under non-tax revenue.
2 Adjusted for transfers to the Infrastructure Development Fund, Government Assisted Tertiary Education Fund and CARICOM Petroleum Fund.
3 Computed as the sum of non-energy revenue and capital revenue less total expenditure.
* The energy and non-energy breakdown is based on the Central Bank's computations. Energy revenues comprise oil revenues plus revenues from Petrochemical companies. Data for FY2019 is an estimate.
r Revised.
p Provisional.
rb Revised Budgeted data based on an oil price of US$60.00 per barrel and Natural Gas price of US$3.00 per mmbtu.
b Budgeted data based on an oil price of US$65.00 per barrel and Natural Gas price of US$2.75 per mmbtu.

e) External Accounts

Balance of Payments

(Data in this section are in US dollars unless otherwise stated)

Trinidad and Tobago's external accounts recorded a small surplus of $109.8 million (1.9 per cent of GDP) in the final quarter of 2018 **(Table IIIc)** - its first quarterly surplus since the third quarter of 2016. At the end of 2018, gross official reserves stood at $7,575.0 million, equivalent to 8.0 months of prospective imports of goods and services. The current account remained in surplus over the review period underpinned by a reduction of imports and a smaller deficit on the services account. The financial account also recorded a net inflow, primarily on account of other investment.

The current account registered a surplus of $814.7 million (13.9 per cent of GDP) over the fourth quarter of 2018. The surplus was attributed to an improvement in the net Goods trading position as the fall-off in imports outstripped the decline in exports. Preliminary estimates indicated that total exports declined by 4.1 per cent (year-on-year) to $2,393.1 million in the three months to December 2018, reflective of a reduction in energy exports. This outcome was mainly due to lower export volumes of refined products, crude oil and natural gas liquids. However, marginal year-on-year increases in the export volume of LNG (1.7 per cent) and methanol (0.3 per cent) were observed over the review period. The fall-off in energy exports was partially offset by a 19.4 per cent (year-on-year) rise in non-energy exports to $493.3 million. Increased exports to the EU were the main driver of the improved performance of non-energy exports. Exports of beverages and tobacco to the US and food exports to the UK also increased when compared to the same period in 2017. While an increase in exportation of inedible crude materials to CARICOM was recorded, total non-energy exports to the regional bloc decreased over the three months to December 2018 relative to the final quarter in 2017. Meanwhile, total imports were estimated to have declined by 31.1 per cent (year-on-year) to $1,344.3 million in the last quarter of 2018 largely due to a fall-off in fuel imports which can be attributed to the closure of the state-owned oil refinery in November 2018. Non-energy imports also declined during the final quarter of 2018 when compared to the corresponding period one year earlier largely on account of fewer capital imports from the US and the UK.

Continuing the trend of previous years, the services account recorded a deficit - albeit a smaller deficit when compared to the similar period of 2017. This improved performance was supported by reduced payments abroad of technical, trade related and other business services, particularly for services incidental to mining, and oil and gas extraction. The primary income account registered a surplus due investment income receipts abroad which more than offset repatriations of earnings by foreign-owned companies. Meanwhile, a larger surplus was registered on the secondary income account in the fourth quarter of 2018 compared to the same period in 2017, owing to increased inbound transfers.

In the fourth quarter of 2018, the financial account registered a net inflow of $768.4 million, a reversal of the net outflow of $560.0 million recorded in the similar period of 2017. The other investment category primarily contributed towards the overall net inflow on the financial account in the fourth quarter of 2018. More specifically, the increase in other investment liabilities was due to loans incurred by the Central Government as well as a rise in trade credits and other accounts owed to non-residents during the final quarter of 2018. Meanwhile, other investment assets declined, mainly attributable to payments received on accounts receivable. Partially, offsetting the fall in accounts receivable were increases in currency and deposits held abroad and loan assets.

Direct investment recorded a net inflow of $130.4 million, in contrast to a net outflow of $688.1 million registered in the fourth quarter of 2017. Direct investment liabilities (direct investment in Trinidad and Tobago by foreign investors) increased due to intercompany borrowings. Consistent with previous years, the energy sector largely accounted for these transactions. Direct investment abroad registered an increase reflective of higher inter-company lending and reinvestment of earnings. Financial flows in the portfolio investment account registered a net inflow of $86.2 million which was symptomatic of a decline in portfolio assets. In particular, the drop in portfolio investment assets was attributable to a reduction in debt securities held abroad by financial institutions.

At the end of May 2019, Trinidad and Tobago's gross official reserves amounted to $7,150.6 million, $424.4 million lower than the level recorded at the end of 2018. This suggests that the external accounts registered an overall deficit in the first five months of 2019. The level of reserves at the end of May 2019 represents 8.1 months of prospective imports of goods and services.

Table IIIc: Trinidad and Tobago: Summary Balance of Payments (US$ Millions)

