July 2020

REPORT OF THE BOARD OF DIRECTORS TO CONGRESS

Banco de la República
Bogotá, D. C., Colombia

ISSN - 2145-6801

Bogotá, 3 August 2020

To
PRESIDENTS AND OTHER MEMBERS
Honorable Chairmen and Members Third Standing Constitutional Committees of

The Senate of the Republic
The House of Representatives

Dear Sirs:

In compliance with Act of Congress 31/1992, article 5, the Board of Directors of *Banco de la República* hereby submits to the Congress of the Republic of Colombia a report on the macroeconomic results for the first half of 2020, the outlook for the remainder of the year, and the measures *Banco de la República* has recently taken within the framework of the emergency caused by Covid 19 for its consideration. Furthermore, the breakdown of the foreign reserves and their returns, the financial position of the Bank, and its forecasts for 2020 are described.

Cordially,

Juan José Echavarría

Juan José Echavarría
Governor

Content

01 Introduction **/9**

02 Macroeconomic Environment and Measures Taken by *Banco de la República* in 2020 **/17**
2.1 Global Covid-19 Shock and Deterioration of the Country's External Conditions **/17**
2.2 Measures Implemented by the BDBR to Address the Negative Effects of the Pandemic **/20**
2.3 Change in the Financial and Loan Markets **/25**
2.4 Change in Economic Activity, Labor Market, and Balance of Payments **/34**
2.5 Changes in Inflation **/41**

03 Foreign Reserves Management **/44**
3.1 Breakdown of the Investment Portfolio **/45**
3.2 Profitability of the Reserves **/45**
3.3 Measures to Reinforce International Liquidity **/46**
3.4 Reserve Indicators **/48**

04 Financial Situation of *Banco de la República* **/50**
4.1 Financial Position of *Banco de la República* (balance sheet) **/50**
4.2 Income Statement (L&P) **/52**

Shaded text 1: Monetary Base and M3 **/57**
Shaded text 2: Regional Economic Pulse: January to June 2020 **/59**
Shaded text 3: Colombia's Foreign Balance in the First Quarter of 2020 **/62**
Shaded text 4: Recent Trend in Demand for Cash **/65**
Shaded text 5: Participation of ***Banco de la República*** in the Bank for International Settlements **/68**

Appendix: Management Policy for the International Reserve Investment Portfolio **/70**

Graphs

Graph 2.1 Projected Global Economic Growth /17
Graph 2.2 Actual Exports and Global Container Traffic /17
Graph 2.3 Policy Interest Rates in Advanced Economies /18
Graph 2.4 Income from Workers' Remittances in Colombia /18
Graph 2.5 Terms of Trade and International Oil Price /19
Graph 2.6 Volatility Index of International Financial Markets, Nominal Exchange Rate, and Risk Premia (five-year CDS) for some Economies in the Region /19
Graph 2.7 Nominal Exchange Rate and Oil price /26
Graph 2.8 Interest Rate Indices in Some Emerging Economies /26
Graph 2.9 Zero-coupon COP TES Rate by Term, Private Debt Index, and Monetary Policy Rate /26
Graph 2.10 Net Monthly Flows of Portfolio Investment to Colombia and Latin America /27
Graph 2.11 Aggregate Indicators for Capital Adequacy and Liquidity /27
Graph 2.12 Balances of Demand and Term Deposits /28
Graph 2.13 Interest Rate and Balance of Ordinary Active Savings Deposits /28
Graph 2.14 Rates and Term Deposits /29
Graph 2.15 Rates and Disbursements of Commercial Loans /30
Graph 2.16 Loan Rates and Disbursements to Households and Micro-Businesses /30
Graph 2.17 Credit Establishments' Perception of Credit Demand and Change in Requirements for Granting New Loans /33
Graph 2.18 Growth of the Risky and Past-Due Loan Portfolios /33
Graph 2.19 Portfolio Covered by Grace Periods, by Category /34
Graph 2.20 Economic Monitor Index (EMI) /34
Graph 2.21 Changes in Employment /38
Graph 2.22 Changes for Inactivity /38
Graph 2.23 Unemployment Rate by Domain /39
Graph 2.24 Consumer Price Index (CPI) /41

Graph 3.1 Breakdown of the Gross Foreign Reserves /44
Graph 3.2 Breakdown of Investment Portfolio by Sector /45
Graph 3.3 Distribution of Investment by Credit Rating /45
Graph 3.4 Currency Components of the Investment Portfolio /45
Graph 3.5 Historical Profitability of the Foreign Reserves /46

Graph 4.1 International Price of Gold /54

Tables

Table 2.1 Real Annual GDP Growth by Type of Expenditure, seasonally and calendar adjusted series **/35**
Table 2.2 Real Annual GDP Growth by Branches of Economic Activity **/36**
Table 2.3 Consumer Price and Core Inflation Indicators **/42**

Table 4.1 *Banco de la República's* Financial Position Classified by Economic Criteria **/51**
Table 4.2 *Banco de la República's* Income Statement **/53**
Table 4.3 Return on Foreign Reserve Investments **/54**
Table 4.4 Forecast for *Banco de la República's* 2020 Income Statement **/56**

01 / Introduction

In Colombia, as well as in the rest of the world, the Covid-19 pandemic has seriously damaged the health and well-being of the people. In order to limit the damage, local and national authorities have had to order large sectors of the population to be confined at their homes for long periods of time. An inevitable consequence of isolation has been the collapse of economic activity, expenditure, and employment, a phenomenon that has hit many countries of the world affected by the disease. It is an unprecedented crisis in modern times, not so much for its intensity (which is undoubtedly immense), but because its origin is not economic. That is what makes it so unpredictable and difficult to manage. Naturally, its economic consequences are enormous. Governments and central banks from all over the world are struggling to mitigate them, but the final solution is not in the hands of the economic authorities. Only science can provide a way out.

In the meantime, the economic indicators in Colombia and in the rest of the world cause concern. The output falls, the massive loss of jobs, and the closure of businesses of all sizes have become daily news. Added to this, there is the deterioration in global financial conditions and the increase in the risk indicators. Financial volatility has increased and stock indexes have fallen. In the face of the lower global demand, export prices of raw materials have fallen, affecting the terms of trade for producing countries. Workers' remittances have declined due to the increase of unemployment in developed countries. This crisis has also generated a strong reduction of global trade of goods and services, and effects on the global value chains.

Central banks around the world have reacted decisively and quickly with strong liquidity injections and significant cuts to their interest rates. By mid-July, such determined response had succeeded to revert much of the initial deterioration in global financial conditions. The stock exchanges stopped their fall, and showed significant recovery in several countries. Risk premia, which at the beginning of the crisis took an unusual leap, recorded substantial corrections. Something similar happened with the volatility indexes of global financial markets, which exhibited significant improvement. Flexibilization of confinement measures in some economies, broad global liquidity, and fiscal policy measures have also contributed to improve global external financial conditions, albeit with indicators that still do not return to their pre-Covid levels.

The Global Shock

Within a context of high uncertainty, several international organizations have revealed their forecasts regarding the economic consequences of this crisis. There are, however, substantial differences among them depending on the assumptions as to the extent and duration of the pandemic.

For example, in its June review the International Monetary Fund (IMF) amended its global economy forecasts for 2020 to a -4.9% contraction *vis-à-vis* -3.0% considered in April. On the other hand, the World Bank forecasts for this year that the global economy will contract by -5.2%, while the Organization for Economic Cooperation and Development (OECD) considers a -6.0% fall. Some organisms consider more negative scenarios should there be a new outbreak of the disease. In general, global economic activity is expected to recover in 2021 at a pace slightly above 5.0%.

According to the IMF, all regions and major economies of the world would face strong contractions in 2020, except for China, which would achieve a 1.0% growth figure. Latin America and the Caribbean are anticipated to fall -9.4%, somewhat more than advanced economies (-8.0%), but less than estimated for the euro zone (-10.2%). The strong contraction in Latin America would be due to the bad results anticipated for Brazil (-9.1%), Mexico (-10.5%), and Peru (-13.9%). Chile and Colombia, with -7.5% and -7.8% falls, respectively, in 2020, would be relatively better off. For 2021, the region would recover at a pace of 3.7%, lower than the figure for global economy (5.4%). Colombia would reach a 4.0% growth figure.

Conditions at the Onset of the Shock

In the face of such an unexpected and devastating shock as the Covid-19, Colombia was fortunate to be found at the beginning of the crisis in a strong position, both in its institutional framework as well as in its macroeconomic performance. This is a valuable asset to face the ordeal that the country is going through.

From the institutional standpoint, monetary policy under inflation targeting has achieved high credibility, thus becoming a fundamental pillar of the country's macroeconomic stability. After reaching the 3.0% long-term inflation target in 2009, its subsequent deviations have only obeyed to transitory shocks that have not affected its credibility in the medium term. The flexibility of the exchange rate, which is an inherent component of the inflation-targeting strategy, has been essential to overcome shocks such as the global financial crisis and the fall of oil prices in 2014. Subsequent studies showed that, had it not been for such flexibility, the shocks would have beaten the economy with greater force and its recovery would have taken longer[1]. Another strength of the Colombian economy lies in the strength of its financial system. The timely adoption of macro-prudential measures, the strict supervision of financial institutions, and compliance with international standards such as Basel III enabled the financial sector to be well prepared to deal with a shock of this magnitude.

Unlike some countries in the region, Colombia's economy has other characteristics that add to its strength. For example, the fact that this is not a semi-dollarized economy and that currency mismatches are not large and have been properly identified and monitored allows the economy to live together with the inevitable fluctuations in the exchange rate that result from this situation, without fear of financial or real sector bankruptcy. Finally, as was shown recently by the Ministry of Finance when launching the *Medium-Term Fiscal Framework 2020*, the National Central Government (NCG) reached in 2019 the lower fiscal deficits since 2014 and the first primary surplus since 2012, consolidating the downward path since 2016. In this context, prior to the Covid-19 shock, it was expected that public finances would continue to gradually adjust the deficit, thus complying with the provisions of the Fiscal Rule.

As for macroeconomic performance, in 2019, the country's economy grew 3.3%, a rate that exceeded our peers in the region, and widely exceeded the average for Latin America and the Caribbean, which only expanded 0.1%. This good result led the Colombian economy to almost close the negative output gap that widened after the fall of oil prices in 2014. As a result, the confidence of entrepreneurs and traders strengthened, and the credit market was stimulated. This was reflected in positive macroeconomic prospects for this year, pointing at a growth figure

1 "A Crude Oil Shock: Explaining the Impact of the 2014-16 Oil Price Decline across Exporters," IMF Working Paper No. 17/160, International Monetary Fund;

"Crisis and Recovery: Role of the Exchange Rate Regime in Emerging Market Countries", IMF WorkingPaper, No. /10/242, International Monetary Fund.

equal to or slightly higher than the one for 2019. Economic performance during the first two months of the year was in line with those expectations, as was shown by the economic monitoring index (ISE) produced by the National Administrative Department of Statistics (DANE), according to which, in annual terms, the economy expanded by 3.7% in January and by 3.0% in February in the seasonally and calendar effects adjusted series.

These strengths of the country's economy, recognized by markets and risk rating agencies, do not imply that the country may be enjoying economic slack. The oil price shock in 2014 left sequels that limited the scope of economic policy at the end of 2019 and that required reforms to be overcome. For example, the gross debt of the NCG, which was 36.6% of GDP in 2013, increased to 50.3% at the end of 2019, which, compared to other countries, reduced the fiscal space to deal with a crisis as complex as the current one. On the other hand, although the pace of economic activity was recovering, there was still spare capacity in the economy. The weakness of economic activity and the distortions of the labor market led the national unemployment rate to increase from 8.4% in 2013 to 9.5% by the end of 2019. As for the external balance, the current account deficit increased from 3.2% of GDP in 2013 to 4.3% by the end of 2019. All this means that the country required to advance an agenda of structural reforms that would consolidate economic recovery, ensure fiscal sustainability, reduce the unemployment rate, and foster greater equity. The serious consequences that this crisis leaves increase the need for such reforms.

Deceleration

The good economic outlook at the beginning of the year turned over with the arrival of Covid-19. Colombia had several weeks to prepare its health system and establish management protocols, alerted by the severity of the disease. However, in the economic sphere, although the country was recovering, consequences were inevitable.

In addition, as an oil exporting country, Colombia faces a second negative shock due to the deterioration of the country's terms of trade that have resulted from the fall of oil prices, which has been reflected in a loss of national income. This fall in prices originated in the significant reduction of the demand for fuels as a result of the reduced mobility of the population, the restriction to air travel, and the contraction of global economy. Added to this were the geopolitical tensions recorded at the beginning of March between Russia and Saudi Arabia, which delayed the implementation of additional cuts in oil production by the OPEC and other producing countries. This led to expectations of increase in supply and contributed to intensify oversupply in the market.

The beginning of mandatory preventative isolation in most of the Colombian territory as of 20 March abruptly halted productive activity in important sectors of the economy. This was shown by the ISE, which exhibited for March a 4.9% fall, despite the fact that the isolation only covered the last third of the month. This was reflected in the figure for GDP for the first quarter, which only expanded 0.4% on a yearly basis, according to the seasonally adjusted series and adjusted for calendar effects (1.1% annually for the original series). This performance was significantly lower than in the fourth quarter of 2019 (3.4%) and that of the whole previous year.

The decline of the economic situation worsened in April: real industrial production exhibited an annual -35.8% contraction; total retail sales fell -42.9% on a yearly basis, and the consumer confidence index stood at a historic minimum level (- 41.3). The ISE corroborated this deterioration by registering an annual decline of output of -20.5% in April, the largest of the entire series. This contraction was mainly due to lower activity of all branches of secondary production (industry and construction, -50.1%), and tertiary (services and trade, -13.3%).

Monetary Policy Response

Banco de la República's policy response to deal with this crisis resembles that of the main central banks around the world: it was quick, it provided a significant injection of liquidity to financial markets; it used new ways to facilitate hedging and thus alleviate the shortage of liquidity in foreign exchange markets; and it cut the benchmark interest rate significantly. Regarding the provision of liquidity, the actions taken by the Central Bank have been greater compared to those implemented by some other central banks from emerging countries.

These decisions were based on technical assessments that showed a general increase in the preference for liquidity by households and companies facing increased uncertainty. Similarly, the greater risk perception by financial intermediaries discouraged a broad group of economic agents from initiating debt portfolios. Under these circumstances, the Central Bank reacted by providing the market with ample liquidity in pesos and US dollars, while reducing the benchmark interest rate. These measures have contributed to protect the payments system and to stabilize markets such as foreign exchange and public and private debt instruments, which were under pressure. Similarly, they gave support to the credit supply and helped to reduce the financial burden on household and corporations.

The measures adopted, whose characteristics are detailed in this report, included: 1) the extension of transitory expansion operations in their amounts, counterparts, guarantees, and terms. The access to liquidity resources granted to a greater number of institutions and the inclusion of private debt instruments as collateral for liquidity tenders additional to the usual public debt should be noted; 2) the permanent injection of liquidity into the economy through the purchase of public debt instruments and securities issued by credit institutions; 3) the reduction of the reserve on bank deposits, which allowed to inject permanent liquidity to the market and to reduce intermediation costs; 4) the introduction of modern intervention mechanisms in the foreign exchange market to facilitate hedging and expand liquidity in US dollars without affecting the amount of the country's foreign reserves; and 5) the reduction of the policy interest rate by 175 basis points (bp) from 4.25% to 2.50% by the end of June, thus placing it at a historic minimum.

This considerable relaxation of monetary policy will stimulate economic activity inasmuch as the cuts to the benchmark interest rate and the expansion of liquidity be transmitted to the operation of the financial and credit markets. At the end of June, the majority of the interest rates for credits had fallen and stood at lower levels or similar to those observed before the pandemic, except for consumer draft loans, treasury commercial credits, and micro-credit. As for the amounts for credit, recent data show a significant reduction in average weekly disbursements in all modalities. This is because with the current situation they have been affected by sudden movements both in supply and demand. Such is the case mainly for consumer credit, including credit cards, whose reduction in the amounts disbursed and in rates suggests a strong contraction of demand for these resources.

Inflation

The relaxation of monetary policy has been consistent with the evolution of prices and with the 3.0% inflation target on a yearly basis. During the past few months there have been bearish pressures on prices largely due to the fall of aggregate demand and the reliefs decreed by the NCG. So, at the end of June, the annual headline inflation rate stood at 2.19%, and the average of the four core inflation indicators at 2.03%. The decline of inflation during the second quarter covered all lines of the family basket, except for health. Even the adjustment of food prices, which recorded an increase due to weather complications and to the recomposition of household spending in this group at the beginning of the quarantine, ended up receding. On the other hand, prices in the group for tradable goods, from which increases were feared due to the strong devaluation of the exchange rate at the beginning of the pandemic, recorded an annual 0.61% variation on a yearly basis at the end of June, i.e., less than one quarter of the figure in February (2.51%). Finally, at the end of June, the prices of the basket of regulated items recorded a negative annual variation (-0.78%) as a result of the subsidies in the rates of public utilities and the decline in the price of fuels. Toward 2021, inflation would rebound once the transitional effects of the reliefs are reversed and the economy recovers gradually. In line with this, inflation expectations, which have reduced along with observed inflation, should converge to the 3.0% target.

Employment

One of the most serious consequences of the Covid-19 pandemic has been the massive loss of employment around the world and in Colombia. In our case, the labor market indicators published by DANE for April exhibited a generalized and unprecedented deterioration. The number of occupied individuals registered an annual 24.5% contraction in the national total (i.e., 5.3 million jobs) and 27.9% in the thirteen main cities (3 million jobs) *vis-à-vis* the same month in 2019. This meant the loss of about a quarter of the level of employment prior to the crisis. Additionally, the inactive population recorded a 29.0% increase (i.e., 4.3 million inactive individuals), which, in part, was due to movement restrictions that affected the search for employment. The higher inactivity contained the increase of the unemployment rate by excluding a significant proportion of the population from the labor force. Even so, the unemployment rate for the national total reached 19.9% and for the 13 cities increased to 23.8%, approximately doubling the levels in unemployment observed in April 2019.

After a strong deterioration of the labor market in April, during May, a slight rebound in the level of employment was observed thanks to the flexibilization of the isolation measures that initially allowed the restart of the construction sector and some industries, and some segments of trade and repair later on[2]. So, *visà-vis* April, in May, occupied individuals for the national total increased by more than 930,000 and in the thirteen cities close to 640,000. Despite this increase, the unemployment rate continued to increase, reaching 21.2% for the national total and 24.6% for the 13 cities, the highest figures in the series. This result is explained by the fact that the easing of the restrictions imposed on mobility allowed part of the inactive population to return to the labor market in search of employment. With this, the supply of workers increased more than their demand, which was reflected in increments in the unemployment rate.

In the moving quarter ending in May, the fall in the number of occupied individuals affected both salaried and non-salaried workers, which decreased by 19.5% and 20.0%, respectively, *vis-à-vis* the same period of 2019. The sectors of trade and repair, manufacturing industries, and artistic activities contributed the most to this loss of employment. Inasmuch as several productive sectors continue reactivating, the increase of occupation is expected to continue in the upcoming months. In this context, the technical staff expects that, towards the end of 2020, the unemployment rate would have retracted from the peak reached in May and stand within a range between 16.5% and 19.0%. This forecast is similar to the one

2 Decrees 593,636, and 689 of 2020.

recently presented by the OECD for its member countries[3], estimating 17% unemployment for Colombia at the end of 2020, under the assumption that there won´t be a new outbreak of the disease.

External Balance

The results of the balance of payments for the first quarter of the year suggest that the current account deficit would tend to be reduced as a consequence of the crisis. This has been so in past episodes of negative external shocks and contraction of economic activity in Colombia. In fact, for the period from January to March, the current account deficit was reduced to 3.7% of the quarterly GDP from a 4.5% imbalance for the same period in 2019. This behavior is explained by two main opposing forces. On the one hand, the deficit in the trade balance for goods expanded by USD 103 million (m) facing a more pronounced fall of exports than of imports. The decline in exports originated mainly in the lower sales of oil and industrial products, while the fall of the value of imports was due to the slowdown in household expenditure and the decrease in gross capital formation. On the other hand, unlike the dynamics of the trade balance, the deficit on factor income decreased USD 667 m due to the fall of national expenditures as a result of the reduction in the profits from enterprises with foreign investment, particularly those operating in mining and quarrying activities; oil exploitation; transport and communications, and manufacturing industries.

In this way, the improvement in the balance of factor income was the determining factor for the reduction of the deficit in the current account deficit in the first quarter of the year. This is an interesting result because it shows the appropriate countercyclical role that companies with foreign capital play in the stabilization of the country's external balance facing negative external shocks of great magnitude as the one we are facing.

With the same rationale, the technical staff at the Central Bank estimates that the current account deficit in 2020 would be less than 4.3% of the GDP observed in 2019, although uncertainty in this regard is high and unprecedented, which has been reflected in a wide range for this forecast. The significant reduction of consumption and private investment expected, together with the depreciation of the currency, would lead to a sharp decline in the imports of goods and services. On the other hand, the revenues from companies with foreign capital would suffer a major contraction facing the slowdown of economic activity and lower export prices of commodities, mainly oil. The correction of the current account deficit implied by these two factors would be limited by the deterioration of the country's terms of trade and the lower external demand that affect the country's exports.

Capital flows required to fund the external deficit would come from foreign direct investment, which would remain a significant source of financing, although a reduction of these resources is expected due to the fall of oil prices and other commodities as well as to uncertainty regarding the future performance of the country's and global economy. Additionally, the country would maintain access to international capital markets within an environment of low interest rates and ample liquidity. In this case, greater indebtedness expected from the public sector with the purpose of addressing the extraordinary expenses associated with Covid-19 stands out.