	2017^r	2018^p	2017^r				2018^p			
			I	II	III	IV	I	II	III	IV
Current Account	**1,107.7**	**1,607.5**	**698.7**	**159.3**	**75.9**	**173.8**	**348.0**	**437.6**	**7.2**	**814.7**
Goods and Services	**904.4**	**2,106.7**	**647.0**	**103.5**	**63.1**	**90.8**	**630.9**	**424.1**	**316.0**	**735.8**
Goods, net*	2,994.0	3,693.4	1,067.5	695.9	685.9	544.7	1,055.4	899.0	690.2	1,048.8
Exports**	9,445.7	10,311.2	2,523.9	2,140.6	2,284.6	2,496.6	2,774.5	2,657.4	2,486.2	2,393.1
Energy	7,668.8	8,855.3	1,940.3	1,772.9	1,872.2	2,083.4	2,475.7	2,327.8	2,152.0	1,899.8
Non-Energy	1,777.0	1,455.9	583.6	367.7	412.4	413.2	298.8	329.6	334.2	493.3
Imports**	6,451.7	6,617.8	1,456.4	1,444.7	1,598.6	1,951.9	1,719.1	1,758.4	1,796.0	1,344.3
Fuels***	1,617.7	1,755.4	378.7	349.3	374.1	515.5	470.6	557.4	528.6	198.9
Other	4,834.0	4,862.4	1,077.7	1,095.5	1,224.5	1,436.4	1,248.5	1,201.0	1,267.4	1,145.5
Services, net	-2,089.7	-1,586.7	-420.5	-592.4	-622.9	-453.9	-424.6	-474.9	-374.2	-313.0
Primary Income, net	**154.8**	**-567.1**	**39.6**	**41.3**	**3.6**	**70.3**	**-297.5**	**-0.1**	**-326.8**	**57.3**
Secondary Income, net	**48.6**	**68.0**	**12.2**	**14.4**	**9.3**	**12.7**	**14.7**	**13.7**	**18.0**	**21.7**
Capital Account	**1.2**	**2.1**	**0.0**	**0.4**	**0.6**	**0.2**	**0.2**	**0.2**	**1.5**	**0.2**
Financial Account	**544.5**	**-189.7**	**104.8**	**144.2**	**-264.6**	**560.0**	**16.8**	**177.1**	**384.7**	**-768.4**
Direct Investment	**550.9**	**351.4**	**-105.4**	**-24.5**	**-7.2**	**688.1**	**85.7**	**65.2**	**330.9**	**-130.4**
Net Acquisition of Financial Assets	94.1	171.2	16.5	20.0	27.1	30.5	49.5	14.2	52.4	55.2
Net Incurrence of Liabilities	-456.9	-180.1	121.9	44.5	34.3	-657.6	-36.2	-51.0	-278.5	185.5
Portfolio Investment	**373.1**	**394.3**	**-36.2**	**91.4**	**84.0**	**234.0**	**182.0**	**358.7**	**-60.2**	**-86.2**
Net Acquisition of Financial Assets	224.1	350.4	-44.7	64.1	81.0	123.7	177.9	318.3	-59.6	-86.2
Net Incurrence of Liabilities	-148.9	-43.9	-8.5	-27.2	-3.0	-110.3	-4.1	-40.3	0.6	0.0
Financial Derivatives	**4.7**	**5.3**	**4.1**	**-1.5**	**-1.3**	**3.4**	**4.4**	**-0.6**	**1.5**	**0.0**
Net Acquisition of Financial Assets	4.4	5.2	4.6	-2.0	-0.9	2.6	5.0	-0.2	0.9	-0.5
Net Incurrence of Liabilities	-0.3	-0.2	0.6	-0.4	0.4	-0.8	0.7	0.4	-0.7	-0.5
Other Investment**	**-384.2**	**-940.7**	**242.4**	**78.9**	**-340.0**	**-365.4**	**-255.2**	**-246.1**	**112.5**	**-551.8**
Net Acquisition of Financial Assets	164.4	-221.8	345.6	-12.7	240.7	-409.3	34.2	394.0	-471.8	-178.2
Net Incurrence of Liabilities	548.5	718.9	103.2	-91.5	580.7	-43.8	289.4	640.1	-584.3	373.6
Net errors and Omissions	**-1,660.5**	**-2,594.1**	**-954.3**	**-384.9**	**-570.4**	**249.1**	**-713.3**	**-432.3**	**25.1**	**-1,473.6**
Overall Balance	**-1,096.0**	**-794.7**	**-360.4**	**-369.5**	**-229.3**	**-136.9**	**-381.9**	**-171.6**	**-351.0**	**109.8**
					Per Cent of GDP					
Current Account	**5.0**	**6.9**	**12.5**	**2.9**	**1.4**	**3.1**	**5.9**	**7.5**	**0.1**	**13.9**
Goods, net	13.4	15.7	19.1	12.5	12.3	9.8	18.0	15.3	11.8	17.9
Exports	42.3	44.0	45.2	38.3	40.9	44.7	47.3	45.3	42.4	40.8
Imports	28.9	28.2	26.1	25.9	28.6	35.0	29.3	30.0	30.6	22.9
Services, net	-9.4	-6.8	-7.5	-10.6	-11.2	-8.1	-7.2	-8.1	-6.4	-5.3
Primary income, net	0.7	-2.4	0.7	0.7	0.1	1.3	-5.1	0.0	-5.6	1.0
Overall balance	**-4.9**	**-3.4**	**-6.5**	**-6.6**	**-4.1**	**-2.5**	**-6.5**	**-2.9**	**-6.0**	**1.9**
Memorandum Items										
Gross Official Reserves ^	8,369.8	7,575.0	9,105.4	8,735.9	8,506.6	8,369.8	7,987.9	7,816.3	7,465.3	7,575.0
Import Cover (months) ^	9.7	8.0	10.5	10.1	9.8	9.7	9.0	8.6	8.1	8.0

Source: Central Bank of Trinidad and Tobago

Note: This table is an analytical presentation of the Balance of Payments and is presented in the accordance with the IMF's Balance of Payments and International Investment Position Manual, Sixth Edition (BPM6). Refer to Box 3 of the Economic Bulletin, March 2017 for a Technical Note on the Transition to BPM6.