---

3 OECD (2020). "OECD Employment Outlook 2020: Worker Security and the Covid-19 Crisis", OECD Publishing,Paris, available at: https://doi.org/10.1787/1686c758-en

On the other hand, net foreign reserves totaled USD 56,623.5 m at the end of June, with an increase of USD 3,456.3 m compared to the balance recorded in December 2019 due to the purchase of foreign currency by USD 2,000 m to the NCG and to the performance of the country's foreign reserves, which at the end of June was 3.16%, excluding the foreign exchange component. In addition, on 1 May 2020, the Executive Board of the International Monetary Fund approved the renewal of the Flexible Credit Line (FCL) for an amount equivalent to 384% of Colombia's quota (USD 10,800 m). This new agreement supersedes the previous one, adopted in May 2018. The FCL is an instrument of the IMF to which only countries with solid monetary policy, fiscal and financial frameworks can apply, together with a favorable history of economic performance. Colombia has had access to this line since its creation in 2009, and until now it has not needed to use it. The country has characterized this line of credit as precautionary, deeming it as a useful tool to strengthen the capacity of the economy to face external shocks. This new agreement will help to manage external risks within a context of high uncertainty and volatility, reinforcing confidence in the markets and as a safeguard for external risks.

The current level of the country's foreign reserves covers the projection of the current account deficit for the next twelve months plus the amortization of the foreign debt. Besides, the foreign reserves, along with the FCL from the IMF, cover such external financing needs and feasible capital outputs by residents and non-residents.

Finally, on 20 April, *Banco de la República* gained access to the REPOS with the Federal Reserve (FIMA, by its acronym in English). In these transactions, the holders of FIMA accounts exchange their United States treasury bonds held in the Federal Reserve for US dollars and commit to buying back the securities on the next day along with interest. The main benefit that access to FIMA brings *to Banco de la República* is to have liquidity in US dollars should this be necessary, without having to face adverse conditions of the market nor having to definitely sell the assets of the country's foreign reserve portfolios, thus mitigating the liquidity risk.

Growth and Inflation Outlook

After the sharp fall of economic activity in April, the gradual flexibility of preventative isolation since May allowed several economic sectors to be reincorporated into the productive activity. This was reflected in some signs of recovery. Thus, the ISE by DANE registered an annual -16.7% contraction in May, lower than the one recorded in April (-20.5%), which suggests a turning point for economic activity. Within this index, the record for secondary activities (manufacturing and construction industries) stands out, as it fell -31.96% in May compared to -50.12% in April. This shows that the moderation of the fall of economic activity came from these sectors, which were the first to be reactivated. Other indicators confirm this trend. The survey of industry and trade by DANE in May recorded an annual -26.2% variation in industrial production, a figure relatively lower than the one recorded in April (-35.8%). The survey also shows that the sales of retail fell 26.8% on a yearly basis in May, somewhat less than the records in April (-42.9%), which suggests a break in the trend for this sector. Other highfrequency indicators such as energy demand and gasoline consumption coincided in showing some improvement. Considering this information, the technical staff revised its forecast scenarios for the second quarter and for all 2020.

This exercise incorporated an estimate of the impact of the social isolation measures on added value for productive sectors. The most affected would have been artistic activities, entertainment, and recreation; trade, repair, transportation, and accommodation. On the contrary, the agricultural sector and public administration, education, and health would have maintained positive annual variations, reflecting in the agricultural sector the recomposition of private spending toward food products, and for public administration, education, and health, the Government's effort to mitigate the effects of the pandemic. The possible behavior of demand and its composition was also analyzed, anticipating the strong falls in the consumption of durable goods, gross capital formation, and exports. On this basis, the estimate by the technical staff suggests a decline in GDP for the second quarter of the year close to -16%, *vis-à-vis* the same period of the previous year.

The growth forecast for the whole year assumes that gradual recovery of the economic activity will continue during the second semester, depending on the evolution of the pandemic, over which there is great uncertainty. This reactivation would be possible thanks to the gradual opening of the productive sectors, which in turn would underpin the recovery of consumers' and investors' confidence. The forecast also considers the positive impact of fiscal and monetary measures taken to date. As for external demand, it is expected to continue weak, despite the flexibilization of the social isolation measures that several countries have undertaken. With all of the above, the technical staff at the Central Bank of Colombia estimates that economic growth throughout 2020 would stand within a range between -6.0% and -10%, which would imply a significant expansion of spare capacity in the economy. The amplitude of the forecast range reflects the uncertainty regarding the magnitude of the shock in the second quarter and on the evolution of the health situation, in the country as well as worldwide.

Regarding inflation, social distancing measures and lower levels of household spending will continue to exert downward pressures on prices. The downward trend of headline inflation has already been observed in the last few months, as shown by its 2.19% figure on a yearly basis at the end of June, falling from 3.86% in March. This trend is expected to continue in the second half of the year. For this reason, it is estimated that headline inflation for 2020 would stand within a range between 1.0% and 2.0%. Also, should this be the case, the amplitude of the forecast range reflects the uncertainty regarding the evolution of the pandemic and its effects on prices. Toward 2021, inflation would rebound once the transitory effects of the reliefs are reversed and the economy starts to recover gradually. In line with this, inflation expectations, which have reduced along with observed inflation, should converge to the 3.0% target.

Only three years away of its centenary, *Banco de la República* faces one of the greatest challenges in its history. The Board of Directors is confident that when a retrospective balance of this situation be made on such an important date, it will be said without fear mistakes that this institution stood up to the circumstances, and that the decisions made were the most appropriate for the country to overcome such a difficult ordeal.

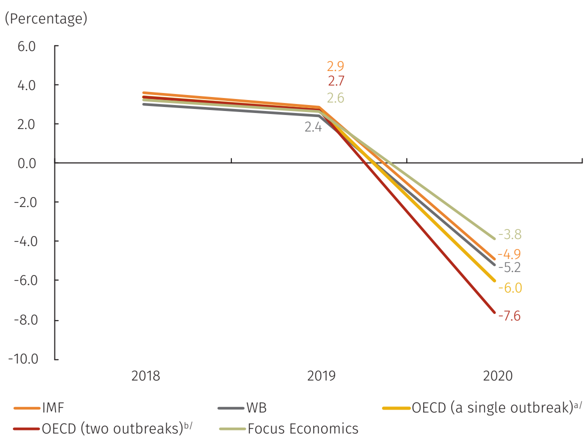
02 / Macroeconomic Environment and Measures Taken by *Banco de la República* in 2020

The spread of Covid-19 and the health measures needed and established by the national government and local governments to deal with the pandemic have caused an inevitable deterioration in the country's economic operations and labor market – a phenomenon that is unprecedented in speed and magnitude.

The deterioration of revenue from abroad has also been significant given that the pandemic has been a negative global shock that has substantially affected the world economy, international trade, commodity prices (particularly crude oil prices), confidence, and financing conditions in international markets.

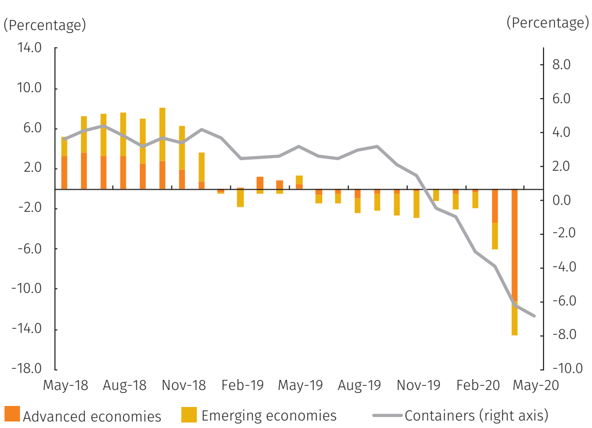
The nature of these shocks generates widespread uncertainty about the future performance of the macroeconomic context, and this implies great challenges for the implementation of economic policy. The gradual opening up of the economy, the counter-cyclical fiscal measures, and monetary policy actions are expected to contribute to the recovery of economic activity.

Graph 2.1
Projected Global Economic Growth
(annual change)



a/ No significant new outbreaks are expected.
b/ Includes another wave of infections and new isolation measures before the end of 2020.
Sources: Focus Economics, International Monetary Fund, World Bank, and the Organization for Economic Cooperation and Development (OECD).

Graph 2.2
Actual Exports and Global Container Traffic
(annual change)



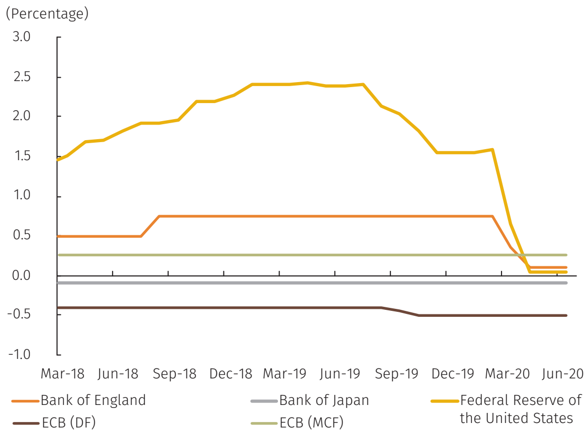
Note: third-order moving average
Sources: CPB Netherlands Bureau for Economic Policy Analysis, Institute of Shipping Economics and Logistics.

2.1 Global Covid-19 Shock and Deterioration of the Country's External Conditions

The Covid-19 pandemic is a negative global shock that has significantly damaged revenue from abroad, confidence, and financing conditions in the international markets.

The Covid-19 pandemic is a negative global shock that has generated a severe global economic crisis and an extremely unfavorable international context. The spread of the virus and the social isolation measures to contain it have been reflected in a sudden halt to economic operations, disruptions in the international financial markets, and a rise in the global risk indicators. Thus, analysts and international entities are anticipating a significant contraction in the world economy for 2020 (Graph 2.1) This recession will probably occur in a context of a sharp reduction in international trade in goods and services (Graph 2.2) and effects on global value chains. This is compounded by the lower export prices for raw materials which are generating reductions in the terms of trade for producing countries added to the decrease in workers' remittances resulting from the widespread deterioration in the labor markets in the areas where migrants are residing. Furthermore, capital outflows from emerging economies and a deterioration in international financial conditions have been seen. In response to the economic crisis, the main central banks lowered their benchmark interest rates or kept them at low levels (Graph

Graph 2.3
Policy Interest Rates in Advanced Economies



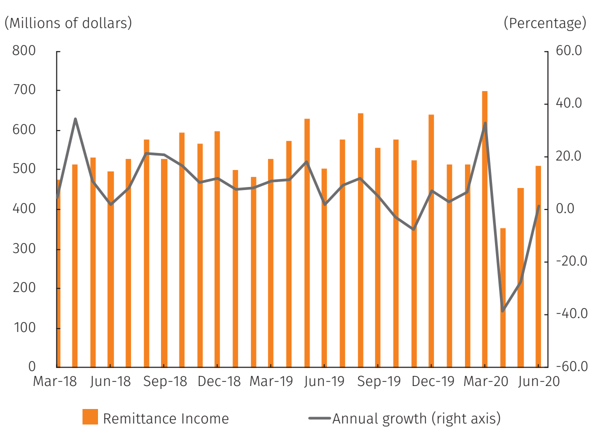
Note: ECB (DF): Deposit facility rate of the European Central Bank; ECB (MCF): European Central Bank Marginal Credit Facility (Main refinancing operations) rate; Federal Reserve of the United States (Fed): Effective Federal Funds rate; Bank of England: policy interest rate (Bank rate) paid to commercial banks for deposits in the central bank; Bank of Japan: policy rate (Policy rate balance) applicable to financial institutions' deposits at the central bank.
Sources: Bloomberg and the St. Louis Federal Reserve.

2.3) as well as providing ample liquidity to ensure the stability of their economies and of the financial markets. Finally, various governments have implemented multiple fiscal stimuli to mitigate the impact of the pandemic.

In the first half of the year, the country's relevant external demand reportedly registered a sharp tightening due to the closure of several markets, the confinement of people, and the deterioration in global economic activity as a result of Covid-19. In the advanced and emerging economies that are among this country's main trading partners, restrictions on people's mobility, rising unemployment, and the downturn in consumer confidence have had a significant, negative impact on household spending. Investment, in turn, has been affected by the closure of factories and businesses as well as the by worsening of the economic outlook that is reflected in the decline in business expectations. In addition, the external context is unfavorable for these countries' foreign trade. For some of the economies in the region, the impact of Covid-19 could be greater due to the informal nature of labor, the people's socio-economic conditions, the reduction in the terms of trade, and workers' income from remittances. In the second half of 2020, the technical staff expects our trading partners to see a partial recovery in their GDP. However, there is a lot of uncertainty regarding its speed and sustainability since future changes in the pandemic, the medium-term effects of the destruction of employment, business bankruptcies, and the rise in indebtedness, along with other factors, are unknown. In any case, economic activity is not expected to recover to the levels seen prior to Covid-19 in the short term. Based on all the above, the technical staff at *Banco de la República* anticipates a -6% to -11% decrease in the GDP of our main trading partners for 2020.

The sharp deterioration in the labor market has been widespread in the countries where the Colombians living abroad work. This has generated less income for the country from remittances after the positive trend shown in the first quarter of the year. In the second quarter, the workers' remittances declined by nearly 23% per annum (Graph 2.4). This indicates an impact on national income and, in particular, a lower purchasing power for the households that receive these funds and devote most of them to their basic expenses. If the decrease in purchasing power is reflected in lower consumption of durable goods, the collection of the value added tax (VAT) could also be affected. Since these transfers partly depend on the income earned by Colombian migrants residing abroad, no significant recovery is expected as long as the recession and deterioration in the labor markets in countries such as the United States and Spain continue.

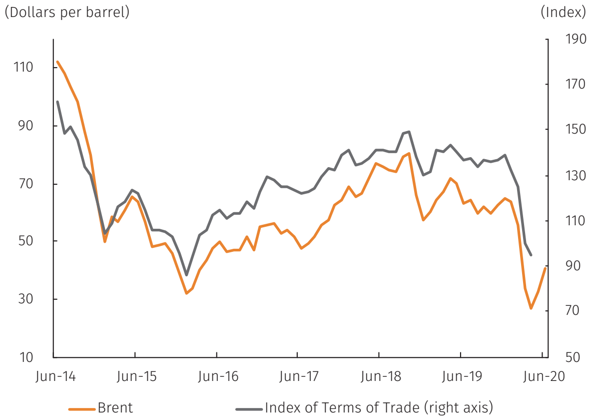
Graph 2.4
Income from Workers' Remittances in Colombia



Source: *Banco de la República*.

As a reflection of the low petroleum prices, the downturn in the country's terms of trade is another negative shock to national revenue and an additional source of uncertainty that the Colombian economy faces. The international price for crude oil has been affected by the major drop-off in

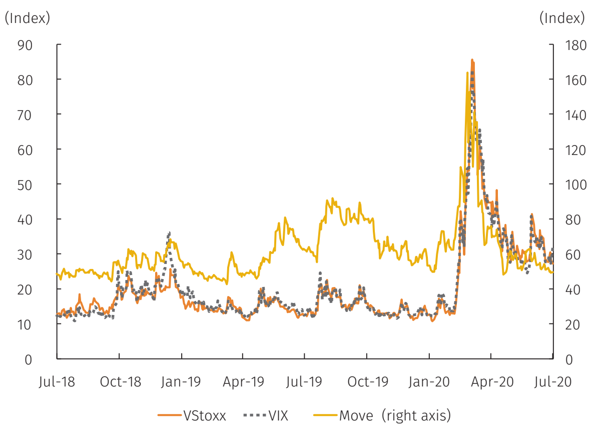
Graph 2.5
Terms of Trade and International Oil Price



Note: Terms of Trade Index is based on foreign trade.
Sources: Bloomberg and *Banco de la República.*

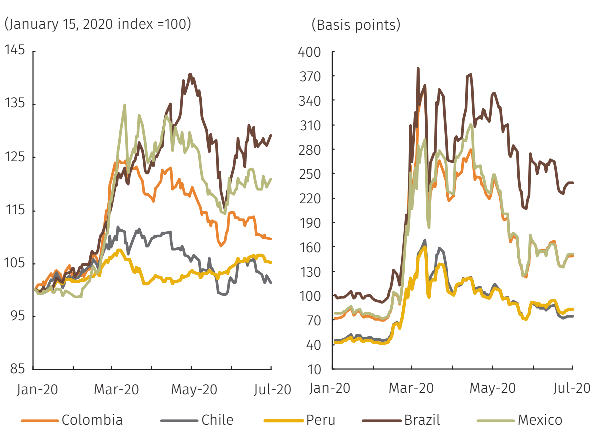
Graph 2.6
Volatility Index of International Financial Markets, Nominal Exchange Rate, and Risk Premia (five-year CDS) for some Economies in the Region

A. Financial Volatility Indices



B. Nominal Exchange Rate

C. Credit Default Swap 5 years ahead



Source: Bloomberg, calculations by *Banco de la República.*

demand for fuel that has resulted from people's more limited mobility, the restrictions on passenger air transportation, and the deterioration in the global economy. Added to this are the geopolitical tensions that were seen in early March between Russia and Saudi Arabia. This delayed cutbacks in crude oil production, generated expectations of an increase in the supply, and contributed to escalating an over-supply of oil on the market. In June, the price showed a partial recovery (Graph 2.5), but this was at lower levels than those seen before the pandemic. This recovery was the result of relaxing the social distancing measures that have allowed some reopening of economies and greater mobility for citizens. Regarding supply, compliance with the agreements for a historic cut-back in production established between OPEC and their allies on April 12 and the decreases in petroleum output in other countries such as the United States, Norway, and Canada have contributed to the partial rebalancing of this market. Thus, the technical staff expects an average Brent crude oil benchmark price that will probably be between USD 32 and USD 45 per barrel for 2020. This would be in an environment of high uncertainty due to the excess inventories and doubts about how the pandemic will evolve.

The international financial conditions have deteriorated with respect to what had been seen before the pandemic. After the appearance of Covid-19, financial volatility rose (VIX and VStoxx) (Graph 2.6, panel A), stock indices declined, and there was greater demand in developed economies for safer assets. In the emerging countries, there were capital outflows, currency depreciation, and rises in risk premia (Graph 2.6, panel B and C). At the end of the second quarter, this situation began to reverse itself but still without reaching the levels seen prior to Covid-19. In the case of Colombia, the exchange rate reached a high of COP 4,153 (MER) in March and at the close of June, it showed a downward correction to COP 3,759 on average. The risk premia, in turn, measured by the five-year *credit default swaps*[4] (CDS) went from 357 basis points (bp) in March to 160 bp at the end of June. The ample international liquidity, the partial reopening of several economies, the recovery in crude oil prices, and the measures taken by *Banco de la República* and the national government all contributed to the improvement in the country's foreign financial conditions. In this scenario, Colombia and other countries such as Chile, Mexico, and Peru have maintained access to foreign financing through the successful placement of external debt bonds. However, there have been reductions in the credit ratings of some countries in the region which could affect the cost and availability of external financing in the future.

4 A risk hedging financial product (belonging to the category of credit derivatives), which is carried out by means of a swap contract on a credit instrument in which the buyer makes periodic payments (called a spread) to the seller and receives from the latter an amount of money in the event that the asset underlying the contract is not paid at maturity.

2.2 Measures Implemented by the BDBR to Address the Negative Effects of the Pandemic

The sudden changes in macroeconomic conditions caused by the appearance of the pandemic and the decrease in crude oil prices generated sharp increases in risk premia, in the nominal depreciation rhythm, in the volatility of the financial markets, and in the agents' demand for liquidity. In addition, the healthcare response to Covid-19 has caused an unprecedented deterioration in economic activity and the labor market in this country. Banco de la República responded immediately to these effects by means of actions intended to provide the economy with ample liquidity in order to guarantee the proper functioning of the payment systems as well as of the foreign exchange, public debt, and credit markets. In addition, the policy interest rate has been significantly lowered in order to reduce household financial costs and support economic recovery to the extent that markets begin to return to normal.

The Colombian economy has received heavy blows as a result of the Covid-19 pandemic, the measures adopted to contain and mitigate it, and the significant drop in revenue from abroad. Since the end of March, the country has faced declining petroleum prices, reduced worker remittances, and a lower demand from abroad. Global risk rose and, as in other economies in the region, for Colombia this translated into a sharp rise in sovereign risk premia, a depreciation of the peso, and intense volatility in the public and private debt markets with significant deterioration in their prices and in the liquidity of the securities. Furthermore, the health care response to Covid-19 resulted in the shutdown of most of the production subsectors, growing pressure on corporate cash flow, and reductions in employment and household income. These factors, together with the uncertainty associated with the effects and duration of the quarantine, generated a widespread preference for liquidity on the part of households and companies. In addition to the devaluations in the public and private debt markets, the above put pressure on the liquidity of some segments of the financial system. The high level of uncertainty about future economic and employment performance has resulted in a lower demand for credit. This, along with a greater perception of risk for financial institutions, has been reflected in a lower rate of portfolio issuance for a large group of agents.

The Bank reacted in a timely and decisive fashion by providing ample liquidity in pesos and dollars and by reducing its interest rate. Starting the second week of March, the time when the first effects of the crisis began to appear, the Bank began to respond to the crisis. This was done in an attempt to protect the payment system and stabilize key markets that were under pressure in the short term, and protect the supply of credit, reduce the financial burden on households and businesses, and stimulate economic activity in the medium and long term. In view of this situation, the policy of *Banco de la República* has been geared towards achieving the following objectives:

- **Ensure the proper functioning of the payment system**. Ensure that financial intermediaries, companies, and households have the necessary liquidity to meet their obligations. This is essential to retain the confidence of all agents and to mitigate the volatility and uncertainty in the economy and financial markets.

- **Contribute to preserving the supply of credit for households and businesses.** To do this, financial intermediaries need to have sufficient funding which, in turn, requires an appropriate supply of liquidity.

- **Contribute to the stabilization of key markets such as the foreign exchange and public and private bond markets.** These are essential for the transmission of monetary policy and for the financing of the government and the financial system.

- **Support the reactivation of economic activity.** To this end, in addition to a more expansionary benchmark interest rate, it is essential to achieve the above objectives since, without them, the effectiveness of the monetary policy to boost the economy could be seriously limited. The effective transmission of the monetary policy requires that financial markets operate under conditions of relative normality.