The following financial account movements are represented with a negative sign:

- A decrease in assets (inflow)
- A decrease in liabilities (outflow)
- A net inflow in net balances

The following financial account movements are represented with a positive sign:

- An increase in assets (outflow)
- An increase in liabilities (inflow)
- A net outflow in net balances

* Energy goods data for 2017-2018 comprise estimates by the Central Bank of Trinidad and Tobago.

** Exports and imports are reported on a FOB (Free on Board) basis.

*** Includes petroleum, petroleum products and related materials. Energy exports include exports of petroleum, petroleum products and related materials and the exports of petrochemicals.

**** Other investment comprise currency and deposits, loans, trade credit and advances, other accounts receivable/payable and special drawing rights (liabilities).

^ End of Period.

r Revised.

p Provisional.

International Investment Position

(Data in this section are in US dollars unless otherwise stated)

The net international investment position (NIIP) was estimated at $2,840.5 million at the end of December 2018. This represents a deterioration from the position registered in the third quarter of 2018. The movement resulted from a reduction in the stock of assets of $550.5 million coupled with an increase in the stock of liabilities of $692.2 million **(Table IIId)**.

The reduction in the stock of assets was mainly on account of declines in portfolio and other investment over the review period. More specifically, the decrease in portfolio assets was primarily influenced by reductions in holdings of both equity and debt securities by financial institutions. Similarly, the reduction in the stock of other investment assets was mainly due to payments received on accounts receivable. However, reserve assets increased in the final quarter of 2018, supported by higher energy receipts coupled with disbursements from Central Government loans.

Movement in the stock of liabilities was primarily due to other investment and direct investment. The rise in other investment liabilities stemmed from increases in loans, trade credits and other accounts owed to non-residents. Furthermore, the rise in direct investment liabilities was as a result of higher intercompany lending and equity.

Table IIId: Trinidad and Tobago: International Investment Position (at the end of period) (US$ Millions)

	2017r	2018p	2017r				2018p			
			I	II	III	IV	I	II	III	IV
Net International Investment Position	**4,690.7**	**2,840.5**	**4,390.5**	**4,567.8**	**4,040.3**	**4,690.7**	**4,137.8**	**4,040.0**	**4,083.1**	**2,840.5**
Assets	**24,126.4**	**22,894.2**	**24,502.3**	**24,272.7**	**24,425.7**	**24,126.4**	**23,815.1**	**24,223.1**	**23,444.7**	**22,894.2**
Direct Investment	788.3	871.1	753.9	758.5	773.1	788.3	828.4	821.3	846.8	871.1
Portfolio Investment	10,007.1	9,692.0	9,473.9	9,614.8	9,771.0	10,007.1	9,971.9	10,173.8	10,187.5	9,692.0
Financial Derivatives	4.4	10.1	4.5	2.0	1.8	4.4	9.1	9.6	10.2	10.1
Other Investment*	4,956.8	4,746.0	5,164.5	5,161.4	5,373.2	4,956.8	5,017.8	5,402.2	4,934.9	4,746.0
Reserve Assets	8,369.8	7,575.0	9,105.4	8,735.9	8,506.6	8,369.8	7,987.9	7,816.3	7,465.3	7,575.0
Liabilities	**19,435.7**	**20,053.8**	**20,111.8**	**19,704.9**	**20,385.4**	**19,435.7**	**19,677.4**	**20,183.1**	**19,361.6**	**20,053.8**
Direct Investment	9,082.9	9,076.1	9,995.6	9,795.1	9,869.3	9,082.9	9,040.1	8,964.3	8,731.9	9,076.1
Portfolio Investment	4,132.4	4,087.9	4,278.4	4,245.5	4,255.4	4,132.4	4,142.8	4,096.1	4,096.7	4,087.9
Financial Derivatives	1.6	1.6	1.6	1.6	1.6	1.6	1.6	1.6	1.6	1.6
Other Investment*	6,218.8	6,888.2	5,836.2	5,662.7	6,259.1	6,218.8	6,492.7	7,121.2	6,531.4	6,888.2

Source: Central Bank of Trinidad and Tobago

* Other investment comprise currency and deposits, loans, trade credit and advances, other accounts receivable/payable and special drawing rights (liabilities).

r Revised.

p Provisional.

Part IV – Monetary and Financial Sector Developments

Monetary Developments

Since the last Monetary Policy Report (November 2018) the Monetary Policy Committee (MPC) met in December 2018 and March 2019 and kept the repo rate at 5.00 per cent on both occasions. The MPC balanced several considerations in arriving at this decision. At the March meeting, inflation in February 2019 (1.2 per cent) was observed to be low, and improvements in energy sector performance had slowed between the last quarter of 2018 and the first quarter of 2019. Over the same period, there was, however, a general steadiness in the non-energy sector. At the same time, external monetary conditions softened as the Federal Reserve maintained a pause in fed funds rate hikes, as the outlook for economic conditions in the US seemed less optimistic than at mid-2018. Overall, given external and domestic conditions, the balance of considerations weighed in favour of maintaining the repo rate unchanged at both meetings of the MPC.

Meanwhile, the Bank continued to manage open market operations (OMOs) flexibly to meet changing market conditions. Over November 2018 to May 2019, net domestic fiscal injections[12] (NDFIs), the main source of excess liquidity, decreased relative to the previous seven-month period in 2018. NDFIs over the reference period amounted to $3,006.0 million, which was significantly ess than total fiscal injections over April to October 2018 ($5,286.0 million) and the Bank injected liquidity into the financial system through net maturities of open market securities. Over November 2018 to May 2019, $4,210.6 million was injected into the system via OMOs partly to facilitate $2,500 million in private placement borrowing by the Central Government in April and May. Over the period April to October 2018 there were total net maturities of $511.6 million. However, large accommodations via OMO maturities were allowed in that period to facilitate financial system requirements, including the launch of the NIF bonds. Sales of foreign exchange by the Central Bank to authorised dealers indirectly withdrew $5,523.9 million over November 2018 to May 2019 **(Table IVa)**. Overall, during this period liquidity averaged $2,964.6 million daily, compared with $3,406.2 million over April to October 2018 **(Chart IVa)**.

Lower liquidity over November 2018 to May 2019 led to a rise in interbank activity. Daily average interbank borrowing reached $155.7 million, up from $129.8 million in the preceding seven-month period. The Central Bank's repurchase facility was accessed once in the reference period, on November 28, 2018, for $1,883.3 million.

Table IVa: Fiscal Injections and Liquidity Absorption (TT$ Millions)

	Apr 2018 - Oct 2018	Nov 2018 - May 2019
Fiscal Injections	5,286.0	3,006.0
Liquidity Absorption Measures		
Open Market Operations (OMOs)	511.6	4,210.6
Central Government Treasury Bond Issues	0.0	0.0
Commercial Banks' Fixed Deposits	0.0	0.0
Memorandum Item:		
CBTT Sale of Foreign Exchange[1]	6,181.1	5,523.9

Source: Central Bank of Trinidad and Tobago

Note: A negative sign means that there was a net issue of OMOs and commercial banks' fixed deposits resulting in a withdrawal of liquidity and a positive sign means a net redemption of OMOs and maturity of commercial banks' fixed deposits which injects liquidity.

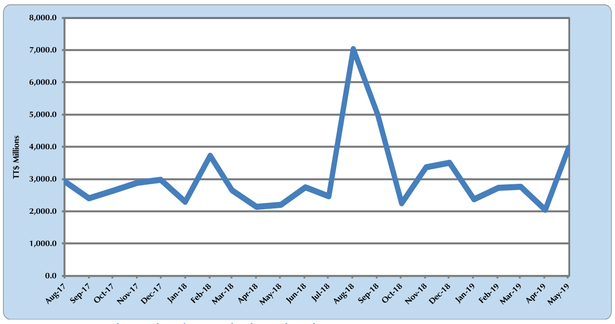
[1] CBTT Sale of Foreign Exchange includes transactions under the Foreign Exchange Liquidity Guarantee facility.

[12] Net domestic fiscal injections reflect the balance of fiscal expenditure conducted domestically versus revenue collected domestically by the Central Government, as well as bond redemptions.

The negative TT-US short term differential has contracted slightly since the last monetary policy report, owing mainly to a declining US 3-month Treasury bill rate. The domestic 3-month Treasury bill rate gained 2 basis points over November 2018 to May 2019. At the same time, tempered by softening economic conditions in the US and a pause in interest rate rises by the Fed, the US equivalent lost 2 basis points. As a result, the 3-month TT-US differential reached negative 103 basis points in May from negative 107 basis points at the end of November 2018. Longer-term yield differentials over November 2018 to May 2019 were influenced mainly by concerns about the future course of US trade policy and economic performance. While the rate of the US 10-year Treasury bond stood at 3.01 per cent at the end of November 2018, by the end of May it had declined to 2.14 per cent. This change largely represented a 'flight to safety' given concerns about continued trade friction between the United States and China, lowered global growth forecasts and concerns about the US economy itself. However, the rate on the corresponding TT 10-year Treasury bond increased by 7 basis points to reach 4.50 per cent over the reference period. The combination of these movements resulted in an increase in the long-term differential from 142 basis points in November 2018 to 236 basis points in May 2019 **(Chart IVb)**.

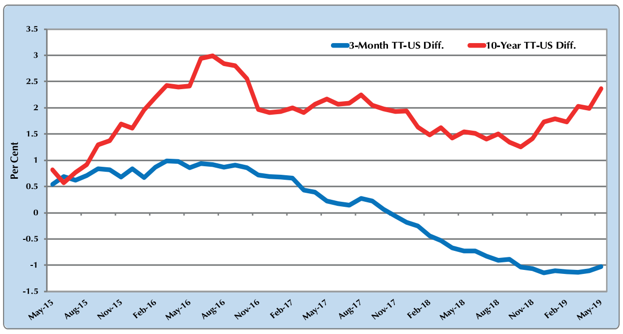
Commercial interest rates in the banking system declined, as did bank spreads, up to March 2019. The commercial banks' weighted average lending rate (WALR) reached 7.83 per cent in March 2019, 28 basis points lower than in September 2018. The decline in the WALR reflects continued competitive manoeuvring among commercial banks for loan business in an economy that is still sluggish. The weighted average deposit rate, however, increased by just two basis points over the same period to reach 0.66 per cent. As a result, the banking spread decreased by 30 basis points to reach 7.17 per cent over the period September 2018 to March 2019 **(Chart IVc)**. The median prime lending rate remained at 9.25 per cent over November 2018 to May 2019.