To achieve these objectives, *Banco de la República* launched a comprehensive set of measures. An amount in excess of COP 40 t was pumped into the economy between March and June. These funds constitute new issuance that represents approximately 35% of the monetary base, 7.0% of secondary liquidity (M3), and 3.7% of the country's GDP. In addition to the above, there has been a sharp reduction in interest rates and an increase in the country's foreign reserves. The measures taken by *Banco de la República* in the context of the emergency generated by Covid-19 are explained below[5]:

- **Extension of the eligible amounts, counterparties, terms, and securities of the transitory expansion operations (repos) of *Banco de la República*. Through this, the intention has been to expand liquidity in the economy and their ability to fuel it.** The extension of deadlines gives more certainty and stability to intermediaries about the availability of such funds. Liquidity operations are usually provided to financial intermediaries on a one-day basis (*overnight*). However, in order to face the volatility in the financial markets sustainably and stably, *Banco de la República* offered transactions for a broader set of periods (1, 7, 30, 60, 90, 180, 270, and 365 days, depending on the transaction).[6] Thus, they sought to ensure the proper functioning of the payment system and the supply of credit. Normally, *Banco de la República* carries out repos backed by public debt securities. Since March 13, they have also been carrying out repos with the backing of private debt. Currently, the daily maximum for repos with private debt is COP 1 t (up to 7 and 30 days) and those with public debt is around COP 10 t (up to 1 and 90 days). Finally, starting on May 14 and having a cut-off date of June 25, four repo auctions backed by portfolio promissory notes were held in which COP 1.35 t was injected as part of a program that the Board of Directors decided to maintain indefinitely. As of June 30, 2020, the balance of overnight repos with public debt securities amounted to COP 7.7 b while the balance of greater than 1-day transactions with public and private debt securities and portfolio promissory notes amounted to COP 3.7 b. This is a significant monetary expansion compared to what the economy normally requires since it corresponds to about 12.1% of the average monetary base in 2019 (including overnight and term repos).

- **Purchases of public and private bonds.** This was done to stabilize key markets for the transmission of monetary policy and to provide ample and stable liquidity that would help preserve the payment systems and credit supply. These transactions were designed to provide liquidity for

5 The time line in which these measures were taken and details on each of them can be found at the following link: https://www.banrep.gov.co/es/medidas-junta-directiva-covid19

6 The longer periods correspond to repo transactions with portfolios (180) and transactions with public debt securities (270 and 365 days).

prolonged periods and reduce the uncertainty of financial intermediaries about their funding to the benefit of those who require credit from the financial system. In March, *Banco de la República* announced this new policy measure which entailed the purchase of private bonds by the Bank for the first time in history. In April, the purchase of public bonds was resumed. *Banco de la República* bought COP 8,700 b in private bonds and COP 2,800 b in public bonds (TES) during both months. As a result of these measures, the volatility in the markets in question was reduced to the levels seen at the beginning of the year, and, at the same time, their liquidity conditions recovered substantially. This is another significant addition to liquidity which, as a whole, is equivalent to 12.2% of the average monetary base in 2019. No new operations have been announced since these months.

- **Reduction of the reserve requirements by 2.0% on average (from 7.0% to 5.0%).** *Banco de la República* maintains a reserve requirement structure with different required percentages for three categories of credit establishment liabilities – the most liquid (sight) liabilities are required to have the highest percentages. In order to permanently free up resources to enable banking institutions to meet commitments or generate credit, *Banco de la República* reduced the two required percentages that are the highest from 11% to 8.0%, and from 4.5% to 3.5% respectively (the lowest required percentage remained at 0%). With this, the average reserve requirement went from 7.0% to 5.0%. At the same time, this enhanced the incentives for financial intermediation since it reduced the cost of raising money for lending purposes. The estimated amount of the corresponding injection of liquidity is COP 10.1 t, which is equivalent to 9.4% of the average monetary base for 2019.

- **Foreign exchange and dollar liquidity hedging measures were adopted.** The following mechanisms were implemented in order to alleviate pressure in the foreign exchange market:

  - The sale of U.S dollars through one-month Non-Delivery Forwards (NDF) contracts to extend coverage against the risk of a sharp depreciation of the peso. The market usually controls the provision of this type of hedge but, in an environment of elevated risk aversion and uncertainty, this provision may be insufficient thus generating volatility and illiquidity in the foreign exchange market. The Bank's offer of U.S. dollars through NDF contributes to mitigate this, as it prevents various agents from demanding U.S dollars on the spot market for hedging purposes. The financial compliance with these contracts means that, at maturity, the Bank recognizes or receives the difference between the negotiated future price of the dollar[7] and the one actually seen at the time that the contract is settled. This payment is made in pesos so that it does not affect the level of the foreign reserves. From March to May, *Banco de la República* auctioned USD 1 billion (b) under these contracts every month. In addition, it also auctioned April and May renewals, and will auction June renewals. The balance for hedge renewals (as of July 10) is

7 In the contract for sale of U.S. dollars through *Non-Delivery Forwards*: NDF, the Bank sells dollars under a 1-month futures contract at an exchange rate that corresponds to the cut-off rate of a uniformly priced auction. In this auction, participants offer the exchange rate (price expressed in pesos per dollar) at which they would be willing to buy dollars from *Banco de la República* at the expiration of the contract as well as the dollar amount they are offering to buy. In the auction, the bids from the participants are organized in a strictly descending order by price and all the bids with prices higher than or equal to the cut-off price at which the daily limit of the auction is completed (cut-off price) are approved. All the approved bids will pay the same cut-off price. When the value of the bids at the cut-off price exceeds the remainder of the auction limit, the remainder will be distributed proportionately to the value of the bids that accept partial approval. The approved amount per bid will be a multiple of USD 100,000.

USD 1.267 b, which is equivalent to about one and a half the daily amount traded in the Colombian spot market and the daily amount traded in the Colombian forward market.

- U.S. dollars two-months swaps to stabilize the exchange market and provide liquidity in dollars. In these transactions, the Bank sells dollars in the spot market with the commitment to repurchase them in the future. This way, liquidity in dollars is provided for those who need it, which is especially important if Colombian banks see their short-term sources of funding in foreign currency reduced because of the international risk aversion. This not only stabilizes the foreign exchange market but also maintains the short-term external financing of the economy. As in the case of sales of dollars through NDF, the use of this mechanism does not affect the balance of foreign reserves after the transaction is completed since the counterparty returns the dollars to *Banco de la República*. Between March 19 and 20, a total amount of USD 400 m swaps were contracted. This was equivalent to 6.0% of the short-term banks' balance debt in foreign currency. Between April and June, USD 400 m in Swap contracts were auctioned daily, but were not taken. Taking the latter and the fact that external liquidity has improved into account, as of July, the BDBR decided not to continue these auctions and announced that these contracts will be offered again when deemed necessary.

- **The policy interest rate has been lowered by 175 bp and, at the end of June, it stood at a record low (2.50%).** Over the course of the second quarter, the indicators of economic activity suggested that the drop in output for this period would be unprecedented. While a slow economic recovery is expected to begin in the second half of the year, the growth forecast suggests that 2020 is likely to be a year of deep recession, although its specific value presents unusually high uncertainty due to the lack of knowledge about the course of the Covid-19 pandemic. Actual inflation and expectations for it at different periods fell and stood below the 3.0% target. At the same time, employment declined significantly, a large number of workers were classified as inactive, and estimates suggest that excess productive capacity will remain extensive for the rest of the year. In this environment, the Board decided to reduce the benchmark interest rate to historically low levels starting from a level of 4.25% in February to 2.50% at its June 2020 meeting. These measures help to ease the financial burden on debtors and reduce credit costs. They are also intended to anticipate a monetary stimulus when conditions in the economy and control of the pandemic allow for normalization in the decision-making process of households and businesses with respect to consumption and investment.

- **Measures to maintain strong international liquidity.** In April, *Banco de la República* gained access to the repo facility (FIMA) that the Federal Reserve provides.[8] Subsequently, *Banco de la República* obtained a 2-year renewal of the flexible credit line (FCL) for USD 10.800 b at the IMF and bought USD 2.000 b from the national government in May (see chapter 3).

These measures have alleviated the pressure registered in the foreign exchange and public and private debt markets at the same time that they have delivered abundant liquidity at the aggregate level and for individual entities.

8 *Banco de la República* announced that they would make use of that facility only in the event that, having decided to sell dollars on the spot market, the market for the purchase and sale of Treasury bonds is, at that same time, very low in liquidity and *Banco de la República's* sale of Treasury bonds would, thus, be unfavorable.

The latter measure has protected the proper functioning of the payment system and provided a necessary condition for maintaining or expanding the supply of credit. The expansion of the loan portfolio requires support to alleviate credit risk in an abnormal economic situation and an abundant and lasting supply of liquidity. In this respect, the measures adopted by the Board of Directors are an indispensable complement to the guarantee programs established by the national government.

The government has also implemented measures to reinforce liquidity and facilitate access to credit and subsidies for companies in an effort to help mitigate the negative impact of the emergency on production. First of all, the different levels of the government postponed the deadlines for payment of some taxes such as income, industry and commerce, etc. Furthermore, the government authorized the refund of tax balances in favor of the taxpayer (when they exist) for low risk taxpayers using an abbreviated procedure within fifteen days of the date that the request is duly submitted and granted benefits regarding 2019 tax liabilities.[9] According to the National Revenue and Customs Bureau (DIAN), the measures adopted at the national level have generated a rise of close to COP 10 t in funds in the economy. The COP 3.25 t added to the equity of the National Guarantee Fund (FNG in Spanish), in turn, makes it possible for the Fund to extend guarantees of up to COP 48.2 t based on estimates by the Ministry of the Treasury and Public Credit, and this could represent up to COP 80.3 t in new loans for working capital. With a cut-off date of June 25, a total of COP 4 t out of a total maximum of COP 17.2 t has been made available with the backing of FNG in 87,054 transactions. Bancoldex has implemented COP 600 billion (b) in new lines of credit to enhance access to working capital for companies. Finally, with the Formal Employment Support Program (PAEF in Spanish), the national government grants a payroll subsidy that is equivalent to 40% of the minimum wage (COP 351,000) per employee for four months to companies that meet certain requirements. According to the Office of the President of the Republic, the program benefited about 100,000 companies and about 2.5 m workers in its first month. The Office of the Financial Superintendent of Colombia (FSC), in turn, issued External Circulars 007 and 014/2020 based on which the supervised entities were allowed to grant exceptional treatment to those debtors who might face problems meeting their obligations in this situation.[10] As of June 24, the plans to grant waivers under the aforementioned circulars have benefited 10.9 m debtors (individuals and corporations) with 14.4 m transactions totaling a portfolio balance of COP 214.86 t.

9 It refers mainly to the extension of deadlines for the payment of national and local tax obligations.

10 At the end of June, the Office of the Financial Superintendent issued External Circular 022/2020 which is intended "to continue the prudential balance between the application of measures oriented towards recognizing the effect on the ability to pay, and maintaining adequate management, disclosure, and coverage of risks within the credit establishments" in consideration of the fact that the validity periods of circulars 007 and 014 were ending.

2.3 Change in the Financial and Loan Markets

The ample international liquidity, the partial reopening of several economies, the recovery of crude oil prices, and the measures taken by Banco de la República and the national government, etc., have contributed to stabilizing the financial markets and improving the country's internal and external financing conditions. The financial system maintains sound equity and appropriate liquidity.

2.3.1 Financial Markets

Over the course of the second quarter, risk premia have been corrected downwards but without reaching pre-Covid-19 levels. This decline in CDS has been supported by a lower investors risk perception amidst the optimism related to a marked v-shaped global economic recovery in light of: 1) the relaxation of social isolation measures in several countries, and 2) the positive announcements of research into a vaccine against Covid-19. Compared to the first quarter of 2020, during the second quarter and up to July 10, the U.S. currency weakened 2.4% vis-à-vis [11] [12]. In line with the global weakening of the dollar, some Latin American currencies appreciated throughout the second quarter and up to July 10. They were also influenced by the rise in oil prices and industrial metals prices. In the region, the Colombian peso (10.8%), the Chilean peso (6.7%) and the Mexican peso (5.2%) appreciated while the Argentine peso (-10%), the Brazilian real (-2.3%) and the Peruvian sol (-2.1%) depreciated (Graph 2.6, panel B).

In the second quarter, the peso appreciated against the dollar, but still remains at levels higher than those registered before the pandemic. The peso depreciated against the dollar in the first quarter of 2020 in line with the fall of oil prices[13] given the negative impact that this had on the country's fiscal accounts and income in dollars. However, during the second quarter, this trend was partially reversed, consistent with the global weakening of the dollar and also supported by the positive performance of the oil prices[14] and the dollar supply by foreign investors as of May. The peso has appreciated during the period despite the credit rating downgrade by Fitch in early April[15] (Graph 2.7). This also occurred in an environment of slight increasing risk aversion at the end of June in response to the reports of rising numbers of new Covid-19 cases in several countries and the economic impact this could have on economic reactivation. Despite the appreciation in the second quarter, the peso continued to trade at a higher level than what had been registered before Covid-19. It should be noted that, prior to the crisis, the real sector's mismatches were low, and this made it possible to deal with significant and unexpected movements

11 In line with the DXY index, which includes the euro, the yen, the Canadian dollar, pound sterling, the Swedish krona, and the Swiss franc. This group of currencies corresponds to those of the United States' main trading partners. Data as of July 10.

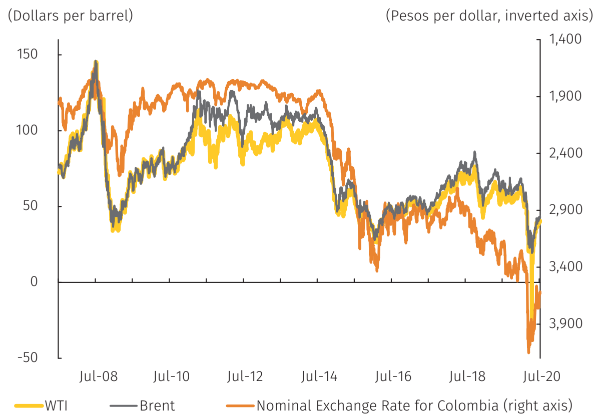
12 According to the FXJPEMCI index, which includes the currencies of Brazil, Russia, China, Mexico, South Africa, South Korea, Chile, Israel, Taiwan, Peru, Turkey, India, Argentina, Malaysia, Colombia, Hungary, Indonesia, Egypt, Thailand, the Czech Republic, the Philippines, Morocco, Pakistan, Jordan, and Poland. Data as of July 10.

13 The peso continued to have a strong correlation with the oil prices: the correlation between Brent oil and the COP/USD rate was -0.98 in the first quarter and -0.91 throughout the second quarter and up to July 10.

14 Between March 31, 2020 and July 10, 2020, the Brent oil price rose 64.1% and the WTI price, 98%.

15 On April 1, 2020, Fitch Ratings downgraded Colombia's rating from BBB to BBB- and kept the outlook at "negative."

Graph 2.7
Nominal Exchange Rate and Oil price

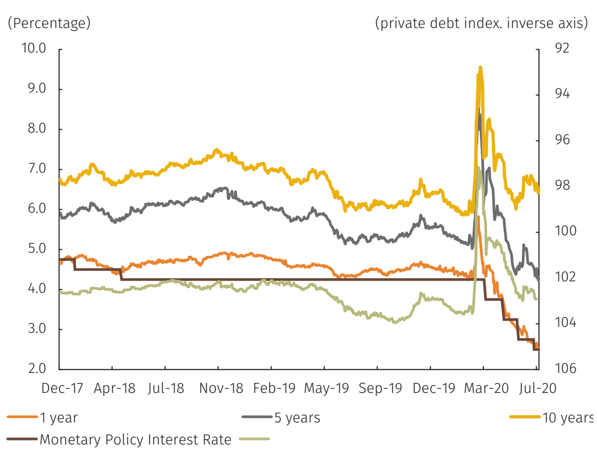


Source: Bloomberg.

Graph 2.8
Interest Rate Indices in Some Emerging Economies

Sources: Bloomberg, SEN (electronic trading system) and MEC (Colombian electronic market), *Banco de la República* calculations.

Graph 2.9
Zero-coupon COP TES Rate by Term, Private Debt Index, and Monetary Policy Rate



Sources: SEN (electronic trading system) and MEC (Colombian electronic market), *Banco de la República* calculations.

in the exchange rate during the first half of the year without this having serious effects on companies' cash flows.

Interest rates on public and private debt have returned to levels similar to those seen at the beginning of the year. The private and public debt markets started the year on a positive trend in line with the bonds of the rest of the countries in the region because of the more stable international geopolitical environment and less fear that the local protests organized for this year would have a significant impact on the local economic activity. Afterward, the TES and private bonds devaluated substantially during March as did the bonds issued by the rest of the countries in the region as a result of the rise in the global risk perception in view of the concerns about the economic consequences of the expansion of Covid-19 (Graph 2.8). These devaluations were accentuated in Colombia by the sharp fall in crude oil prices. After this significant increase in local bond rates,[16] they quickly returned to levels similar to those seen at the beginning of the year in accordance with what was noted in the other countries in the region. This performance is mainly explained by the lower aversion to risk resulting from the expectations of a gradual reopening of the majority of the economies and partial recovery of commodity prices including crude oil. The Bank's intervention through purchases of public and private bonds also contributed to the rapid recovery of the debt market. This recovery has been faster for short-term bonds for which the rates are now at levels that are lower than the ones seen prior to March due to the expectations and later materialization of cuts by the Bank of its monetary policy rate. In contrast, the long-term rates are still above the ones seen at the beginning of the year due to the uncertainty regarding the future for the situation in the fiscal accounts, the government's financing sources, and their impact on the country's credit rating (Graph 2.9).

In the second quarter of the year, the portfolio flows in the public debt spot market recovered in comparison to the sharp outflows registered in the first quarter.[17] In the stock market, foreign investors' net sales rebounded in the first quarter and moderated in the second one.[18] In the case of flows into local public debt, higher net sales of TES were registered in February and March.[19] However, the net sales of foreign investors decreased in April, while in May

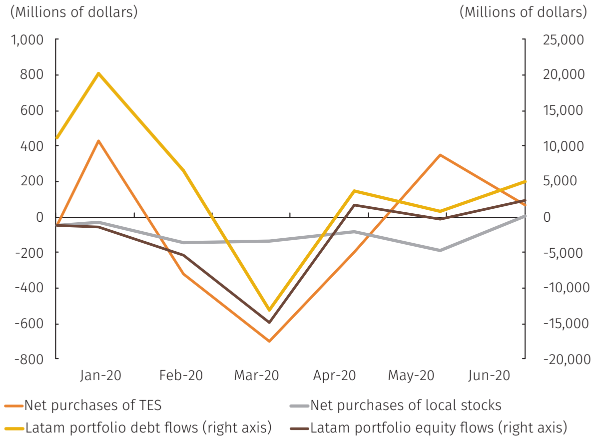
16 There is an inverse relationship between the price of a bond and its market interest rate. For example, if a security promises to pay $110 at maturity and its market price is $100, its interest rate is 10%. If the market price of the same security rises to $105, then its rate falls (4.8% = [110/105] - 1) because, at the end, the holder will still receive the same $110.

17 Net purchases of USD 219.5 m were registered in the second quarter compared to net sales of USD 599.1 m in the first quarter of the year.

18 Net sales in the first and second quarters were USD 313.2 m and USD 266.8 m respectively.

19 Months in which they sold USD 323.2 m and USD 703.6 m net respectively.

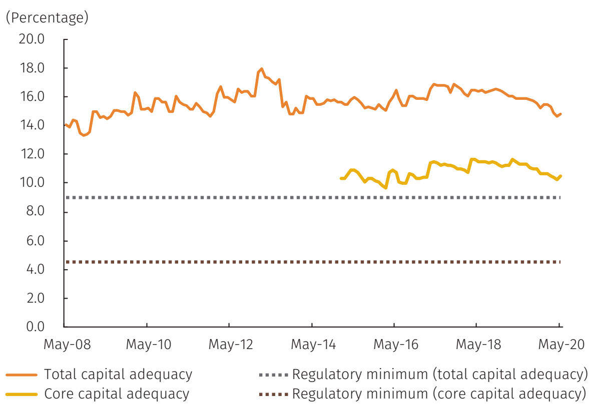
Graph 2.10
Net Monthly Flows of Portfolio Investment to Colombia and Latin America[a/]



a/ Preliminary figures for the last 3 months published July 1, 2020.
Sources: *Banco de la República* and IIF.

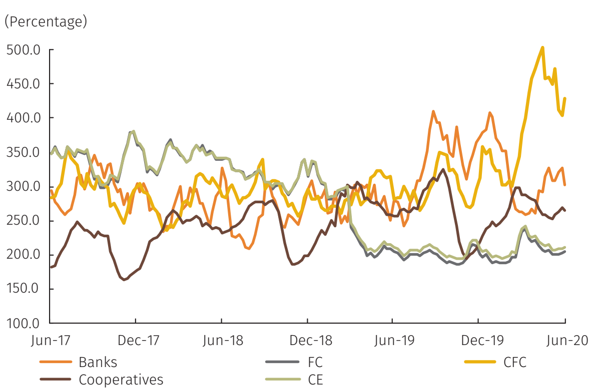
Graph 2.11
Aggregate Indicators for Capital Adequacy and Liquidity

A. Capital adequacy indicators



Note: technical (core) capital adequacy is defined as the ratio of technical (ordinary core) equity to risk-weighted assets (to which is added market risk multiplied by a factor of 100/9). The Liquidity Risk Indicator (LRI) is defined as the ratio of liquid assets adjusted for market liquidity to net liquidity requirements at a thirty-day horizon.

B. 30-day liquidity risk indicator by type of entity



FC: investment banks; CFC: corporate financing companies; CE: credit establishments.
Source: Office of the Financial Superintendent of Colombia, calculations by *Banco de la República*.

and June they registered net purchases.[20] This was in line with the recovery of portfolio debt flows towards the other countries in the region (Graph 2.10). In the case of the stock market, the highest net sales by foreign investors were observed in May. However, it exhibited a slight recovery in June. To summarize, foreign investors sold TES and stocks on the spot market for a net of USD 379.6 m and USD 580 m respectively in the first half of the year.