CHART IVa:
COMMERCIAL BANKS – EXCESS RESERVES



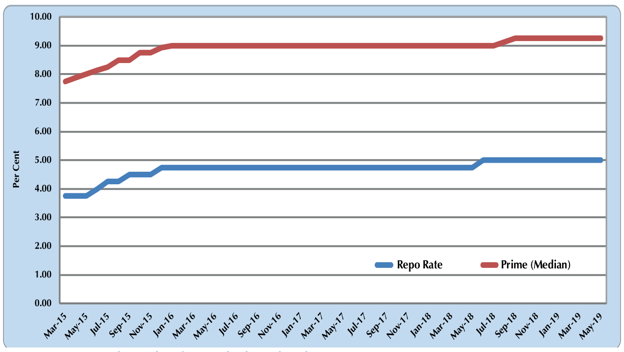
Source: Central Bank of Trinidad and Tobago

CHART IVb:
3-MONTH AND 10-YEAR TT-US DIFFERENTIALS



Source: Central Bank of Trinidad and Tobago

CHART IVc:
REPO RATE AND COMMERCIAL BANKS' MEDIAN PRIME LENDING RATE



Source: Central Bank of Trinidad and Tobago

Box 3

Domestic Market Operations (DMO) Bills

In keeping with the Central Bank's strategic objective of 'Assessing and Promoting Capital Market Efficiency', the Bank for the first time auctioned a one-year debt management Treasury bill on March 27, 2019. Previously, the Bank had only issued debt management bills in tenors of 91 and 182 day (3-Month and 6-Month), although the Bank routinely issues Open Market Operations (OMO) Bills of the one year tenor. In contrast to debt management bills, OMO bills are tools of monetary policy used to manage liquidity, and the proceeds derived from the issuing of such bills are generally sterilised in blocked accounts. These have generally been auctioned directly to commercial banks classed as Primary Dealers, and some non-bank financial institutions (NFIs), who may then on-sell to other institutions and individuals. Debt management bills on the other hand are used to finance government operations and the public and institutions other than the designated primary dealers may invest directly in them. The proceeds from the auctioning and issuance of debt management bills go to the Central Government Consolidated Fund. However, the current reliance of the Central Government on private placements via commercial banks for financing has softened the institutional demand for short-term instruments in general, both OMOs and debt management bills.

It is expected that the issue of the new one-year Treasury bill will garner greater interest amoong individuals. In the main, this will be because of lower 'shoe-leather' costs, that is, because of the longer tenor of the bill, investors will need to make fewer visits to the Bank to roll-over their Treasury bill investments. Low shoe-leather cost is an attractive quality in an instrument. Investors will also welcome the one-year Treasury bill because it provides another tenor with which to diversify their portfolios. This is important particularly with respect to the role of short-term bills in managing interest rate risk. More indirectly, it is also expected that issuing one-year debt management bills could influence commercial banks to pass on more of the spread they earn to depositors. Specifically, since participation in the auction is open to the public and since proceeds from the one-year Treasury bill go the Consolidated Fund at the Central Bank, the spread earned on these bills is expected to attract investors currently holding liquidity in the form of deposits at commercial banks. Commercial banks may increase their interest rates paid on one-year deposits to compete for funds that could be lured away with the advent of the one-year debt management bill.

In general, an increase in the availability of investment instruments is considered to reflect financial broadening. Broader financial markets are more liquid and more likely to facilitate the transmission of monetary policy. In jurisdictions where policy is transmitted through a benchmark interest rate, this is particularly beneficial. Increased availability of financial assets means that they will be more likely to be held on the balance sheets of households and firms. If they are held widely, the scope for changes in official interest rates to pass-through to the economy via these instruments will be broader. The debt management auctions are open to public and are advertised in daily newspapers as well as on the Central Bank's website. While the Bank is scheduled to issue over thirty short-term debt management instruments in 2019, it is expected that the Bank will auction one year debt management instruments at least once a quarter for the rest of 2019. **Table 1** reflects these scheduled issues:

Table 1: Scheduled Issues of One Year Debt Management Instruments in 2019

Issue No.	Issue Date	Maturity Date	No. of Days	Face Value ($m)
1598	27-Mar-19	25-Mar-20	364	75
1606	12-Jun-19	10-Jun-20	364	50
1614	4-Sep-19	2-Sep-20	364	75
1622	20-Nov-19	18-Nov-20	364	75

Source: Central Bank of Trinidad and Tobago

Consolidated system credit, which expanded moderately throughout 2018, decelerated in early 2019 **(Chart IVd)**. Overall system credit expanded by 5.6 per cent (average) during 2018 before slowing to 3.5 per cent (year-on-year) in March 2019. Consolidated system credit was shored up by consumer and real estate mortgage lending, while lending to businesses was downcast throughout 2018 and became negative by early 2019.

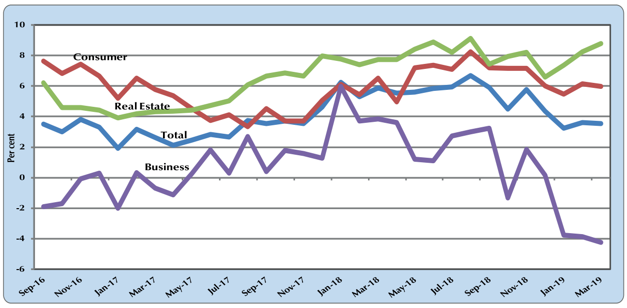
Business lending, which has been generally subdued for the past five years, continued a similar trend into early 2019. Lending to businesses has been reflective of overall economic activity particularly in the non-energy sector. Data to March 2019 show a decline in business lending of 4.3 per cent (year-on-year). Lending to the construction sector remains depressed after declining throughout 2018 and into 2019. Similarly, lending to the manufacturing sector has been depressed since December 2017 mostly on account of a falloff in lending to the chemicals and non-metallic minerals sub-sector of manufacturing. On the other hand, lending to the finance, insurance and real estate sectors continues to grow.