During the second quarter, the high demand by foreign investors for TES in the forward market continued and surpassed the net purchases observed in the spot market. The long position of foreign investors in local public debt through NDF contracts[21] rose COP 4,410 b between January and June 2020, with the highest increases in April (COP 1,810 b) and May (COP 1,678 b). In addition, the position of net NDF purchases of peso-denominated TES by foreign investors from foreign exchange market intermediaries stood at around COP 7,000 b, reaching its historical maximum towards the end of May.[22] The above reflected the interest of these agents to maintain their share in local public debt, but also reducing their exposure to changes in the exchange rate.

2.3.2 Credit Institutions' Financial Intermediation

The negative shocks to the macroeconomic conditions found the credit establishments, in aggregate terms, in a position of sound equity and sufficient liquidity. For the first few months of 2020, the credit establishments showed aggregate indicators of capital adequacy (Graph 2.11, panel A) and liquidity (Graph 2.11, panel B) that were well above the regulatory minimums. Subsequently, these levels of capital adequacy and liquidity have not shown any deterioration mainly due to the measures adopted by *Banco de la República*, the FSC, and the national government. In the case of financing companies and financial corporations, strong improvements in their liquidity indicators have even been seen. Furthermore, a stress test was presented in the *Financial Stability Report* for the first half of 2020 that subjected the financial system to a hypothetical scenario that included a steep, persistent reduction in economic activity and high unemployment rates. This analysis consisted of a quantitative assessment of the resilience of the credit establishments in the event of an extreme, hypothetical scenario and, thus, does not constitute a forecast of changes in macroeconomic conditions nor the development of the

20 In April, net sales were USD 201 m while they bought a net of USD 352.4 m and USD 68.1 m respectively in May and June.

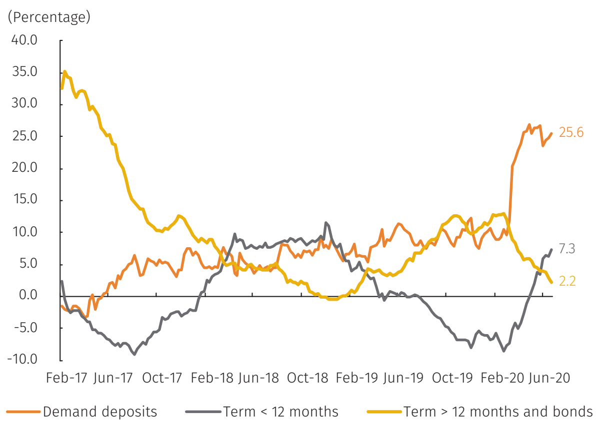
21 A *forward* contract is a derivative financial instrument in which the counterparties make the commitment to buy or sell an asset in the future, in this case a TES, at a fixed price on the trading date of the contract. This instrument allows foreign investors to take positions in TES without having to buy the asset directly.

22 Specifically, on May 27th, the long position of foreign investors in peso-denominated TES through NDF stood at COP 6.808 t.

financial system. The results of this test suggest that, in spite of the fact that there will probably be a decrease in profitability and in the supply of credit for the economy, the system will likely continue to display aggregate indicators of capital adequacy that are above the regulatory minimums for what remains of the year. Based on the results, (if the economic situation remains extreme) there will probably be more severe impacts on the capital adequacy of the credit establishments going into 2021. In any case, the results of such an exercise may change and be updated as the macroeconomic situation evolves.

Given the uncertainty about the conditions of the economy in the short and medium terms, risk aversion and preference for liquidity increased. With the sharp decline that various local financial assets exhibited during March, the public's preference for demand deposits and cash rose significantly (Graph 2.12). These assets have a low or no return, but have less risk in terms of loss of principal. Thus, during March, demand deposits in credit establishments, especially checking and savings accounts, rose by nearly twice as much as they had increased throughout all of 2019.[23] Subsequently, the changes moderated. With this change in level, the annual change in demand deposits at the end of June was 25.6% (22.9% in real terms). For cash held by the public, the increase was more gradual, but no less significant. At the end of June, the cash held by the public registered an annual growth of 31.6% (28.7% in real terms)[24] (see Shaded sections 1 and 4).

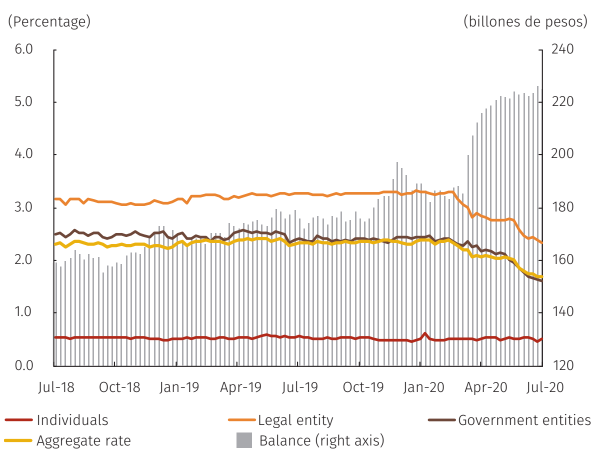
Graph 2.12
Balances of Demand and Term Deposits
(annual change)



Source: Office of the Financial Superintendent of Colombia (form 281), calculations by *Banco de la República*.

The supply of demand deposits increased significantly and the interest rates for them declined. Associated with the pandemic and the rise in uncertainty, the sharp, sudden rise in demand deposits was caused by a shift in the public's preferences which offers their funds to financial institutions (Graph 2.13). Therefore, the rate at which credit institutions compensate savings deposits decreased rapidly, especially that of customers other than natural persons. Even though the reduction in the interest rate for savings deposits as of June is less than the drop in benchmark rate (40 bp lower than the average for March vs. 150 bp in the policy rate and not including the additional reduction in the policy rate for the last day of the month), it has been much more pronounced than the ones registered during other episodes of change in the monetary policy stance.

Graph 2.13
Interest Rate and Balance of Ordinary Active Savings Deposits



Source: Office of the Financial Superintendent of Colombia (form 441), calculations by *Banco de la República*.

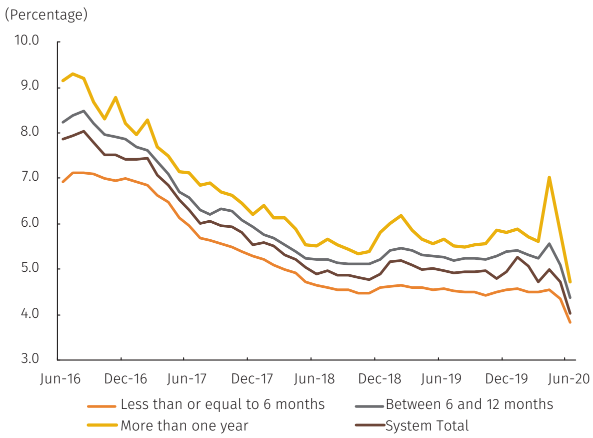
The rates for certificates of deposit (CD) have begun to fall since the reductions in the policy interest rate but the preference for short-term deposits remains. Before the crisis, the balances of deposits with am agreed maturity of over one year (CDs and bonds) showed an annual growth of

23 During March, the balance of demand deposits went to COP 32,959 b, compared to COP 16,598 in 2019.

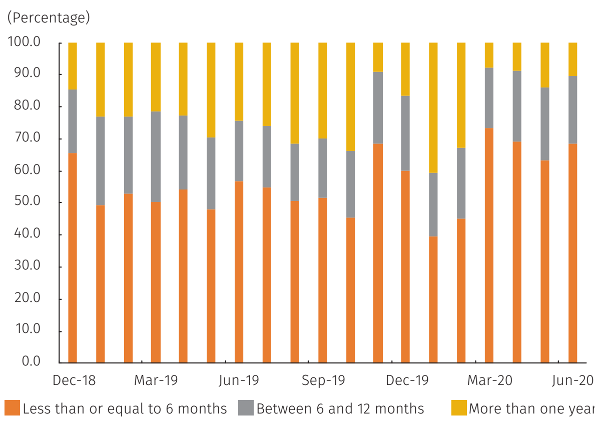
24 At the end of June, the balance of cash held by the public was COP 12,258.1 t higher than what had been registered at the end of February. Throughout all of 2019, cash rose COP 10,673.6 t.

Graph 2.14
Rates and Term Deposits

A. Rate for CDs Based on Maturity



B. Share of the CD Deposits Based on Maturities (averages of daily data)



Source: Office of the Financial Superintendent of Colombia (form 441), calculations by *Banco de la República*.

over 10% (6.1% in real terms) (Graph 2.12). With the shock, the supply of long-term funds was substantially reduced while, at the same time, the supply of demand deposits or shorter-term deposits increased (less than a year, Graphs 2.12 and 2.14). Although CD interest rates showed high volatility at the beginning of the crisis, they ended up declining at the end of the second quarter. As of June, the total interest rate on these deposits was 68 bp lower than the average that had been registered in March.[25] Nonetheless, funds deposited in CDs remain concentrated in maturities of less than six months, and especially on ninety days (Graph 2.14).

The demand for credit by companies, especially large ones, rose considerably at the beginning of the crisis. The above is a reflection of the uncertainty regarding the future course of their cash flows during the quarantine and the financing conditions during the following months. The peso-denominated commercial loan portfolio grew substantially between March and May. During those months, their balance grew more than twice what had been registered throughout the entirety of 2019.[26] At the beginning of the crisis, the disbursements for this category were concentrated in the corporate segment, that is, in companies that, under the current circumstances, may have a lower risk. However, a slowdown in disbursements in this segment has been seen (Graph 2.15) in recent weeks.

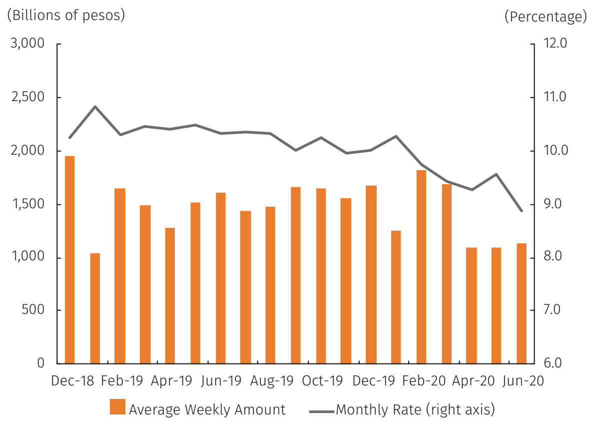
Credit disbursements to households and microbusinesses fell significantly. From mid-2018 to the beginning of the crisis, the consumer loan portfolio had fueled the growth of the credit institutions' balance sheets (Graph 2.16). This changed abruptly starting the last week of March when disbursements of this type of loan (including credit cards for individuals) fell to less than half the level seen in the first two months of the year. With this, the balance of the consumer loan portfolio began to fall, and its annual change went from 17% (12.6% in real terms) in the first weeks of March to 9.8% (6.7% in real terms) in June. Regarding the mortgage portfolio, this has also slowed down but less sharply than the consumer loan portfolio. For microcredit, the reduction in disbursements in the second quarter was even more significant. As of May, there has been a slight recovery in the disbursements of these categories of loans. **With respect to the interest rates for the loans, the majority of them had registered declines by the end of June and are now at levels lower than or similar to those seen prior to the pandemic.** During the last week of March and the first one of April, the sharp drop in disbursements of loans other than commercial ones was accompanied by sudden

25 Similar reductions were seen for the different maturities: 66 bp for CDs with an agreed maturity of less than six months, 85 bp for CDs with an agreed maturity between six months and one year, and 89 bp for those with an agreed maturity of more than one year.

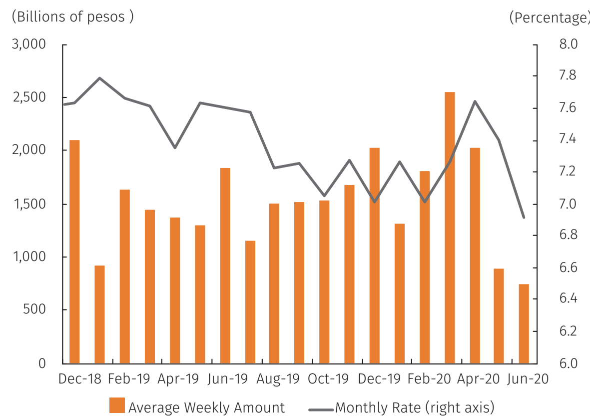
26 Between March and May, the balance for the gross commercial loan portfolio in domestic currency rose COP 19,819 b, while throughout 2019, it had risen COP 8,318 b.

Graph 2.15
Rates[a/] and Disbursements of Commercial Loans

A. Ordinary Commercial Loans



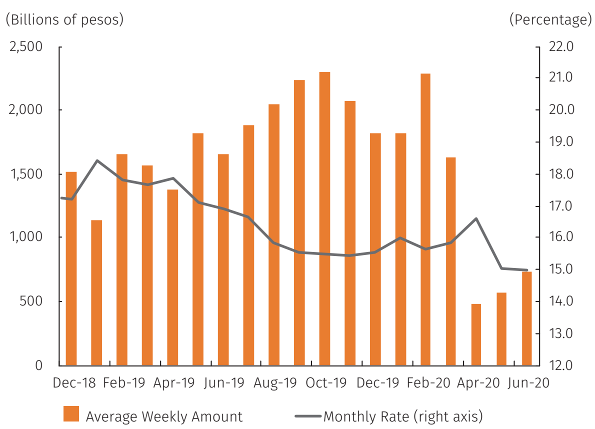
B. Preferential Commercial Loans



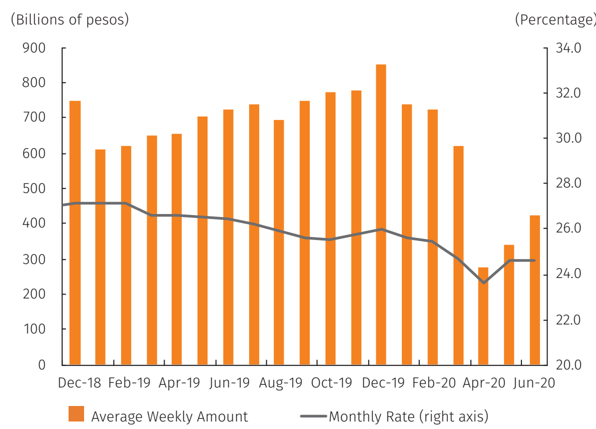
a/ Amount-weighted average monthly rates.
Source: Office of the Financial Superintendent of Colombia (form 088), calculations by *Banco de la República*

Graph 2.16
Loan Rates[a/] and Disbursements to Households and Micro-Businesses

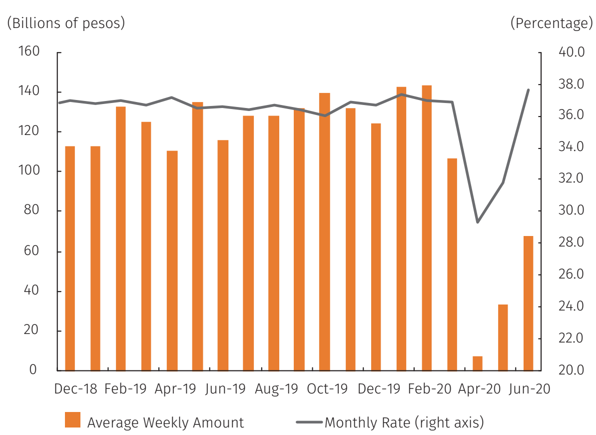
A. Consumer Loans



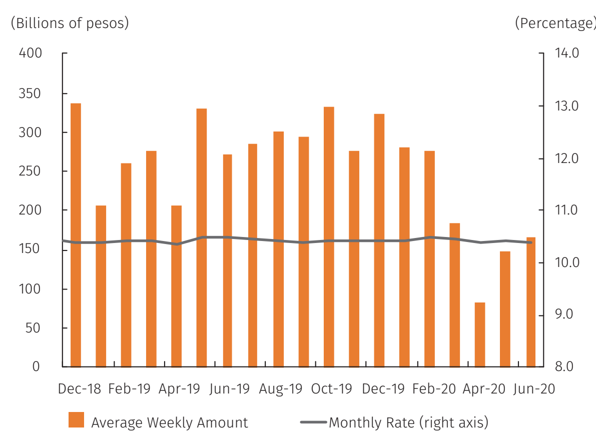
B. Credit Card - people



C. Microcredit



D. Purchase of Housing (Non-LIH)



a/ Amount-weighted average monthly rates.
Source: Office of the Financial Superintendent of Colombia (form 088), calculations by *Banco de la República*.

and sharp movements in their interest rates.[27] This occurs, in part, because when the total disbursements is low, changes in the share held by the different entities that offer these types of loans and in the agreed maturity for which transactions are made affect aggregate rates more significantly. In spite of the fact that the disbursements remained at a level that was considerably lower than the one prior to the beginning of the crisis, less volatility was seen in the interest rates starting in May. With the exception of consumer loans covered by automatic payroll deductions, commercial treasury loans, and microcredits,[28] the interest rates for the majority of loan categories stood, at the end of June, at levels lower than those registered in February and March.[29]

At the current juncture, there may be shifts in both the supply and demand for credit. Recent data show a significant decrease in average weekly disbursements for all categories of loans, but mainly consumer loans, in comparison to what was seen before the crisis. For this category, including credit cards, the reduction in amounts disbursed and the rates suggests that the strongest effect is the shrinking of demand.[30] In the case of mortgage loans, the decrease in disbursements together with the almost zero transmission of the reduction in the policy rate shows that there could also have been a contraction in the supply. For the commercial loan portfolio, in the preferential sub-category, the significant increase in disbursements at the beginning of the crisis suggests there was a greater demand at that time. There were also major disbursements in the ordinary commercial sub-category in March, but they included decreases in the interest rates. This would indicate a larger supply in this segment which could have reversed itself in the weeks that followed.

The nature of the shocks makes the transmission of the decreases in the policy interest rate to the interest rates for loans difficult. In line with what has been seen in previous episodes, declines in the benchmark interest rate are fully transmitted to the interest rates for loans over the course of a year. Likewise, interest rates for deposits react faster than the ones for loans when there are changes in the benchmark rate. As has been stated, this has begun to happen. In contrast to what has been registered so far, the transmission to the rates for loans to households takes longer than those for loans to businesses.[31] In general, the transmission of monetary policy decisions to interest rates

27 For example, in the case of credit cards, the lowest number of transactions was registered in April since that information has been available (May 2002) and the rate fell 107 bp that month. For microcredit, the disbursements for that month were equivalent to only 5.0% of the average for 2019, and the rate declined 747 bp.

28 Compared to February and up to June, the rate for consumption through loans covered by automatic payroll deductions rose 4 bp; the commercial treasury loan, 149 bp; and the one for microcredit, 69 bp. Compared to March, consumer loans covered by automatic payroll deductions rose 9 bp; commercial treasury loan, 5 bp; and microcredit, 78 bp.

29 Compared to February (prior to the start of the crisis) and up to the June cut-off date, the interest rate for preferential commercial loans was 10 bp lower; the one for ordinary commercial loans, 87 bp lower; the one for consumer loans, 62 bp lower; credit cards for individuals (excluding one payment purchases and advances), 125 bp lower; and purchase of non-LIH housing, 10 bp lower. Compared to March, prior to the change in the monetary policy stance and with a June cutoff date, the average preferential commercial interest rate was 35 bp lower; the ordinary commercial loan, 56 bp lower; the one for consumer loans, 83 bp lower; credit cards for individuals (excluding one payment purchases and advances), 8 bp lower; and purchase of non-LIH housing, 7 bp lower.

30 In the case of loans covered by automatic payroll deductions, no transmission of the interest rates was seen which also suggests that there was a decline in the supply.

31 There are several factors that influence the transmission among which are: the type of loan, the time periods offered, the presence of maximum rates (usury and maximum remuneration), and the economic conditions of the country. For more detail see Chavarro, X.; Cristiano, D.; Gómez, J.; González, E.; Huertas, C. (2015). "Evaluación de la transmisión de la tasa de interés de referencia a las tasas de interés del sistema financiero", *Borradores de Economía* No. 874, *Banco de la República*.

for loans presupposes the proper functioning of the credit market (for different maturities) and a significant sensitivity of consumer and investment decisions to variations in the cost of credit and money. It is possible that these factors are being disrupted under the conditions imposed by the shocks that the economy is currently facing and are likely affecting the transmission of the policy rate to credit rates. That is why the immediate response of monetary policy has been the appropriate provision of liquid funds to financial intermediaries, supplemented by the national government's provision of guarantees for the new loans they offer.

The reduction in the cost of funding is offset by the increase in the risk involved in various types of loans due to which the government programs turn out to be fundamental and will enhance the actions taken by *Banco de la República*. Credit risk tends to delay the transmission of the policy interest rate to the extent that it makes intermediation activity more expensive. At this time, the increase in that risk may be significant since several of the economic sectors will remain closed for a period that will depend on the outcome of the pandemic and what could be a prolonged increase in unemployment. Several of the programs that the government has implemented so far (mentioned in section 2.2) mitigate the risk for financial intermediaries to some extent. Therefore, they may also contribute to a better transmission of the reductions in the monetary policy rate.

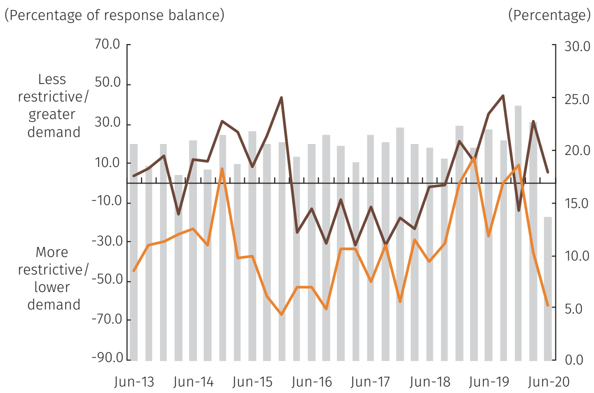
Financial entities perceive decreases in households' demand for credit and increases in the demand of commercial entities credit. With regard to outlook, according to *Banco de la República*'s June 2020 *Survey of the Credit Situation in Colombia*, financial institutions have seen declines in credit demand in the recent past for the categories of consumer, housing, and microcredit and increases (although weak) for the commercial category. At the same time, the institutions' perceptions point to a more restrictive supply of credit for loans to firms and households (Graph 2.17). These perceptions are consistent with more sluggish credit markets associated with the sudden slowdown in the Colombian economy that has been reflected in the downturn in disbursements since April.