Both consumer lending and real estate mortgage lending propped up overall system credit. On a year-on-year basis lending to consumers averaged 6.7 per cent over 2018 compared to an average of 4.6 per cent over 2017. Data to March 2019 show consumer lending expanding by 6.0 per cent (year-on-year). The steady growth in consumer credit has been supported by double digit growth in lending for debt consolidation and refinancing. Growth in lending for the purchase of motor vehicles decelerated again in 2019 after a similar outturn 2018. Conversely, credit card lending remains a strong category of consumer lending. On the real estate mortgage lending front, a generally low interest rate environment has helped to boost real estate mortgage lending. Interest rates on new residential mortgages have been declining since 2017, thus driving the expansion in real estate mortgage lending. Throughout 2018 real estate mortgage lending has expanded by an average of 7.9 per cent compared to an average growth rate of 5.4 per cent in 2017. In March 2019 real estate mortgage lending grew by 8.8 per cent and is set to keep on trend for the second quarter of 2019.

The monetary aggregates were boosted in the latter part of 2018 partially by increased liquidity in the system. Toward the end of the year and into 2019 growth in the monetary aggregates has decelerated. In March 2019 M1-A which comprises currency in active circulation plus demand deposits grew by 0.8 per cent after posting small growth in January of 0.1 per cent. M2 which includes both time and saving deposits, expanded by 2.4 per cent in March 2019 compared to 0.8 per cent in February 2019.

Foreign currency loans declined towards the end of end of 2018 into 2019, after fluctuating in 2016 and 2017. On a year-on-year basis foreign currency loans declined by an average of 10 per cent in the last quarter of 2018. Early in 2019 foreign currency lending remained weak, falling by 11.3 per cent in March 2019. Foreign currency loans to businesses, which comprise approximately 95 per cent of total foreign currency loans contracted in March 2019 by 19.5 per cent following a decline of 18.7 per cent in December 2018.

Chart IVd:
Private Sector Credit to the Consolidated Financial System
Year-on-Year Per Change



Source: Central Bank of Trinidad and Tobago

Financial Sector Developments

Developments in the Local Foreign Exchange Market

Over November 2018 to May 2019, supplies of foreign exchange from public sources increased, but the general tightness in the market remained. Purchases of foreign exchange by authorised dealers from the public amounted to US$2,587.2 million, a 10.2per cent increase from the corresponding period a year earlier. Over the reference period, energy sector inflows were responsible for 67.5 per cent of the total purchases from the public.

Year-on-year sales of foreign currency by authorised dealers also rose over November 2018 to May 2019, to US$3,617.7 million, 13.3 per cent higher relative to the same period a year earlier **(Table IVb)**. Retail and distribution absorbed the largest share of foreign currency sales (28.4 per cent) with Credit Cards absorbing 24.3 per cent and Manufacturing, 9.7 per cent. Furthermore, increased sales of foreign currency to Energy Companies have been reported over the last seven months, amounting to 10.8 per cent of total sales. Over January 2016 to October 2018, energy companies absorbed 1.4 per cent of total sales. This development corresponds with large sales of foreign currency to the new fuel trading company formed following the closure of Trinidad and Tobago's major crude oil refining company in late 2018.

In the context of higher public supplies to the market, the Central Bank sold US$826.0 million to authorised dealers, which was 8.7 per cent less than a year earlier.

In May 2019, the monthly weighted average selling rate stood at US$1 = TT$6.7819, a slight depreciation from US$1 = TT$6.7813 in November 2018.

Table IVb: Authorised Dealers: Foreign Exchange Market Activity (US$ Millions)

Date	Purchases from Public	Sales to Public	Net sales	Purchases from CBTT[1]
2014	5,525.2	6,956.0	1,430.8	1,715.0
2015	4,941.3	7,382.5	2,441.2	2,640.9
2016	4,289.0	5,776.8	1,487.8	1,811.6
2017	3,606.9	5,195.3	1,588.4	1,816.0
2018	4,101.4	5,677.4	1,576.0	1,501.0
Nov 2017 to May 2018	2,347.3	3,192.7	845.4	905.0
Nov 2018 to May 2019	2,587.2	3,617.7	1,030.5	826.0
Y-o-Y Per cent Change	**10.2**	**13.3**	**21.9**	**-8.7**

Source: Central Bank of Trinidad and Tobago

[1] Purchases from the Central Bank of Trinidad & Tobago include transactions under the Foreign Exchange Liquidity Guarantee facility.

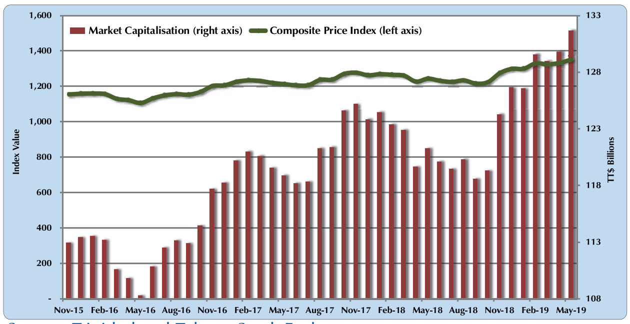
Stock Market Developments

Trinidad and Tobago's stock market recorded an improvement over the eight-month period, October 2018 to May 2019 **(Chart IVe)**. The major Composite Price Index (CPI) was up 11.1 per cent, while total stock market capitalisation gained 11.0 per cent to end May 2019 at $131.7 billion. The market expansion was supported by a 22.8 per cent jump in the Cross Listed Index (CLI) and a 6.2 per cent increase in the All Trinidad and Tobago index (ATI). Conversely, during the same period one year earlier, the CPI grew by just 0.4 per cent, buoyed by a 9.4 per cent gain in the CLI and despite a 3.0 per cent decline in the ATI.

Over the review period, most of the sub-indices on the local exchange displayed positive movements with the exception of Energy and Manufacturing II. The Banking and Manufacturing I sub-indices were the best performers, producing returns of 16.3 per cent and 12.3 per cent, respectively **(Charts IVf and IVg)**. Within Banking, the NCB Financial Group Limited climbed 47.5 per cent over the period following an increase in net interest income, foreign exchange gains from the appreciation of the Jamaican dollar, and higher earnings per share. Meanwhile, the Manufacturing I sub-index was propelled by the West Indian Tobacco Company Limited (WCO) (24.4 per cent) following an increase in profits and earning per share. Other sub-indices to post positive movements were Trading (8.8 per cent), Conglomerates (6.9 per cent), and Property (0.8 per cent). Conversely, the Energy (-3.0 per cent) and Manufacturing II (-9.3 per cent) sub-indices both registered declines over the period. The Manufacturing II sub-index fell, influenced by a 9.9 per cent plunge in the share price of Trinidad Cement Limited (TCL), reflecting declines in the company's revenue and earnings per share as a result of slow construction activity during 2018.

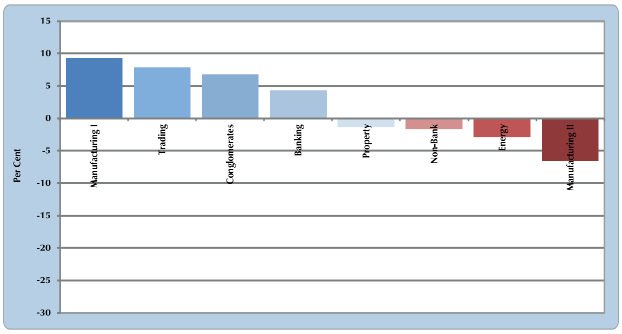
Over the eight months ending May 2019, the value of shares exchanged on the domestic stock exchange rose although the volume of shares traded declined. Over the period, 49.9 million shares were traded at a total value of $770.7 million compared to 53.3 million at a total value of $720.9 million in the comparative period.

Chart IVe: Composite Price Index and Stock Market Capitalisation



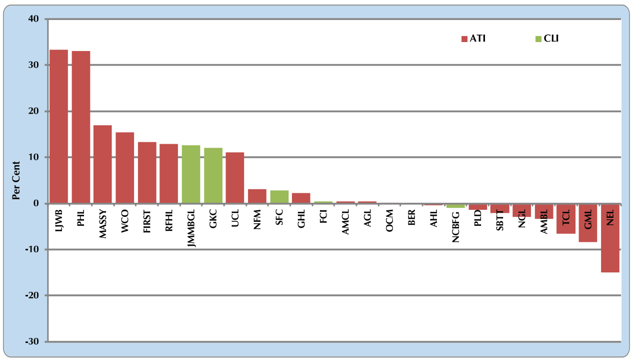
Source: Trinidad and Tobago Stock Exchange

Chart IVf: Trinidad and Tobago Stock Market Sub-Indices (October 2018 to May 2019)



Source: Trinidad and Tobago Stock Exchange

Chart IVg Trinidad and Tobago Individual Stock Prices (October 2018 to May 2019)



Source: Trinidad and Tobago Stock Exchange

Primary Debt Market Activity

Provisional data suggests that over the six month period from October 2018 to March 2019, primary debt market activity was slightly lower in value **(Table IVc)**. Over the period, the market witnessed nine primary placements financing TT$3,790.0 million, compared to the same number of issues raising TT$4,987.8 million in the same period one year earlier. The Central Government and state enterprises continued to be the chief borrowers on the primary debt market. Over the period the Central Government financed TT$2,982.4 million via five placements for the purpose of facilitating budgetary obligations and financing outstanding closure costs relating to Petrotrin. Only one state enterprise, Trinidad and Tobago Mortgage Finance (TTMF), entered the market raising TT$400.0 million while the Home Mortgage Bank (HMB) borrowed TT$377.5 million. Reflective of the domestic economic conditions and the Central Government's dominance in the bond market, only one private sector firm accessed financing in the market over the period. In comparison, during the same period in 2017/2018, the Central Government borrowed roughly TT$3.9 billion via four issues while two state enterprises and HMB financed TT$712.2 million and TT$400 million respectively.

Secondary Bond Market Activity

Activity on the secondary government bond market fell significantly over the period October 2018 to march 2019, likely due to an increase in activity in the secondary corporate bond market. Over the period 32 Central Government bond trades occurred with a cumulative face value of $69.0 million, compared to 52 trades with a face value of $609.6 million in the similar period one year earlier. Secondary corporate bond market activity continued to grow over the review period with 49 trades at a face value of $49.6 million. This follows the listing of the three National Investment Fund Holding Company Limited (NIFHCL) bonds in September 2018.

Table IVc: Primary Debt Security Activity October 2018 to March 2019[p]

Period issued	Borrower	Face value (TT$ M)	Period to Maturity	Coupon rate Per annum (Per cent)	Placement Type
Nov-2018	Central Government of Trinidad and Tobago	640.0	15.0 years	Fixed rate 5.45%	Private
	HADCO	30.0	9.5 years	Fixed rate 6.25% for 5 years, then reset	
	Home Mortgage Bank (HMB)				
	- Tranche 1	134.0	7.0 years	Fixed rate 4.75%	
	- Tranche 2	43.5	7.0 years	Fixed rate 4.65%	Private
	Central Government of Trinidad and Tobago	500.0	3.0 years	Fixed rate 3.40%	Private
	Central Government of Trinidad and Tobago	1,200.0	1.0 years	Fixed rate 3.05%	Private
Dec-2018	Trinidad and Tobago Mortgage Finance Company Limited (TTMF)	400.0	5.0 years	Fixed rate 4.70%	Private
January 2019 to March 2019					
Feb-2019	Central Government of Trinidad and Tobago	500.0	4.0 years	Fixed rate 3.70%	Private
Mar-2019	Home Mortgage Bank (HMB) - Collateralised Mortgage Obligations	200.0	Multiple	Variable Rates: 2.05% to 5.75%	Private
	Central Government of Trinidad and Tobago	142.44 (US$21.0M)	6.0 years	Fixed rate 5.00%	Private

Source: Central Bank of Trinidad and Tobago

p Provisional.