As of May, the growth rates of the non-performing and risky loan portfolio were still low. However, these could deteriorate in the second half of the year. Growth rates of the non-performing and risky loan portfolio remained low and have shown a downward trend since mid-2018. Thus, the macroeconomic shocks of the current emergency found the financial system emerging from a phase of high materialization of credit risk that it had gone through between 2016 and 2018 (Graph 2.18). In the short term, the changes in loan portfolio quality will be determined by the effects of the economic slowdown and of the provisions established by the FSC to mitigate the debtors' financial burden and make some supervision requirements more flexible.[32] At the beginning of June, these benefits may have covered loans amounting to approximately two fifths of the total volume. This loan portfolio volume mainly consists of the commercial and consumer categories. However, with regard to the total balance for each category, the housing and consumer loan portfolios are the ones that have made the most use of these measures (Graph 2.19).

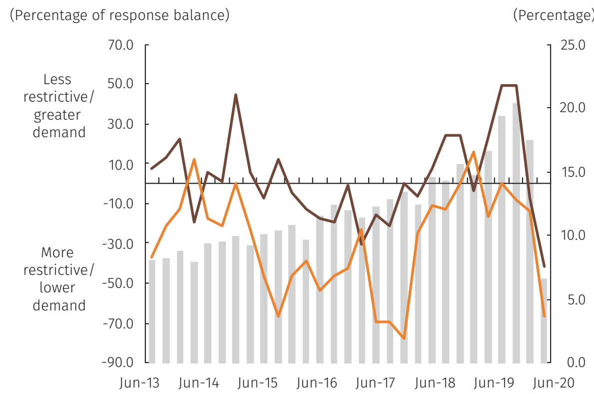
32 These provisions were decreed in External Circulars 007 and 014/2020 of the Office of the Financial Superintendent of Colombia.

Graph 2.17
Credit Establishments' Perception of Credit Demand and Change in Requirements for Granting New Loans
(balance and annual change)

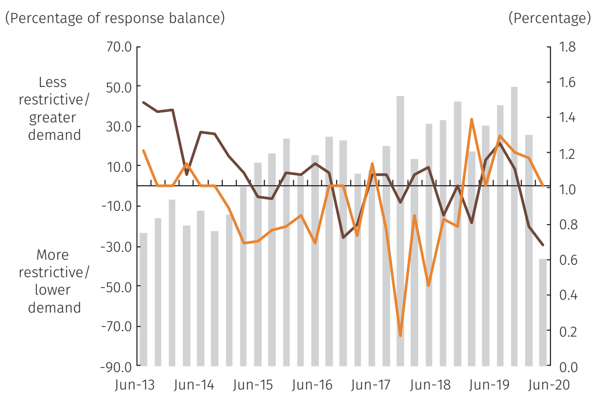
A. Commercial



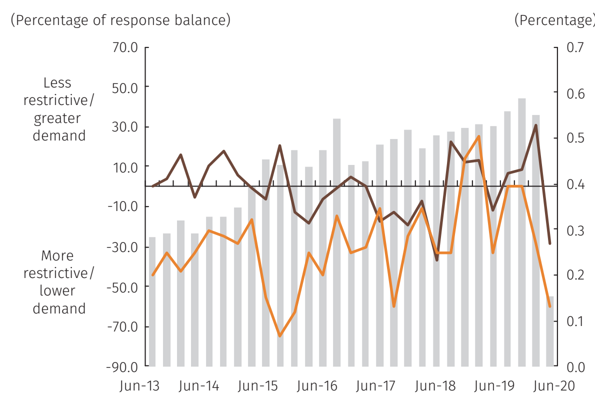
B. Consumer



C. Housing



D. Microcredit

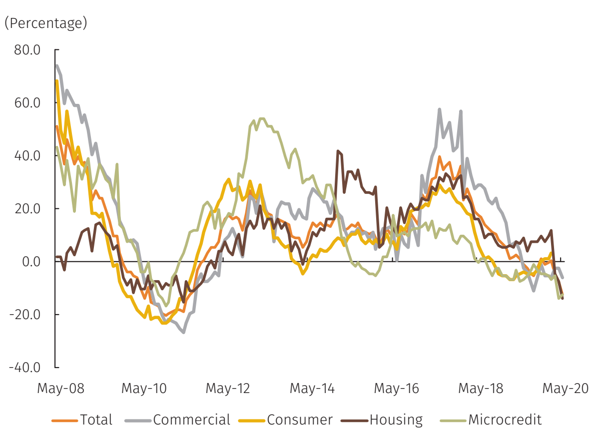


Cambio en la demanda — Cambio en las exigencias de nuevos créditos — Promedio de los desembolsos mensuales (eje derecho)

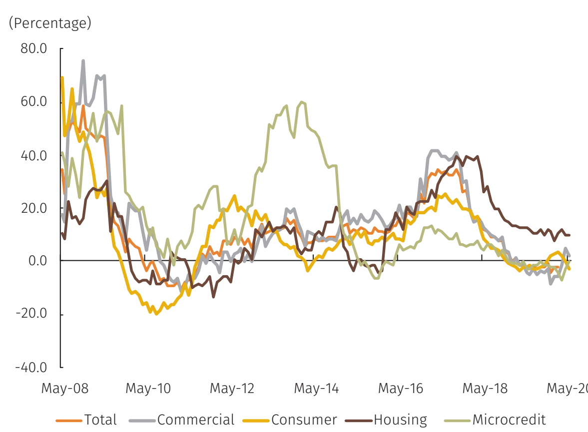
Sources: Office of the Financial Superintendent of Colombia, and *Banco de la República*, calculations by *Banco de la República.*

Graph 2.18
Growth of the Risky and Past-Due Loan Portfolios

A. Past-due portfolio



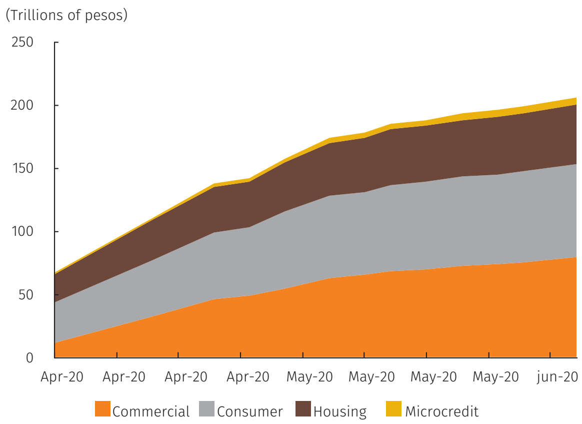
B. Risky Loan Portfolio



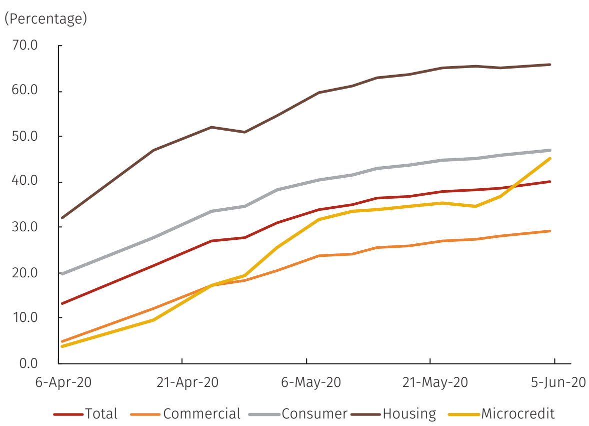
Source: *Office of the Financial Superintendent of Colombia*, calculations by *Banco de la República.*

Graph 2.19
Portfolio Covered by Grace Periods, by Category

A. Balance

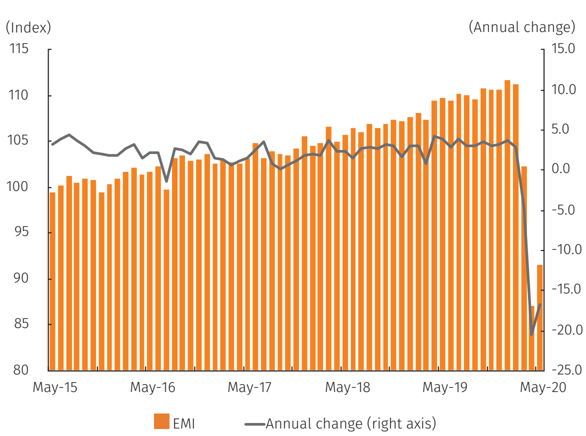


B. Share of each Category in the Total Portfolio



Source: *Office of the Financial Superintendent of Colombia*, calculations by *Banco de la República.*

Graph 2.20
Economic Monitor Index (EMI)
(seasonally and calendar adjusted series)



Source: DANE, calculations by *Banco de la República*

2.4 Change in Economic Activity, Labor Market, and Balance of Payments

The evolution of the pandemic and the health measures needed to deal with it that were established by the national government and local governments have caused an inevitable, unprecedented deterioration in the country's economy and labor market due to both its speed and magnitude. Added to this is the fall in national income due to lower external revenue. The gradual opening up of the economy, the counter-cyclical fiscal measures, and monetary policy actions are expected to contribute to the recovery of economic activity.

2.4.1 Economic Activity

The Colombian economy was significantly dynamic at the start of the year, and this pointed to a growth of more than 3%, mostly sustained by domestic demand. This is what the favorable results of various economic activity indicators available in January and February such as retail sales and vehicle registrations projected since they showed annual growth rates equal to or greater than those seen in 2019 and suggested strong private consumption. Likewise, a significant expansion in imports of capital goods (in constant Colombian pesos) heralded a positive performance for the investment in machinery and equipment. These trends were corroborated by the broader measurements made by DANE with the economic monitor index (EMI) that showed an annual growth rate of 3.3% (seasonally adjusted and adjusted for calendar effects), on average, in the first 2-month period of the year (Graph 2.20). The EMI also showed that a wide range of branches of production was maintaining significantly strong growth.

Nevertheless, the appearance of Covid-19 in March led to an abrupt decline in economic activity like it did in most countries around the world, and this was impossible to anticipate. DANE's EMI registered a significant decrease for that month (-4.8% with the seasonally and calendar adjusted series) which contrasted with its growth during the previous two months (Graph 2.20). Although the fall was concentrated in the second half of the month, and coincided with the enforcement of a strict quarantine by decree of the national and local governments, some high-frequency figures such as the demand for electricity and commercial transactions by debit and credit card indicate that, in some areas, the declines began in early March and suggest that consumers were retrenching spontaneously. According to the estimates made by the technical staff at the Bank, the social distancing measures (voluntary and imposed) may have led to an approximate 30% reduction in the output level during the last nine days of March in comparison to normal conditions.

Given the above, there was very low growth in the first quarter of 2020 such as has not been registered for more than a decade and a lot lower than what the sectoral indicators implied in the first two months of the year. According to DANE, the GDP (seasonally and calendar adjusted series) expanded 0.4% in the first quarter year-to-year and registered an annualized quarterly variation of -9.2%. With respect to demand, the sharp downturn of the GDP was mainly due to the pronounced deterioration in exports and gross capital formation (Table 2.1). Private consumption showed positive annual growth in spite of its slowdown. The figures in this aggregate suggest that the Covid-19 shock produced a restructuring of household spending in favor of non-durable goods and against the remaining types of expenditure in March. This phenomenon, which has occurred in many countries, is probably the result of the lower possibilities for purchases in other segments of consumption due to the market closures. Gross fixed capital formation, in turn, was rolled back mainly due to the investment in machinery and equipment as well as to the residue (which corresponds to the non-detailed sum of statistical discrepancy and changes in inventories, according to DANE). Housing investment also fell while investment in public works maintained a positive impetus (according to supply figures). Going by branches, Covid-19 and other factors produced the most marked declines in construction (-7.5%), mining and quarrying (-4.6%), artistic and recreational activities (-3.2%), and manufacturing (-2.1%) (Table 2.2). In contrast, the agricultural sector had an outstanding performance that accompanied the increase in the demand for non-durable consumption.

Table 2.1
Real Annual GDP Growth by Type of Expenditure, seasonally and calendar adjusted series, (base year 2015) (percentage)

	2019				2019	2020
	Q1	Q2	Q3	Q4	Full year	Q1
Total consumption	4.1	4.3	4.7	4.5	4.4	3.4
Household consumption	3.9	4.2	4.9	4.7	4.5	3.9
Non-durable Goods	3.8	4.2	5.9	5.9	5.0	13.2
Semi-durable Goods	4.1	5.0	6.5	7.2	5.7	-4.5
Durable Goods	6.2	9.0	3.6	7.3	6.5	6.7
Services	3.4	4.3	4.3	3.7	3.9	-1.0
General government consumption	4.0	5.3	4.1	3.7	4.3	3.5
Gross Capital Formation	1.8	4.7	5.4	3.9	4.0	-2.1
Gross Fixed Capital Formation	6.0	6.7	4.3	0.2	4.3	-1.0
Housing	-4.7	-7.4	-7.0	-10.6	-7.4	-6.6
Other buildings and structures	7.7	3.2	7.1	-0.7	4.2	3.3
Machinery and Equipment	14.9	23.0	12.7	5.0	13.9	-1.9
Cultivated biological resources	2.0	4.5	1.5	-5.5	0.5	1.3
Intellectual property products	1.4	1.3	2.5	5.3	2.6	1.7
Domestic demand	4.3	4.0	5.3	3.8	4.3	1.5
Exports	3.7	6.5	1.6	-1.3	2.6	-5.8
Imports	8.2	9.3	11.1	4.0	8.1	0.7
GDP	2.6	3.6	3.4	3.4	3.3	0.4

Source: DANE, calculations by *Banco de la República.*

Since the development of the pandemic and the strictest health measures to contain it would have been concentrated in April and May, the second quarter will probably have the largest reduction in economic activity for the year. The decisions made by the national government and local administrators led to complete lockdowns of many productive sectors during April and the first days of May (see Shaded section 2). Since the mid-point of that month, some sectors, especially construction, industry, and commerce, have gradually opened up. However, severe restrictions on branches such as tourism, hotels, restaurants, and artistic and entertainment activities persisted. Given the above, the technical staff estimates that the annual change in the GDP during the second quarter will probably have been close to -16%. This represents an unprecedented fall since quarterly records of economic activity have been kept. Some market analysts estimate similar or somewhat smaller reductions in the GDP for the same period. With regards to supply, there would be reductions in the majority of the large branches of economic activity with the notable exceptions of agribusiness where no limitations were imposed on its operations as well as public administration, education, and health. With respect to demand, the largest contributions to the annual fall in the GDP are estimated to have come from reductions in private consumption, especially of services, and investment. There would also have been sharp declines in real exports and imports.

Table 2.2
Real Annual GDP Growth by Branches of Economic Activity
(c seasonally and calendar adjusted series, base year 2015)
(percentage)

	2019				2019	2020
	Q1	Q2	Q3	Q4	Full year	Q1
Agri-business, Forestry, Hunting, and Fishing	-0.5	0.6	2.4	5.0	1.9	7.9
Mining and Quarrying	5.1	2.1	1.2	-0.1	2.0	-4.6
Manufacturing Industry	0.5	2.2	1.8	1.9	1.6	-2.1
Electricity, Gas, and Water	2.7	3.0	2.9	2.6	2.8	4.0
Construction	-4.2	0.9	-3.9	-0.4	-2.0	-7.5
Buildings	-4.7	-5.8	-13.8	-9.9	-8.6	-18.0
Public works	9.8	11.6	12.1	9.3	10.7	7.4
Specialized Construction Work	1.2	-0.3	-6.8	-4.7	-2.8	-11.6
Commerce, Repairs, Transportation, & Accommodations	3.1	5.0	6.1	5.1	4.8	-0.1
Information and Communications	3.4	3.4	-0.1	0.4	1.7	1.4
Financial and Insurance Business	6.6	4.2	7.8	4.2	5.7	2.3
Real estate	2.6	3.2	3.1	2.9	3.0	2.6
Professional, Scientific, and Technical Work	3.1	3.8	4.1	3.6	3.7	2.9
Public Administration and Defense, Education, Health	4.1	5.0	5.0	5.4	4.9	3.2
Artistic, Entertainment, and Recreational Activities	4.1	3.2	4.0	2.4	3.4	-3.2
Subtotal value added	2.3	3.6	3.2	3.4	3.1	0.6
Taxes minus subsidies	3.7	4.0	5.1	5.5	4.6	1.4
GDP	2.6	3.6	3.4	3.4	3.3	0.4

Source: DANE, calculations by *Banco de la República.*

Public consumption was probably the only component of demand that grew in the second quarter as a result of the State's efforts to contain and mitigate the effects of the pandemic and of social isolation measures.

Added to the positive impact of the monetary and fiscal policies, the relaxation of social isolation measures with the gradual control of the epidemic should make the gradual recovery of economic activity possible during the second half of this year. In the second half of the year, a recovery in those productive sectors where the restrictions began to be lifted in the middle of the second quarter is expected. Other sectors such as tourism, hotels, restaurants, and arts and entertainment that will open later are expected to be fully operational during the fourth quarter. With that, the GDP levels will probably rise during the second half of 2020 although it is likely to continue to register negative but smaller annual changes than the ones anticipated for the second quarter. Domestic demand should recover gradually during this period spurred by a reactivation of private consumption from very low levels due to which its annual growth is also likely to remain negative. The recovery is also likely to be sustained by public consumption, which will probably remain strong for the rest of the year. Although investment could also improve in the second half of the year, it is expected to do so at a slower pace than consumption. The gradual increase in the level of domestic demand could translate into an equivalent increase in imports. With respect to exports, these should also rise and exhibit an increasingly less negative annual growth that could be explained by the recovery of external demand. The gradual recovery of economic operations will be facilitated by a currently historically expansive monetary policy and by the impetus of fiscal policies. Given the above, the technical staff at *Banco de la República* estimates that economic growth for the entirety of 2020 will probably stand within a range of -10.0% to -6.0%. This is likely to imply a significant widening of the economy's excess productive capacity or output gap (from -0.6% in 2019 to a range between -7.0% and -5.0% in 2020). The width of the forecast range reflects the uncertainty about the magnitude of the shock received in the second quarter and the additional containment measures for dealing with the future evolution of the pandemic.

2.4.2. Labor Market

The pandemic produced an unprecedented deterioration in rural and urban employment in Colombia that affected the salaried and non-salaried segments the same way. Based on the monthly seasonally adjusted series,[33] the number of people employed in April registered a yearly contraction in the national level and in the thirteen cities of 24.5% (5.3 million jobs) and 27.9% (3 million jobs) respectively. These decreases have been the largest in the history of the seasonally adjusted series and meant the loss of about a quarter of the pre-crisis employment level (Graph 2.21). In spite of the fact that annual contractions in employment continued to be registered in both the national total (-22.1%) and the thirteen cities (-22.5%) in May, the flexibility of mobility restrictions and the reopening of some branches of economic activity allowed for a slight upturn in employment in both geographical domains (930,366 and 639,741 jobs for the national total and the thirteen cities respectively) compared to the very low levels in April. Note that the destruction of employment has been general in nature in both the urban and rural areas and that, in spite

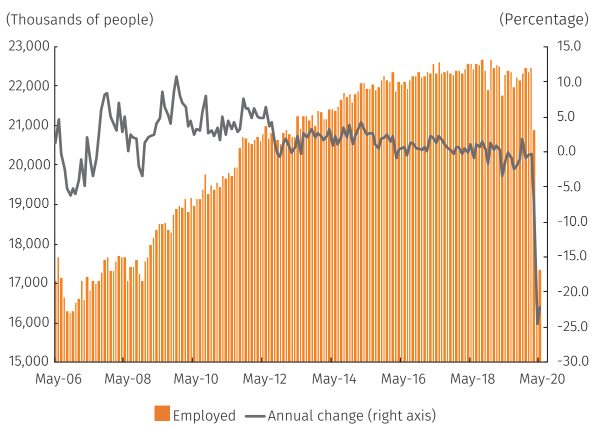
33 The labor market figures are showing a seasonal adjustment, i.e., their numbers are systematically higher or lower depending on the month of the year. This phenomenon has to be identified through statistical techniques in order to compare different months of the same year. That is why the information given in this section corresponds to the series that does not have such calendar effects which is called the seasonally adjusted series.

of the greater rigidity in the salaried segment, when salaried jobs are compared to non-salaried jobs, the effect on them has been similar.

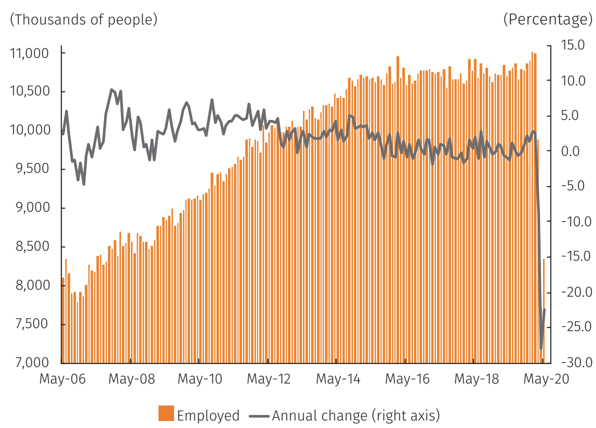
Much of the employment destroyed was absorbed by inactivity since it was impossible to look for a job given the restrictions on movement. This mitigated the rises in unemployment rates that were, nonetheless, historical. The drop in employment was accompanied by the impossibility of actively looking for jobs given the restrictions on mobility, and this led to a historic increase in inactivity. In April, the number of inactive workers registered a 29.0% increase (4.3 million inactive workers) in the national total and a 34.1% increase (2.1 million inactive workers) in the thirteen cities. This rise in inactive workers came to a halt in May and, therefore, a monthly decline in unemployment has been seen in both geographic domains (Graph 2.22). The increase in the inactive workforce prevented all of the decline in employment from being reflected in unemployment due to which the unemployment rate (UR) did not

Graph 2.21
Changes in Employment
(seasonally adjusted monthly)

A. National Total



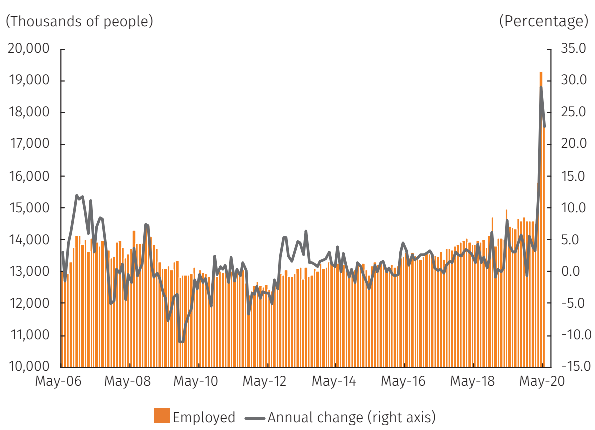
B. Thirteen Main Metropolitan Areas



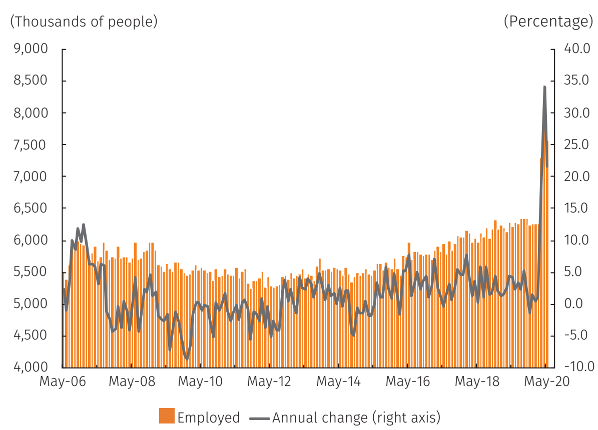
Source: DANE (GEIH) and calculations by *Banco de la República*.

Graph 2.22
Changes for Inactivity
(seasonally adjusted monthly)

A. National Total



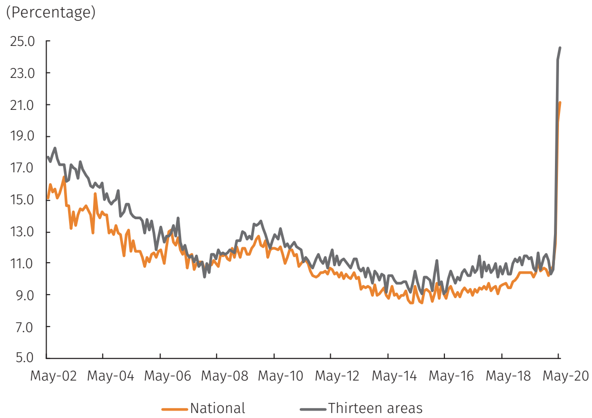
B. Thirteen Main Metropolitan Areas



Source: DANE (GEIH) and calculations by *Banco de la República*.

Graph 2.23
Unemployment Rate by Domain
(seasonally adjusted)

A. Monthly



B. Quarterly moving average

Source: DANE (GEIH), calculations by *Banco de la República.*

increase as much as the employment rate fell (ER).[34] Even so, the UR registered historically high figures, the highest since monthly data became available (2001). The national and urban seasonally adjusted UR for May stood at 21.2% and 24.6% (Graph 2.23, panel A) respectively while for the quarterly moving average (March-May) these were 17.6% and 20.3% (Graph 2.23, panel B).

Simulations done by *Banco de la República* that are linked to the forecasts of economic activity suggest a sharp deterioration in the average national unemployment rate for all of 2020. The information available regarding the labor market as of May showed that the drop in employment and participation had probably bottomed out in April given the slight upturn of both aggregates at the margin. The gradual recovery of employment is expected to continue in June and over the second half of the year driven mainly by the non-salaried segment since salaried employment takes longer to create. The simulations done by the technical staff estimate that the national UR will probably be between 16.5% and 19.0% on average for the entirety of 2020. This percentage range was revised upwards from the initial forecasts[35] due to the inclusion of both the most recent figures from the labor market and the worse outlook with regard to economic activity. It must be emphasized that a large part of the rapidity with which the economy reactivates will depend on the recovery of the labor market which, in turn, will make increases in available household income possible and, therefore, greater consumption.

Given the weakness expected in the labor market during 2020, there would be no be any inflationary pressure through salary expenses. The shock of the pandemic involved a widespread and unprecedented deterioration in the Colombian labor market that was reflected in not only quantity indicators such as the UR and indices of job openings but also in price metrics, i.e., in labor income. Data from the household survey showed substantial declines in the median hourly earnings of non-salaried workers in April while the sectoral surveys from April also showed a sharp decline in the salary indices. All of the above suggests a very weak labor market where no inflationary pressures through salary costs are likely to be seen for the remainder of the year.

34 UR is defined as the ratio between people who are looking for work and the economically active population (EAP). The trend of the UR is influenced by the interaction between the supply of and demand for labor, which are defined by the overall participation rate (OPR) and the employment rate (ER) respectively. The OPR is the ratio between the EAP and the working age population (WAP) while the ER is the ratio between the employed population and the WAP. Based on the above, the UR could be expressed as: $UR = \frac{OPR-OR}{OPR}$.

35 See *Banco de la República's* Labor Market Report no. 14 in which, before the impact of the pandemic was known, a UR of between 15.0% and 17.0% was estimated for the entirety of 2020 due to that outbreak.

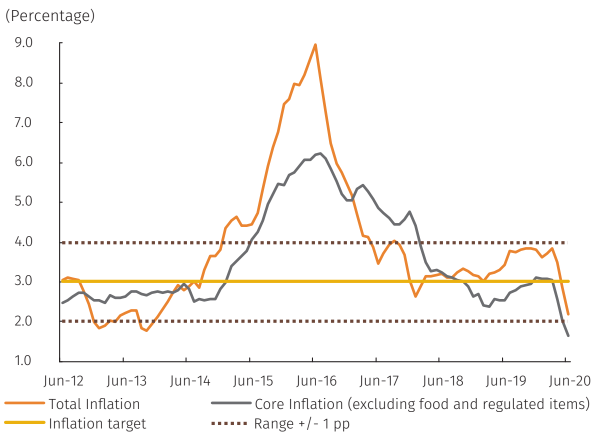
2.4.3 Balance of Payments

In the first quarter of 2020, there was a reduction in the dollar-denominated current account and as a share of the output in comparison to the same period the previous year. The changing economic and financial conditions brought about by the Covid-19 pandemic were reflected in a lower domestic demand, weakness of our trading partners, and the significant reduction in the prices of petroleum. The above brought about a reduction in the current account deficit in the first quarter of 2020 that was estimated at 3.7% of the quarterly GDP compared to the 4.5% seen during the same period in 2019. The decrease in profits earned by companies with foreign capital and the higher income from workers' remittances were the main determiners of the reduction in current account deficit, that was partially offset by a slight increase in the deficit in the trade balance of goods and services (see Shaded section 3).

Foreign direct investment continued to be the main source of external financing in the first quarter of 2020. The counterpart to the country›s smaller current account deficit was their lower financing needs since the financial account registered net capital inflows of USD 2,378 m (3.3% of the quarterly GDP) between January and March of 2020 that were lower than what had been seen a year earlier when they totaled USD 3,306 m (4.2% of the quarterly GDP). In spite of the above-mentioned external and internal shocks, FDI continues to be the main source of foreign financing (USD 3,589 m, 5.0% of the quarterly GDP), in particular, those funds oriented towards companies which concentrate on the provision of utilities for the domestic market. However, it should be noted that capital inflows into most economic activities decreased, especially in the mining and energy sector. In addition, the rest of the sources of financing showed a mixed performance given that external indebtedness accounted for net disbursements of USD 1,229 m in contrast with the net liquidations of portfolio investment (USD 453 m).

For the entirety of 2020, an annual decrease in the dollar-denominated current account deficit and as a percentage of output is expected. The negative impact of Covid-19 on private consumption and investment will probably lead to a correction in the current account deficit, and the depreciation of the peso that is expected for this year could contribute to this also. These factors are likely to trigger a drop in imports of goods and services as well as of the profits of companies with foreign capital participation. The latter would also be affected by the lower profitability of oil and mining firms. The decrease in the prices for crude oil and coal, the more limited growth of our trading partners, the reduction in workers' remittances, and lower exports of tourist services, along with other things, in turn, could limit the country's external adjustment. With all of the above, the estimate is that the current account deficit for all of 2020 will probably be lower in dollars and as a share of the output than what was registered last year (4.3%) although the uncertainty with respect to that is high and unprecedented. This is reflected in a broad interval for this forecast (between -5% and -2% of the GDP). Thus, the reduction of the deficit in the current account is probably a reflection of the greater sluggishness expected of domestic demand due to the pandemic shock. It is worth mentioning that Colombia is likely to continue to have permanent access to international markets for financing the deficit in the current account. Foreign direct investment will probably be affected by the economic environment but the likelihood is that it will continue to be a substantial source of funding from abroad to which may be added the capital associated with loans and bonds targeting the public sector.

Graph 2.24
Consumer Price Index (CPI)
(annual change)



Sources: DANE and *Banco de la República*

2.5 Changes in Inflation

The downward pressure on prices, a result of the fall in aggregate demand and of the price breaks implemented by the government, have overcome the upward effects caused by the restrictions on supply (due to the lockdown of several economic sectors). This has been reflected in a decline in total and core inflation for which the forecasts and expectations are below the 3.0% target.

The growth trend that was causing inflation for consumers at the beginning of the year (between January and March) reversed itself with the impact generated by the pandemic phenomenon. In fact, annual consumer inflation, which did not decline during the first quarter but stood at 3.86% in March, fell sharply in the second quarter and closed June at 2.19%. Generally speaking, the results were well below the ones anticipated by the market and the technical staff at *Banco de la República* several months ago and were at their lowest level since 2014. A similar trend was seen in core inflation (approximated as annual inflation excluding food and regulated) which went from 3.04% in March to just 1.66% in June spurred by drops in the annual changes in the consumer price indices (CPI) for tradable and non-tradable goods (Graph 2.24 and Table 2.3). Since April, there has been a substantial downturn in the rate of adjustment for prices and even reductions in the levels of a broad set of items. These reductions have been especially marked in the case of the CPI for regulated items, but they have also begun to be seen in food which, at the beginning of the quarantine, registered increases whether this was due to climate problems or the restructuring of household expenses.

Along with the sharp shrinking of demand, the Covid-19 phenomenon has led the authorities to decree a significant alleviation in prices that explains much of the decline in inflation and that, so far, has offset the upward pressure stemming from supply constraints. Except for food, household demand has fallen sharply in the case of the majority of the goods and services that are sold in the country's markets. This factor, along with the closure itself of markets due to the preventive social distancing measures decreed by the national government and local authorities, has limited the price adjustments and has even led to reductions regarding where transactions have been possible. Added to this downward pressure were various types of mitigation, most of them transitory, for the consumer prices decreed by the national or territorial authorities to support household purchasing power. Among these are included the freezing of rental fees and utility rates,[36] the lowering of the price for fuel by almost COP 1,300 that has been effect since mid-March, the temporary elimination or reduction of the value added tax (VAT) on a group of goods and services,

36 This refers to payments that were deferred for several months, the increase in subsidies to the low income population, and even bill payments, as was seen in Manizales.

Table 2.3
Consumer Price and Core Inflation Indicators
(annual change)

Description	New CPI weights a/	Dec-18	Dec-19	Jan-20	Feb-20	Mar-20	Apr-20	May-20	Jun-20
Total	100	3.18	3.80	3.62	3.72	3.86	3.51	2.85	2.19
Excluding food b/	76.16	3.48	3.37	3.30	3.30	3.18	2.55	1.84	1.18
Tradables	19.16	1.09	2.24	2.49	2.51	2.47	2.06	1.33	0.61
Non-tradables	42.31	3.79	3.49	3.33	3.34	3.29	2.78	2.34	2.13
Rentals	25.16	3.42	2.68	2.70	2.68	2.60	2.47	2.29	2.07
Indexed c/	9.08	5.43	5.01	4.87	5.03	4.98	4.83	4.74	4.63
Affected by exchange rate d/	6.99	3.29	4.55	3.59	3.52	3.55	1.19	-0.59	-0.89
Remainder e/	1.08	-0.42	2.78	3.23	2.82	3.19	2.56	1.90	1.61
Regulated items	14.69	6.37	4.48	4.25	4.22	3.78	2.50	1.05	-0.78
a. Utilities	6.69	7.47	6.02	4.90	5.93	5.68	4.67	2.25	0.12
b. Fuel	2.91	7.28	1.90	2.31	1.81	-1.24	-4.87	-7.20	-10.82
c. Transportation	5.09	4.76	3.92	4.50	3.37	4.08	3.76	4.04	3.61
Food f/	23.84	2.43	5.20	4.66	5.05	5.99	6.53	6.04	5.35
Perishables	3.15	8.88	8.66	4.11	5.36	9.79	10.00	6.61	2.52
Processed food	11.90	-0.08	5.04	5.42	6.01	6.46	7.71	7.86	7.75
Eating out	8.79	3.68	4.18	3.84	3.65	3.92	3.59	3.38	3.26
Core Inflation Indicators g/									
Excluding food		3.48	3.37	3.30	3.30	3.18	2.55	1.84	1.18
Core 20		3.23	3.42	3.36	3.25	3.31	2.97	2.55	2.28
CPI excluding perishables, fuel, & utilities		2.76	3.46	3.60	3.59	3.70	3.58	3.34	2.98
Inflation excluding food and regulated items		2.64	3.10	3.07	3.08	3.04	2.56	2.03	1.66
Average core inflation indicators		3.03	3.34	3.33	3.31	3.31	2.91	2.44	2.03

a/ Weightings by the new methodology used to calculate the CPI starting in January 2019.
b/ *Banco de la República* calculations using the new methodology. This excludes the division of food and the subclasses corresponding to eating away from home.
c/ Housing occupancy costs, education, health, private and health insurance, personal services, and other expenses.
d/ Household furniture, tourism, TV services, laboratory tests and images, etc.
e/ Services related to entertainment, games of chance, mail, and banking services, etc.
f/ *Banco de la República* calculations using the new methodology and including the division of food and the subclasses corresponding to eating away from home.
g/ calculations by *Banco de la República*.
Source: DANE, calculations by *Banco de la República* with provisional classifications.

and of the consumption tax (of 8%) on restaurants although, in the latter case, its effect would not be felt until the second half of the year. Demand and price mitigation together with market closures may have prevented the exchange rate depreciation that was accumulated in the first half of the year from being reflected in inflation. Based on the calculations done by the technical staff, close to one percentage point of the reduction in annual consumer inflation in the second quarter is estimated to have been due to the aforementioned reductions.

Weak demand and the large excess productive capacity along with the price relief decreed by the government are expected to keep inflation below the

target for the remainder of the year. Total annual consumer inflation is likely to show a further decline in the coming months thus closing the year within a range between 1.0% and 2.0%. For core inflation, measured as the CPI excluding food and regulated items, a decline is expected that could be more pronounced but having a value that could stand within a range of 1.0% to 2.0% as of December. The main downward pressure will probably stem from weak demand and the existence of significant excess productive capacity. These factors exercise not only direct downward pressure on prices but also an indirect one by mitigating or offsetting possible upward pressure such as the depreciation of the exchange rate. Thus, depreciation should, in principle, not transmit significant upward pressure for the rest of the year. Furthermore, price reductions will continue to occur due to indirect tax relief and other measures. In principle, these are transitory in nature and will probably have short-term downward effects on annual inflation.[37] The moment these reductions expire, increases in prices and inflation may occur. The magnitude of these increases will depend on the state of demand and the degree to which the different markets have opened. Low inflation for the remainder of the year would also be based on the expected trend of food prices since their annual change should continue to fall due to the fact that a favorable climate and weak demand are expected. Likewise, regulated items are likely to end the year with a very low or perhaps negative annual adjustment, especially because of the reduction already mentioned in the price of fuel.

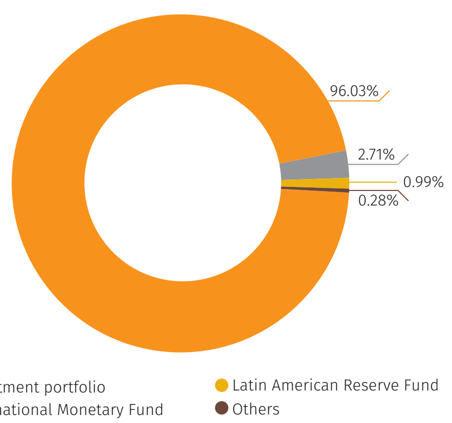
Note that, under the current circumstances, measuring inflation may present considerable biases that make it difficult to analyze and increase the uncertainty about its future trend. The first difficulty arises from the partial or total closure of the markets. This situation means that prices are not generated for many goods and services or that it is impossible or very difficult to obtain them. A second difficulty has to do with the sharp redistribution that has occurred in consumer spending since food and health, as a share of purchases, has increased significantly while spending on other goods and services has decreased. The latter would not be reflected in the fixed weighting structure that the price indices have. As a result, the biases in measuring inflation could be important as is the case in the majority of the countries that are dealing with isolation measures. Added to the above is the transitory nature of the bulk of the price alleviation decreed by the government which also faces uncertainty regarding its effective transmission to the CPI in both its application and its reversal due to the difficulties involved in measuring it and the agents' decisions.

37 At the moment, the decrees related to these reductions have envisaged their expiration in June (in the case of the relief with respect to rent), July (cell phone plans and two days without IVA), August (end of the health emergency, hygiene products), December 2020 (consumerism and tourism) and December 2021 (air tickets).

03 / Foreign Reserves Management

In compliance with Act 31/1992, *Banco de la República* manages the foreign reserves in accordance with the public interest, to the benefit of the national economy, and to facilitate the country's payments abroad. Based on this, the law requires that investment of the reserve assets be done under the criteria of security, liquidity, and profitability. The security criterion under which the foreign reserves are managed in Colombia implies proper control of the risk to which the investments are exposed. In order to manage risks within acceptable parameters and levels, the foreign reserves Committee of *Banco de la República* defines strict limits for exposure to each of the different risks faced by the reserves. In order to comply with the liquidity criterion, the Bank invests the foreign reserves in financial assets that are easy to liquidate or in assets with short-term maturities and defines investment tranches on the basis of liquidity and profitability objectives. Once the criteria are defined to ensure that the foreign reserves portfolio is invested at a low risk, the management policy also seeks to achieve a suitable return since this criterion is part of the mandate given to *Banco de la República* by law. An explanation of the policies that guide the investment of the reserves and some relevant definitions are provided in the Appendix.

Graph 3.1
Breakdown of the Gross Foreign Reserves
(information as of Tuesday, June 30, 2020)



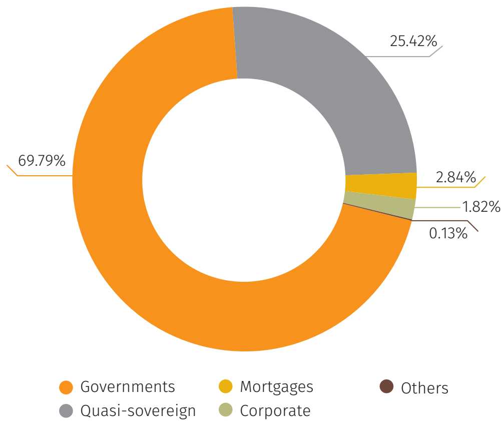
Note: gold is included in the investment portfolio. The item "Others" includes international agreements, cash on hand, and demand deposits.
Source: *Banco de la República.*

As of June 2020, the net foreign reserves rose USD 3,456.3 b with respect to the balance registered in December 2019. The increase in the dollar balance of the foreign reserves was primarily due to the purchase of foreign reserves and the positive profitability gained over the course of the year. As of June 30, net foreign reserves totaled USD 56,623.5 b.[38] The increase during the period was mainly because of the purchase of USD 2 billion and the return on the foreign reserves which, at the close of June 2020, was 3.16% (USD 1,736.8 b), excluding the foreign exchange component. The most important factor for explaining the return on the reserves is the appreciation of the bonds as a result of the decline in the interest rates.

The main component of the foreign reserves is the investment portfolio. This portfolio corresponds to investments in financial instruments on the international market and to the certified physical gold (95.61% and 0.42% respectively of the reserves). The breakdown of the foreign reserves is presented in Graph 3.1.

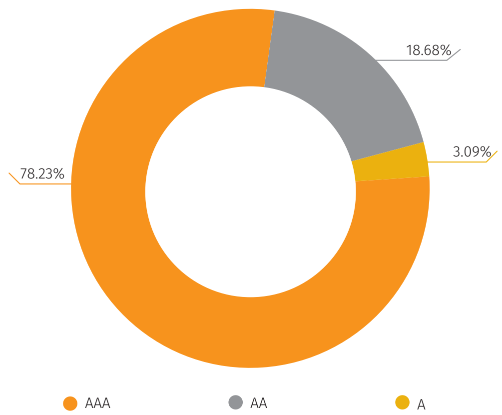
38 The net international reserves are equal to the total international reserves, or gross reserves, minus *Banco de la República's* short-term foreign liabilities. The latter consist of demand obligations to non-resident agents in foreign currency. The gross international reserves came to USD 56,629.17 b and the short-term foreign liabilities totaled USD 5.66 m.