Central Government Yield Curve[13]

Over the six-month period, October 2018 to March 2019, the Central Government yield curve generally displayed an upward shift, apart from a few medium- and long-term tenors **(Chart IVh)**. Over the period, the short-term three-month rate increased by 2 basis points to 1.32 per cent while the one-year rate grew by 14 basis points to 2.89 per cent. On the longer end of the curve, the ten-year rate jumped by 9 basis points to 4.48 per cent, while the 15-year rate expanded by 8 basis points to 5.19 per cent. Reflective of the general upward shift in yields, the Central Government Bond price Index slipped marginally by 0.6 per cent while the Total Return Index gained 2.6 per cent over the October 2018 to March 2019 review period.

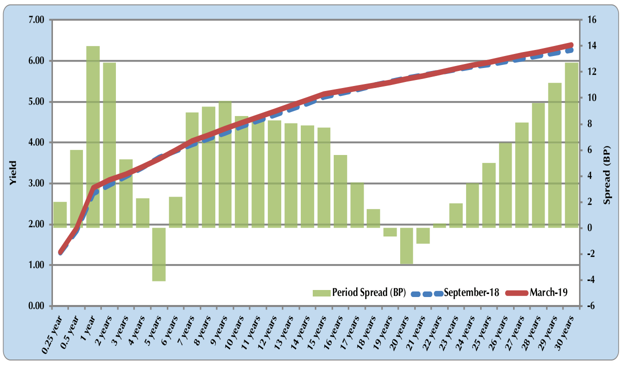
Mutual Fund Market[14]

The local mutual funds industry improved during the first quarter of 2019 **(Chart IVi)**. Aggregate funds under management[15] grew by 2.4 per cent to TT$45,313.1 million compared to a decline of 0.5 per cent in the same period one year earlier. The improvement in the industry was largely due to Money Market funds which jumped by 6.8 per cent to TT$10,199.5 million, largely due to substantial subscriptions during the period. Furthermore, Equity funds continued to improve, increasing by 4.6 per cent to TT$6,765.6 million, while funds classified as 'Other' grew by 4.1 per cent to TT$364.3 million. On the other hand, Income funds experienced a marginal 0.4 per cent gain, ending the period at TT$27,983.7 million. In comparison to the same period in 2018, all fund types experienced declines except for Money Market funds which witnessed a 3.2 per cent improvement.

In terms of currency profile, both domestic and foreign currency funds improved over the first quarter of 2019. Over the period, domestic currency funds increased by 2.7 per cent to TT$36,529.1 million, while foreign currency funds grew by 1.3 per cent to the equivalent of TT$8,784.0 million. In comparison, during the first quarter of 2018, domestic currency funds slipped by 0.1 per cent while foreign currency funds declined by 2.3 per cent.

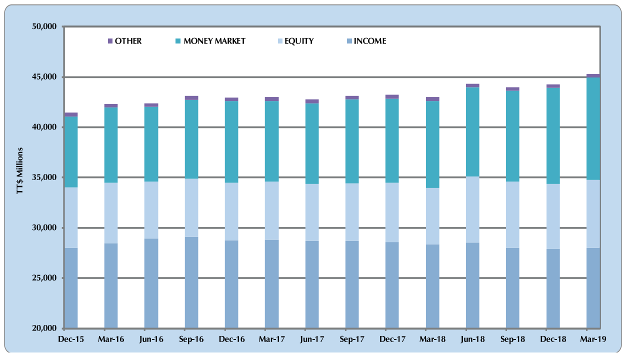
Over the first three months of 2019 the industry witnessed net sales of TT$436.3 million, reflecting total sales of TT$4,061.7 million and total redemptions of TT$3,625.5 million. Money Market funds experienced the largest net sales subscriptions at TT$597.3 million, while Equity funds and 'Other' funds witnessed negligible net subscriptions of TT$5.6 million and TT$3.3 million respectively. On the other hand, an overall net redemption of TT$169.9 million was recorded in Income funds. In terms of currency, TT dollar funds posted $468.5 million in net sales during the first quarter of 2019. Foreign currency funds however, witnessed the equivalent of TT$32.2 million in net redemptions, despite foreign currency funds experiencing an increase in funds under management.

Chart IVh
Trinidad and Tobago Central Government Treasury Yield Curve



Source: Central Bank of Trinidad and Tobago

Chart IVi
Mutual Funds - Aggregrate Fund Value



Source: Central Bank of Trinidad and Tobago

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13 The TT Treasury Yield Curve is constructed monthly by the Central Bank of Trinidad and Tobago and is based on information from Domestic Market Operations, the Trinidad and Tobago Stock Exchange (TTSE) Secondary Government Bond Market, and market reads from market participants.

14 In September 2018 a reclassification of funds used in this analysis was undertaken to more accurately represent the industry characteristics.

15 Aggregate funds under management refer to mutual fund information collected by the Central Bank of Trinidad and Tobago, including funds managed by the Trinidad and Tobago Unit Trust Corporation, Royal Bank of Trinidad and Tobago, Republic Bank Limited and First Citizens Bank Limited.