Graph 3.2
Breakdown of Investment Portfolio by Sector
(information as of Tuesday, June 30, 2020)



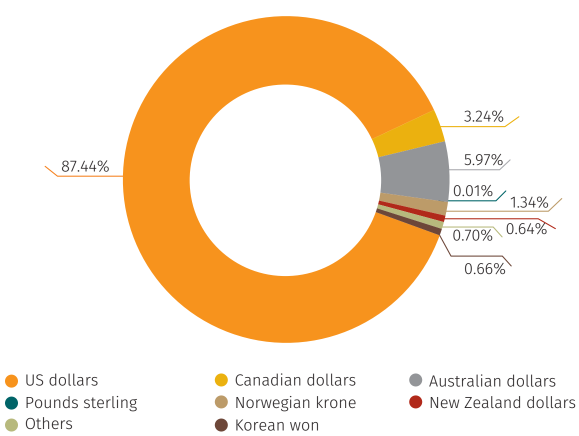
Source: *Banco de la República.*

Graph 3.3
Distribution of Investment by Credit Rating
(information as of Tuesday, June 30, 2020)



Source: *Banco de la República.*

Graph 3.4
Currency Components of the Investment Portfolio
(information as of Tuesday, June 30, 2020)



Source: *Banco de la República.*

3.1 Breakdown of the Investment Portfolio[39]

As of June 2020, the investment portfolio was mainly invested in securities issued by governments or entities related to governments (quasi-sovereign). The breakdown of the investment portfolio as of June 2020 can be seen in Graph 3.2 when about 95.21% was invested in securities issued by these entities.

The breakdown of the portfolio by credit rating is evidence of the high credit quality of the assets the portfolio invests in. Graph 3.3 shows that 78.23% of the portfolio is invested in instruments rated AAA and 18.68% in instruments rated AA. The Bank uses the lowest rating granted by at least two of the three main rating agencies (S&P, Moody's, and Fitch Ratings) as a benchmark.

The investment portfolio is made up of currencies that are characterized by their high daily trading volumes and the fact that they belong to countries with high credit ratings. The United States dollar is the currency with the highest share. Graph 3.4 shows the foreign exchange components of the investment portfolio as of June 30, 2020. The largest share of Colombia's foreign reserves is in US dollars, because a majority of the country's commercial and financial transactions with the rest of the world are carried out in this currency. Investment in the following currencies is also allowed: Canadian, Australian, New Zealand dollars; Swedish krona; the pound sterling; Swiss franc; euros; yen; Norwegian krone; the reminbi; Hong Kong and Singapore dollars, and Korean won.[40]

3.2 Profitability of the Reserves

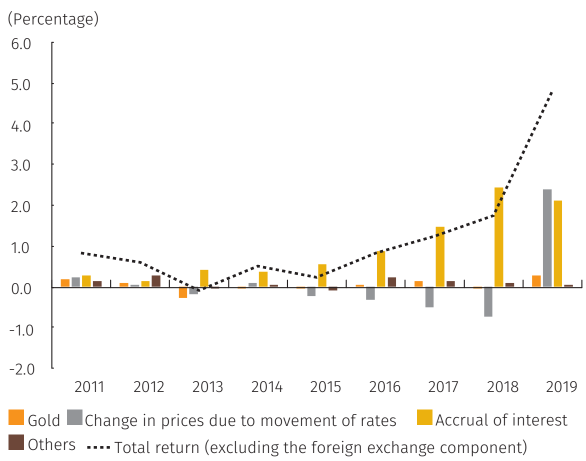
The profitability of the reserves depends primarily on two factors: interest and appreciation. The first factor corresponds to the interest received from the instruments invested in, and the second factor, to the change in the prices of the securities due to movements in the interest rate. The second factor occurs because there is an inverse relationship between bond prices and interest rates: the price of the bonds declines as the interest rates increase and vice versa.

The rate of return on the reserves has accelerated since the end of 2018 as a result of the appreciation of the securities due to the decrease in interest rates in the main developed countries. As can be seen in Graph 3.5, there was

39 The graphs in this section were calculated based on the amount in the investment portfolio excluding the gold.

40 The euro has a very small share in the international reserves investment portfolio because it is not part of the group of currencies that the benchmark index is made up of. The reason why it is not in this group is because both the benchmark interest rate of the European Central Bank and the rates for the main short-term sovereign bonds issued in euros are negative.

Graph 3.5
Historical Profitability of the Foreign Reserves



Source: *Banco de la República.*

a gradual rise in the profitability of the foreign reserves between 2015 and 2018. This trend occurred mainly due to the progressive increase in the monetary policy interest rate of the US Federal Reserve which allowed investments to receive higher interest (interest factor). However, starting near the end of 2018, the return has increased rapidly as a result of the appreciation of the securities because of the decline in the interest rates (appreciation factor). This rate movement occurred after the U.S. Federal Reserve changed its monetary policy at short notice and went from a cycle of gradual increases in the interest rates to an intense period of large and frequent reductions. This was initially because of the global economic slowdown and tensions in international trade, and more recently because of the effects of the global pandemic.

In the first half of 2020, the profitability of the reserves was high (3.16%)[41] and it is likely that this will decline over the remainder of the year. This high return is primarily because of the appreciation factor since interest rates on the main international markets fell to levels close to zero as a result of the measures taken by the central banks in the wake of Covid-19. In particular, the Federal Reserve has supplied the financial markets with liquidity through its monetary policy by reducing benchmark interest rates and implementing an asset purchase program. The above was in response to the shrinking economy, the increase in the unemployment rate, and the rise in uncertainty generated by the impact of the pandemic on the economic recovery scenario. In the near future, lower returns on the foreign reserves are expected given the low level of the interest rates at which the portfolio assets are invested.

3.3 Measures to Reinforce International Liquidity

3.3.1 Renewal of the Flexible Credit Line

On May 1, 2020, the Executive Board of the International Monetary Fund (IMF) approved the renewal of the Flexible Credit Line (FCL) for USD 10.800 billion (SDR 7.849,6 billion, which is equivalent to 384% of Colombia's quota). This new agreement replaces the previous agreement that was approved on May 25, 2018 for 384% of the quota which, on the day it was approved, was equivalent to USD 11.400 billion (SDR 7.848 billion) and that expired in May 2020. Just as in the previous case, this line was requested as a precautionary measure since it is considered to be a useful tool for facing critical situations of the balance of payments. This new agreement will help the country to manage external

41 This profitability is obtained by dividing the actual return by the average value of the net reserves on December 31, 2019 and on June 30, 2020. Since 2015, the impact of the exchange rate effect on the profitability of the reserves has been excluded.

risks in a context of high uncertainty and high volatility, reinforce market confidence, and serve as a safeguard against risks from abroad.

The IMF Executive Board emphasized the country's sound economic policy framework and the timely actions taken by the authorities to mitigate the effects of the Covid-19 pandemic and the dramatic drop in oil prices. According to the report published by the organization, the credible inflation targeting-regime under a framework of exchange rate flexibility, the effective supervision and regulation of the financial sector, and a sound fiscal policy has made it possible for the country to soften the impact of external shocks. Furthermore, the Executive Board noted that the early measures adopted by the authorities to mitigate the spread of the pandemic on the monetary, macroprudential and fiscal fronts will be essential to tackle the health crisis.

The FCL is an IMF instrument that only countries with sound monetary, fiscal, and financial policy frameworks as well as a favorable record of economic performance can get access to. This instrument is designed to provide a line of credit with ample, timely, and flexible financing. The FCL is a credit line that, at the discretion of the country, may be used for one or two years and an evaluation of the country's right to access it is done at the end of the first year.[42] This line is uncapped[43] and allows the country to have immediate access to IMF resources. In addition, the amount may be increased during the agreement as long as the country continues to meet the qualification criteria. The line may be used to manage potential or current funding needs arising from any balance of payments problem. If a country decides to disburse the line, the funds will become part of the country's international liquidity position, and the funds taken as a loan shall be repaid between 3¼ and 5 years after the disbursement.[44]

This line of credit is contingent, immediately accessible, and non-conditional. The FCL has three basic characteristics: 1) it is contingent in character which means that its purpose is to cover the materialization of extreme external risks; 2) access to the funds is immediate. Therefore, they are available for the countries that already have an agreement (currently Mexico, Peru, Chile, and Colombia have a current FCL; 3) it is an non conditional instrument which means that the countries may get access to the line based on their previous conditions and there are no ex post commitments after a disbursement.

Colombia has had access to this line since its creation in 2009 and so far has not needed to use it. The country has treated the line as precautionary and considered it a useful tool for reinforcing the economy's ability to deal with external shocks. Furthermore, an important benefit of the FCL is the signal it sends to the market regarding the prudent management of the economy and its ability to react when there is a crisis, which makes it less vulnerable to speculative attacks. Given the temporary nature of this instrument, access to it is understood to depend on the changes in external conditions and the country's vulnerability to such shocks. In this respect, the Colombian authorities have stated that, the country will gradually phase out the use of the instrument conditional on a reduction of external risks.

---

42 This modification was made on August 30, 2010. Previously, the credit line could have a period of either six months or one year and included a review of the country's access rights after the first six months.

43 Initially, the FCL had an implicit access limit of 1000% of the country's quota in the IMF.

44 Each disbursement is repaid through eight equal quarterly installments starting 3¼ years after the date of each disbursement.

3.3.2 Access to the Federal Reserve repo facility and purchase of foreign reserves

On April 20, *Banco de la República* obtained access to the Federal Reserve repo facility (FIMA). In these transactions, FIMA account holders (central banks and other international monetary authorities with accounts at the Federal Reserve Bank of New York) exchange their U.S. Treasury bonds held in custody at the Federal Reserve for U.S. dollars with the commitment to repurchase the securities the next day and pay the interest. The primary benefit that access to the FIMA repo facility has for *Banco de la República* is to have liquidity in US dollars without having to sell off the assets of the foreign reserves portfolios permanently. This access mitigates the liquidity risk. *Banco de la República* is likely to make use of this repo facility only in the event that, at that time they decide to sell dollars on the spot market, the market for buying and selling Treasury bonds turns out to have very low liquidity.

***Banco de la República* increased their foreign reserves through the direct purchase of USD 2.000 b from the national government.** In order to increase the foreign reserves and considering the monetization of dollars forecast by the national government, *Banco de la República* purchased USD 2 b through the General Office of Public Credit and National Treasury at the Ministry of the Treasury and Public Credit on May 4, 2020 at the MER in effect on that date.

3.4 Reserve Indicators

Based on the model for estimating liquidity needs in foreign currency under an adverse scenario with a one-year horizon, the foreign reserves together with the recently renewed FCL are higher than the required levels. *Banco de la República* established a new methodology in June 2018 for estimating their foreign currency liquidity needs in the event of an adverse scenario in the Colombian economy with a one-year horizon. This methodology follows the same line as the ratio of liquidity coverage (LCR) that was proposed in the Basel III supervisory framework for banks which stipulates that the liquid assets should be enough to cover the liquidity needs within a predetermined period and bearing in mind a stress test.[45] Based on the methodology, the foreign reserves should cover at least the projected current account deficit plus the repayments on the foreign debt over the next twelve months. As of June, foreign reserves covered these items as a whole. Furthermore, the foreign reserves together with the IMF's FCL cover those needs for foreign financing and the residents' and non-residents' possible capital outflows.

In addition, supplementary indicators to evaluate foreign reserves indicate appropriate levels for the country. The IMF has proposed a metric for an appropriate level of reserves that is intended to cover the main risks to the balance of payments by looking at macroeconomic variables[46] during periods when there is pressure on the exchange market. The IMF methodology proposes hedging a fixed percentage of each variable that is the same for all

45 For more information on the methodology, see the shaded section: New methodology for determining the appropriate level of international reserves in the March 2019 Board of Directors' Report to the Congress of the Republic.

46 The first risk is associated with a loss of access to external financing and is captured by short-term debt. The second is associated with a loss of confidence in the local currency and is captured by a monetary aggregate (M2). The third is associated with a reversal of the capital flows that finance the deficit in the current account and is reflected the portfolio liabilities of the international investment position. Last of all, the volume of exports is incorporated to capture a possible collapse of demand from abroad. FMI (2015). "Assessing Reserve Adequacy: Specific Proposals."

economies with flexible exchange rates. This indicator is used for information purposes because, in the case of Colombia, there is the weakness of trying to estimate outflows during periods of crisis at a time when no crisis is being experienced.[47] An alternative metric[48] adapts the percentages to the characteristics of the Colombian economy itself and includes the remittances to capture the impact of a collapse in demand from abroad. The IMF has suggested that an economy is maintaining a suitable level of reserves if the ratio is within a range of 1.0 to 1.5 or higher. Based on these metrics, Colombia maintains an acceptable level of reserves.

47 The estimate for Colombia takes data from when the floating exchange rate regime began.

48 Gómez and Rojas (2013). "Assessing Reserve Adequacy: The Colombian Case", *Borradores de Economía*, no. 781, *Banco de la República*.

04 / Financial Situation of *Banco de la República*

During the first half of 2020, there was an exceptional conjunction of circumstances that was favorable for the Bank's profits like what was seen in 2019, but these circumstances are unlikely to be repeated simultaneously in the future. Because of that, the Bank's profit amounted to COP 6,934 b in the first half of 2020 because of the return on the foreign reserves that resulted from the appreciation of the investment and the gold portfolio. In addition, the growth in demand for money increased the revenue from monetary regulation operations.

Furthermore, the BDBR adopted exceptional measures to deal with the Covid-19 pandemic that were a determining factor in the growth and breakdown of the assets as of June 2020 in comparison to December 2019 (25.6%).

4.1 Financial Position of *Banco de la República* (balance sheet)[49]

From the beginning of the year to the end of June, the Bank's balance sheet expanded significantly largely as a result of the measures implemented to deal with the effects of the Covid-19 pandemic. At the close of June 2019, the Bank's assets registered a balance of COP 267,621 b which was COP 55,205 b (26.0%) higher than what was seen in December 2019 (Table 4.1). This reflects the actions taken by the BDBR designed to stabilize key markets such as the foreign exchange and public and private debt securities markets.

The rise in assets is primarily explained by the increase in the foreign reserves and in the investment portfolio denominated in national currency (TES and private debt securities). The peso balance of the gross foreign reserves rose COP 38,458 b as a result of the positive variation caused by the exchange rate adjustment that arose from the depreciation of the peso in comparison to the reserve currencies (COP 24,272 b), the purchase of foreign currency from the national government[50] (USD 2 b, equivalent to COP 7,865 b) in May, and the return on the foreign reserves (COP 6,083 b). The increase for the national currency investment portfolio was COP 13,083 b which was mainly caused by the Bank's purchases of private and public debt securities as part of the measures they took to deal with the negative effects of the pandemic.[51] Since March, the Bank has acquired, at the nominal value, a total of COP 8,717 b in bonds and CDs issued by the credit establishments (of which COP 1,030 b had reached maturity as of June) and COP 2,836 b in TES.[52] In addition

49 In this section, the line items are shown by economic rather than by accounting criteria. With respect to the financial statements presented to the Office of the Financial Superintendent of Colombia and the National General Accounting Office, the differences are: first, the value of the liabilities associated with purchase transactions for the international reserves portfolio for which payment has not yet been made is discounted from the assets (this is registered as a higher value of the asset in the Bank's financial statements and as a requirement of the international reserves under liabilities); second, the coins in circulation, which are not part of the accounting information on the Bank's balance sheet, are included in the assets and liabilities in this section, and third, other reclassifications of lower value accounts. Hence, the asset and liability values presented in this report (COP 267,621 b and COP 166,754 b respectively) differ from those registered in the financial statements as of June 30, 2020 (COP 288,924 b and COP 188,057 b respectively).

50 See https://www.banrep.gov.co/en/banco-republica-increases-international-reserves-through-direct-purchase-usd-2000-million-national

51 See section 2.2 in this Report.

52 They had acquired COP 2 b in TES between January and February.

Table 4.1
Banco de la República's Financial Position Classified by Economic Criteria
(billions of pesos)

Accounts	December 2019		June 2020		Change	
	Balance	Percentage share	Balance	Percentage share	Absolute	Percentage
Assets	212,416	100.0	267,621	100.0	55,205	26.0
Gross Foreign Reserves	174,257	82.0	212,715	79.5	38,458	22.1
Contributions to international entities and organizations	9,349	4.4	10,291	3.8	942	10.1
Investments	15,221	7.2	28,304	10.6	13,083	86.0
TES	15,221	7.2	20,540	7.7	5,319	34.9
Private debt securities	0	-	7,764	2.9	7,764	0.0
Resale agreements: transitory liquidity support	8,600	4.0	11,475	4.3	2,875	33.4
Other net assets	4,988	2.3	4,835	1.8	-153	-3.1
Liabilities and equity	212,416	100.0	267,621	100.0	55,205	26.0
Liabilities	135,888	64.0	166,754	62.3	30,866	22.7
Foreign-currency liabilities that affect Foreign Reserves	19	0.0	21	0.0	2	11.7
Monetary Base	112,454	52.9	114,940	42.9	2,486	2.2
Cash	75,101	35.4	81,705	30.5	6,604	8.8
Reserve	37,352	17.6	33,235	12.4	-4,118	-11.0
Interest-bearing deposits not constituting reserve requirements	55	0.0	2,784	1.0	2,729	4.963.1
Other deposits	120	0.1	134	0.1	14	11.8
National Government (National Treasury Office L/C)	12,200	5.7	36,652	13.7	24,452	200.4
Obligations with international organizations	11,041	5.2	12,224	4.6	1,183	10.7
Others	0	-	0	-	0	0.0
Total equity	76,528	36.0	100,867	37.7	24,339	31.8
Capital	13	0.0	13	0.0	0	0.0
Surplus	70,149	33.0	94,436	35.3	24,287	34.6
Special foreign-exchange account settlement	521	0.2	521	0.2	0	0.0
Foreign exchange adjustment	69,315	32.6	93,587	35.0	24,272	35.0
Investment in assets for cultural activities and donations	313	0.1	329	0.1	15	4.9
Other overall results	-343	-0.2	-212	-0.1	130	-38.0
Results	7,149	3.4	6,934	2.6	-215	-3.0
Previous profits and/or losses	0	-	0	-	0	0.0
Fiscal year profits and/or losses	7,149	3.4	6,934	2.6	-215	-3.0
Cumulative results - effect of change in accounting policies	-347	-0.2	-242	-0.1	105	-30.2
Accumulated Results Process of Convergence with IFRS	-92	-0.0	-61	-0.0	31	-33.3

Source: *Banco de la República.*

to the above, the balance of the transitory liquidity transactions (expansion repos) was COP 2,875 b higher than what had been seen in December 2019.

Liabilities increased mainly due to the national government's peso deposits in the Bank. As of June 30, 2020, the liabilities amounted to COP 166,754 b which is COP 30,866 b (22.7%) higher than what was registered at the end of 2019. The national government's peso deposits[53] in the Bank rose COP 24,452 b of which COP 6,998 b correspond to the transfer of the Bank's profits from the 2019 fiscal year and COP 7,865 b to the Bank's purchase of USD 2 b from the government in May. Moreover, with regard to liabilities, interest-bearing deposits not constituting reserve requirements (COP 2,729 b) and the monetary base increased (COP 2,486 b).

In contrast, equity increased primarily because of the currency exchange adjustment account. At the close of June 2020, equity had a balance of COP 100,867 b, which was COP 24,339 b (31.8%) higher with respect to the figure seen in December 2019. This is mainly explained by the rise in the currency exchange adjustment account (COP 24,272 b) that was the counterpart to the increase in the peso balance of the gross foreign reserves mentioned above. The fiscal year result at the end of June 2020 was COP 6,934 b.

4.2 Income Statement (L&P)

4.2.1 Close of June 2020

During the first half of 2020, *Banco de la República*'s profits came to COP 6,934 b as a result of COP 8,194 b in income and COP 1,260 b in expenditures (Table 4.2). With respect to what had been seen during the January-June 2019 period, there were COP 2,236 b (37.5%) in annual increases in income and COP 175 b (16.1%) in expenditures.

The income seen during 2020 is mainly due to the return on the foreign reserves, the return on the securities denominated in national currency held by the Bank (TES and private debt), and the profits from the foreign exchange regulation operations. The return on the foreign reserves amounted to COP 6,083 b[54] and was COP 907 b higher than the result seen in the first half of 2019. The above was the result of the fall in interest rates on U.S. government bonds over the course of the year. This caused the assets that the foreign reserves portfolio is composed of to appreciate and a rise in the international price for gold (Table 4.3 and Graph 4.1). The return on the national currency-denominated securities held by the Bank, in turn, was COP 808 b (COP 573 b in TES and COP 234 b in private debt securities) which was COP 498 b higher with respect to what was earned during the January-June 2019 period. In the case of income from TES, its value was COP 264 b higher in the first half of 2020 compared to the previous year and resulted from a higher average balance of these securities held by the Bank due to the purchases made over the past year. In the case of income from private debt securities, the COP 234 b value was the result of the Bank's purchases of these securities, purchases that occurred for the first time in 2020. The profit from foreign exchange regulation operations amounted to COP 726 b as a result of

53 These deposits are made through the General Office of Public Credit and the National Treasury at *Banco de la República*. Interest-bearing and other deposits such as the cashier account are included.

54 Within this return, note the appreciation caused by COP 4,029 b in price changes of which COP 2,978 b are related to realized yields.

Table 4.2
Banco de la República's Income Statement (January to June)
(billions of pesos)

	Actual as of June		Annual changes	
	2019	2020	Absolute	Percentage
I. Total Income (A+B+C)	5,958	8,194	2,236	37.5
A. Monetary income	5,784	8,040	2,256	39.0
1. Interest and returns	5,769	7,772	2,003	34.7
Foreign Reserves	5,175	6,083	907	17.5
Transactions in other public or private debt securities	0	234	234	n.a.
Monetary Regulation Investment Portfolio (TES)	309	573	264	85.4
Active Monetary Regulation Transactions (repos)	284	156	-128	-45.1
Foreign Exchange Regulation Transactions	0	726	726	n.a.
2. Foreign exchange differences	6	268	262	4,517.0
3. Other monetary income	9	0	-9	-98.9
B. Coins issued	62	44	-18	-28.7
C. Corporate income	112	110	-2	-1.8
II. Total expenditures (A+B+C+D)	1,085	1,260	175	16.1
A. Monetary expenditures	697	840	143	20.5
1. Interest and returns	608	753	144	23.7
National Government's Interest-bearing Deposits	606	449	-158	-26.0
Monetary-contraction operating expenses	2	55	53	2,236.8
Foreign Exchange Regulation Transactions	0	249	249	n.a.
2. Costs of Management and Handling of Funds Abroad	15	22	7	42.4
3. Commitment fee for IMF flexible credit	41	49	7	17.4
4. Foreign exchange differences	31	16	-16	-50.0
5. Other monetary expenditures	0	0	0	17.9
B. Banknotes and coins	78	85	7	9.4
C. Corporate expenditures	310	335	25	8.1
1. Personnel costs	205	215	10	5.1
2. Overhead	56	56	-0	-0.7
3. Other Corporative	49	64	15	30.2
Flexible budget availability	0	0	0	n.a.
D. Pensioners' expenses	0	0	0	n.a.
III. Fiscal year result (I - II)	4,873	6,934	2,061	42.3

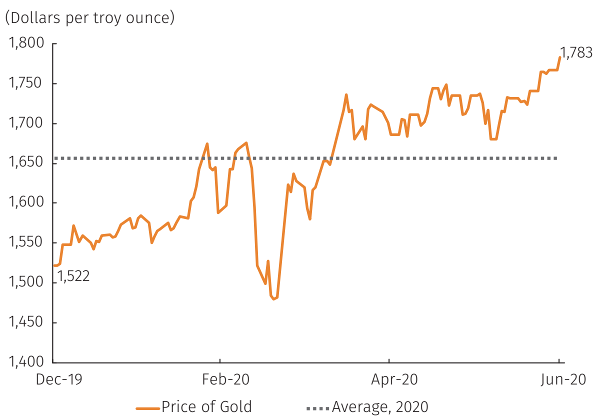
n.a. Not applicable
Source: *Banco de la República*.

Table 4.3
Return on Foreign Reserve Investments
(billions of pesos)

	Actual as of June	
	2019	2020
Returns	5,175	6,083
Investment portfolio	4,867	5,667
Accrual of interest	1,464	1,638
Valuation at market prices	3,403	4,029
Gold	253	360
International entities and organizations	56	55

Source: *Banco de la República.*

Graph 4.1
International Price of Gold



Source: Bloomberg.

exchange rate differentials in some *forward* contracts (NDF) in favor of the Bank (COP 712 b)[55] and *swap* transactions made in March that came due last May (COP 14 b).

The outlays, in turn, are primarily due to the remuneration paid on the national government's deposits. The remuneration for the national government's deposits was COP 449 b during the first half of 2020 and was COP 158 b lower than the value registered during the same period in 2019. This was the result of a lower average balance and a lower rate of remuneration. Regarding the corporate outlays, these amounted to COP 335 b with an annual increase of COP 25 b (8.1% which is equivalent to 4.4% in real terms) of which: 1) personnel costs, COP 215 b, rose 5.1% per annum (1.5% in real terms); 2) the overhead, COP 56 b, registered an annual change of -0.7% (-4.1% in real terms); and 3) other corporate expenses, COP 64 b, presented an annual increase of 30.2% (25.7% in real terms). The reduction in overhead was mainly due to a decrease in expenditures related to the Bank's cultural and informational activities, surveys and special studies, and maintenance, repairs and renovations due to the emergency generated by Covid-19 which has brought about a more limited execution of these items.[56] The growth of the segment "other corporate expenditures" was mainly due to the donation of the Casa Bolivar in the city of Cartagena to the Ministry of Culture, the management of the Savings and Stabilization Fund (Fideicomiso FAE),[57] and to the higher outlays for contributions and affiliations.[58] Moreover, the losses in the valuation of some *forward* contracts (NDF) that presented rate differentials with negative results for the Bank together with the *forward* component for the *swap* transactions carried out last March came to COP 249 b (COP 136 b and COP 113 b respectively).

4.2.2 Outlook for 2020

A profit of COP 7,089 b is estimated for 2020 which is similar to the result registered in 2019[59] (Table 4.4). This is probably the result of income estimated at COP 9,381 b and expenditures of COP 2,292 b.

55 Of this value, COP 711 b corresponds to profits on NDF contracts that had already come due at the June 2020 cut-off date. In particular, the market representative exchange rate (TRM-Tasa Representativa de Mercado) for the settlement of these contracts was lower than the exchange rate agreed upon in them.

56 In the case of cultural endeavors, service has continued to be provided through digital media.

57 The rise in these expenses was due to the fact that in 2020, contracts for the management of four portfolios went into operation while, in the first half of 2019, these contracts were started up gradually. This expense was also affected by the higher value of the exchange rate during the first half of 2020 in comparison to the same period in 2019.

58 Primarily to the Office of the Financial Superintendent of Colombia as a result of the rise in assets other than the international reserves.

59 Profits for 2019 came to COP 7,149 b. The profit value in the approved 2020 budget was COP 1,300 b.

The main components of income are expected to be the return on the foreign reserves, the return on the securities denominated in national currency held by the Bank (TES and private debt), and the profits from the foreign exchange regulation operations. The returns on the foreign reserves are projected to be COP 6,245 b mainly resulting from the valuation of foreign reserves due to changes in prices which, in turn, is a result of the decrease in the interest rates for the bonds that the reserve portfolio is invested in, and the increase in the international price of gold.[60] Interest income from national currency-denominated securities held by the Bank is estimated to be COP 1,472 b (COP 1,141 b in TES and COP 331 b in private debt securities). This is higher than what was seen in 2019 due to the purchases made by the Bank. The profit from the foreign exchange regulation operations is estimated to be COP 759 b most of which, as has been mentioned, corresponds to transactions that came due at the close of June 2020.

The main components of the expenditures are expected to be the interest payments on government deposits and corporate expenses. The interest payments on government deposits are expected to be COP 815 b which is COP 414 b lower than what was seen in 2019 and will be the result of both the lower average balance and the lower interest rate paid. The cost from the placement of coins into circulation is expected to be COP 251 b[61] and the corporate expenditures are likely to be COP 725 b with annual increases of 7.6% and 12.7% respectively. The rise in this last item is mainly the result of "other corporate expenditures" for the same reasons described for the trend in the first half of 2020. In the case of the foreign exchange regulation operations, losses of COP 230 b are estimated mainly as a consequence of the earnings already realized on some NDF contracts that revealed rate differentials with negative results for the Bank and the *forward* component of the *swap* transactions carried out last March which registered a loss of COP 113 b.

60 The forecast assumes that the international price of gold at the close of December 2020 will be the same as the one seen at the end of June this same year.

61 Includes distribution and publicity expenses.

Table 4.4
Forecast for *Banco de la República's* 2020 Income Statement
(billions of pesos)

	Actual 2019	Projection 2020	Annual changes	
			Absolute	Percentage
I. Total Income (A+B+C)	9,447	9,381	-66	-0.7
A. Monetary income	8,975	8,937	-38	-0.4
1. Interest and returns	8,926	8,697	-230	-2.6
Foreign Reserves	7,638	6,245	-1,393	-18.2
Monetary Regulation Investment Portfolio (TES)	756	1,141	385	51.0
Transactions in other public or private debt securities	0	331	331	n. a.
Active Monetary Regulation Operations (repos)	533	221	-312	-58.5
Foreign Exchange Regulation Transactions	0	759	759	n. a.
2. Foreign exchange differences	35	240	205	592.6
3. Other monetary income	14	0	-14	-99.3
B. Coins issued	221	227	6	2.5
C. Corporate income	251	218	-34	-13.4
1. Commissions: Banking services and Fiduciary operations	190	201	11	5.7
2. Other corporate income	62	17	-45	-72.3
II. Total expenditures (A+B+C+D)	2,299	2,292	-6	-0.3
A. Monetary expenditures	1,421	1,306	-115	-8.1
1. Interest and returns	1,235	1,118	-117	-9.4
National Government's Interest-bearing Deposits	1,229	815	-414	-33.7
Liability Transaction Deposits for Monetary Regulation	6	73	68	1196.5
Foreign Exchange Regulation Transactions	0	230	230	n. a.
2. Costs of Management and Handling of Funds Abroad	39	44	5	13.8
3. Commitment fee for IMF flexible credit	88	103	15	16.8
4. Foreign exchange differences	13	20	7	53.8
5. Other monetary expenditures	47	22	-25	-53.5
B. Banknotes and coins	233	251	18	7.6
C. Corporate expenditures	644	725	81	12.7
1. Personnel costs	416	447	30	7.3
2. Overhead	122	145	23	18.6
3. Other Corporative	105	130	25	23.5
4. Flexible budget availability	0	4	4	n. a.
D. Pension payments	1	10	9	918.5
III. Fiscal year result (I - II)	7,149	7,089	-60	-0.8

n.a. Not applicable
Source: *Banco de la República.*

Shaded text 1
Monetary Base and M3

The liquidity preference shock and the measures taken by the BDBR to provide the economy with liquidity were reflected in the performance of the monetary aggregates during the first half of the year and, more specifically, starting in March. At the close of June, the monetary base stood at COP 114,940 b with a 20.4% annual growth (17.8% in real terms) which was well above what had been registered during the first two months of the year.[1] In terms of levels, there was an increase of COP 13,334 b in the monetary base between the end of February, before the beginning of the financial crisis, and the end of June.[2]

From the viewpoint of supply, the measures taken by the Bank to supply the economy with liquidity were the main source of the expansion of the monetary base. Between March and June, the purchases of private and public securities[3] generated a COP 11,504 b increase in this monetary aggregate and the purchases of foreign currency from the government led to COP 7,865 b in greater availability that will have an impact on the monetary base to the degree that the government makes payments. In addition to that, the Bank turned over COP 6,998 b in profits for the 2019 accounting period to the government. These will also be passed on to the public at the time the government makes its payments in pesos. Liquidity transactions, at the end of June, were COP 8,368 b higher than those registered in February. In contrast, the main contraction factor was the increase in the government's deposits in the Bank in COP 13,705 b of which, as has been stated, COP 14,863 b came from the sale of foreign currency to the Bank and the proceeds of the 2019 earnings. Therefore, this did not directly result in a reduced availability of funds in the economy (Graph S1.1).

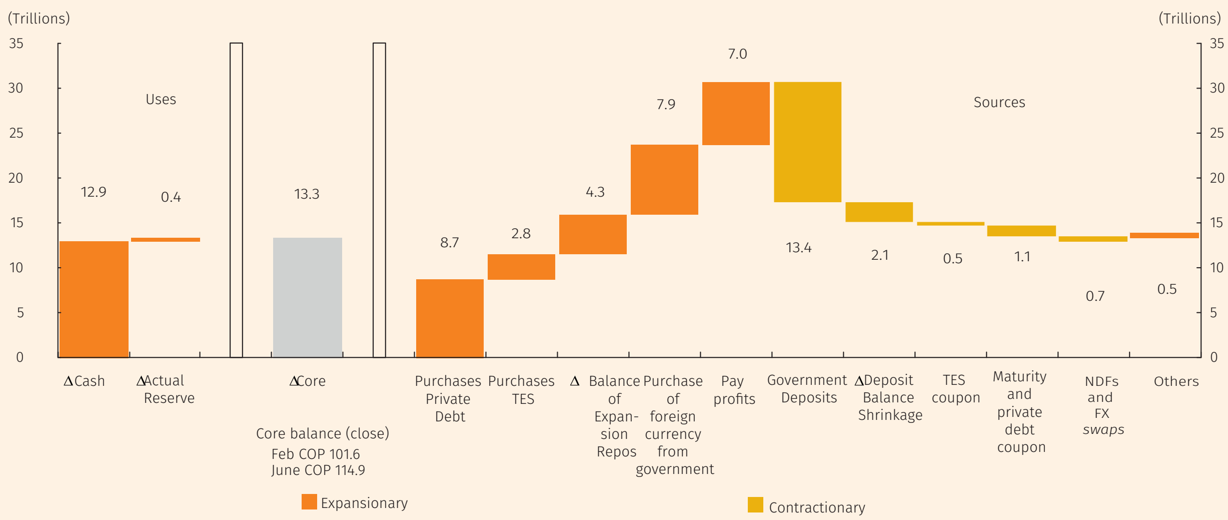
From the demand side, both cash held by the public and the bank reserves surged significantly starting in March. In the case of cash, growth came to 33.4% (30.5% in real terms) at the close of June, which is the maximum for the last twenty years. For the banking reserves, the sudden increase in demand deposits, that have a reserve ratio which is higher than the one for term deposits, initially entailed a considerable increase in the reserves required. Credit establishments also increased their excess reserves (or voluntary reserves) during these times of greater volatility in the

1 At the close of January, annual growth was 13.4% (9.4% in real terms) and 13.7% (9.6% in real terms) at the close of February.

2 With respect to the end of December 2019, the monetary base rose COP 2,486 b (cash rose COP 6,604 b and bank reserves declined COP 4,118 b).

3 Between January and February, the Bank had also purchased COP 2 t in TES.

Graph S1.1
Variation in the Monetary Base by Use and by Source (June 30, 2020 vs. February 29, 2020)

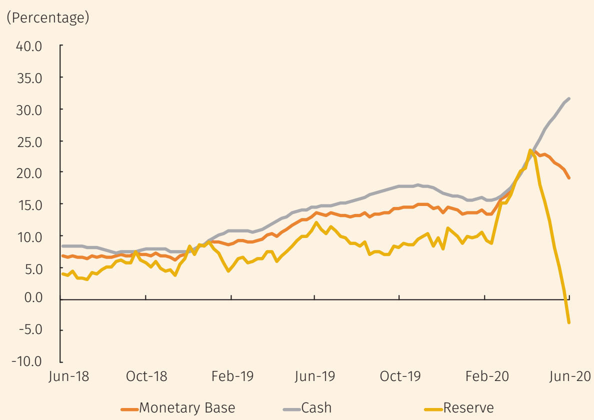


Source: *Banco de la República.*

market. The reduction in the reserve requirement ratios established by the BDBR on April 14,[4] and which has had an effect on liquidity availability since mid-May, offset these effects by generating an almost 30% decrease in the required reserves. Furthermore, the excess has been gradually reduced. As a result of this, the growth of the banking reserve has been dropping notably (Graph S1.2) since mid-May.

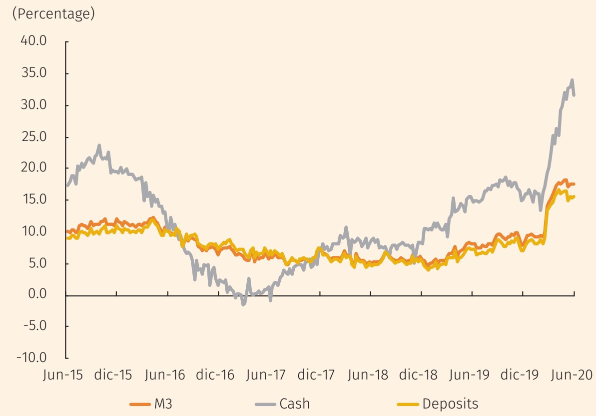
The sharp rise in cash held by the public along with the substantial increase registered for deposits at credit establishments starting in March was reflected in M3. This aggregate surged substantially and, towards the end of June, it showed an annual change of 17.6% (15.1% in real terms) (Graph S1.3).

Graph S1.2
Monetary Base and its Components
(annual percentage change, 8-week moving average)



Source: *Banco de la República*.

Graph S1.3
M3 and its components
(annual percentage change)



Source: *Banco de la República*.

4 See https://www.banrep.gov.co/es/banco-republica-inyecta-liquidez-permanente-economia-mediante-reduccion-del-encaje-y-refuerza-su.

Shaded text 2
Regional Economic Pulse: January to June 2020

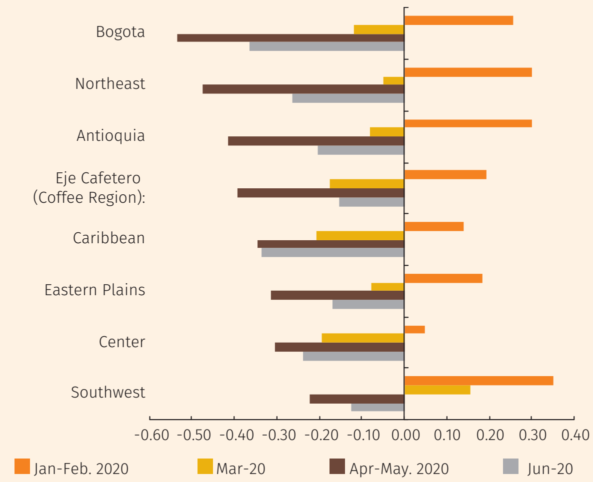
The current analysis of the regional economy for the period from January to June 2020 is made by using the information from the regional economic pulse of *Banco de la República,* developed for eight regions in Colombia into which different departments of the country are grouped.[1] The indicator is built on monthly surveys to businessmen and chief executives regarding their perceptions of the outcomes in their economic operations in an annual comparison basis and the statistical information available. The regional economic pulse also compiles the main explanations of the performance described from the same sources surveyed, which were essential for this analysis in the ongoing circumstances.

The economic activity in all regions monitored in Colombia showed a good beginning of the first two months of the year spurred by domestic demand (Graph S2.1). During January and February, its growth was initially launched by the performance of the trade group. Antioquia, the Southwest, and Bogotá obtained the best sector results, as shown by the growing domestic demand in items such as food, the electronic-digital articles, and vehicles, among the most favored. Likewise, hotel activity exhibited satisfactory results in all of the regions, especially Antioquia which has one of the best historical outlooks due to the recognition of Medellin as a national and international tourist destination. It is important to highlight the expansion of trade in the Northeast region, in spite of the high period of comparison in February 2019 when the Aid Live Venezuela concert was held, which increased consumption and tourist arrivals. In other regions, the better outcome of this sector occurred in an opening environment of new establishments and commercial strategies with discounts and promotions.

In this first 2-month period, the better performance in the regions was also founded on the results from industry and the agribusiness sector, except for the Eastern Plains where the former declined, and in the Central region the latter decreased. In five of the eight regions, the increase in manufacturing production was driven by food and beverages´ industry explained by a rising domestic demand, especially in the Southwest and Northeast. Furthermore, the outstanding pharmaceuticals manufacturing in the Southwest and the penetration in new markets in the Northeast, positioned these two regions as the fastest growing in the industry during the first two months of the year. They were followed by Antioquia with increases in the manufacturing of chemicals, paper, and cardboard; and the *Eje Cafetero* (Coffee Region), in metalworking and manufacturing of transportation equipment and machinery. As for the Eastern Plains, the decline of its industry was related to the shortage of raw materials for biodiesel and vegetable oil production, and lower rice milling sales.

Apart from what happened within industry, the Eastern Plains showed the best results in the agribusiness sector during the first two months of the year, due to the extended crop area in previous months encouraged by good prices as well as the high demand in the livestock industry, a subsector that also stood out in the Northeast and the *Eje Cafetero* (Coffee Region).

Graph S2.1
Regional Economic Pulse (January to June 2020)



Note: pulse levels above zero mean annual growth and levels below zero mean a decline (they do not correspond to percentage changes).
The monitoring of economic activity in the Bogota region began in 2019 and is in the process of being enhanced.
Source: *Banco de la República.*

1 Regions: Antioquia; Southwest (Valle del Cauca, Cauca, Nariño); the Caribbean (Bolívar, Atlántico, Córdoba, Cesar, Magdalena, La Guajira, Sucre, and San Andrés); Northeast (Santander, Norte de Santander, Boyacá); *Eje Cafetero* (Coffee Region, Caldas, Quindío, Risaralda); Center (Tolima, Huila, Caquetá); Eastern Plains (Meta, Casanare); Bogotá (Bogotá, Cundinamarca). The monitoring of economic activity in the Bogotá region began in 2019 and is in the process of being strengthened.

To view the methodological information, see Box 2 in the July 2019 *Report to Congress* which is available at the following link: http://repositorio.banrep.gov.co/bitstream/handle/20.500.12134/9732/informe-congreso-julio-2019.pdf?sequence=8.

Other territories with favorable agribusiness sector dynamics´ were the Southwest and Antioquia. These were leveraged by the external demand for sugar, and for bananas and flowers, respectively. In contrast, the Central region started the year with a decline in the agribusiness sector explained by the lower production of coffee that was affected in its flowering and the quality of the grain with the summer conditions coupled with the early harvest season that took place at the end of 2019 due to good prices at that moment. In other coffee regions, such as the Northeast, Southwest, Antioquia, and *Eje Cafetero* (Coffee Region), coffee production also declined, slowing the growth of the agricultural sub-sector.

In contrast with the above, the favorable performance of the beginning of the year was disrupted in March in all regions reaching annual declines in most of them, as well as a substantial slowdown on growth in the Southwest (Graph S2.1). The overall contraction occurred by a sudden stop in activities in the majority of the economic sectors surged by the arrival of the coronavirus pandemic and the corresponding measures implemented by the government to confine the population in mid-March. In all the regions, the sector with the greatest impact due to its fast and sharp fall was transportation as a consequence of the restrictions imposed on land and air mobility. Thus, the Eastern Plains, Northeast, Center, and the Caribbean which showed a modest result in the sector at the beginning of the year, ended the first quarter with the highest negative effects in transportation.

Likewise, in the majority of the territories, the pandemic affected the commercialization of vehicles and hotel business operations both of which had negative results in March. Domestic trade also fell in three of the eight regions – the Caribbean, *Eje Cafetero* (Coffee Region), and the Eastern Plains – in spite of greater sales of food mostly consumed, pharmaceuticals, cleaning products, and biosecurity articles for households´ provisions at the beginning of the quarantine. In the rest of the regions, the better performance in these goods allowed them to register annual growth although at a lower pace.

Two of the industrial regions, in turn, the Southwest and the Caribbean, as well as the Eastern Plains, reported positive results for manufacturing production in March. In the remaining regions, the negative effect in total or partial plant shutdowns were stronger than the increase in the production of commodities. In particular, what drove manufacturing dynamics in the Southwest was a growing demand for food and beverages, personal and household cleaning products, pharmaceuticals, and agricultural supplies. In the Caribbean, the manufacturing of chemicals stood out, and for the Eastern Plains was in the rice milling.

On the other hand, mobility difficulties for the population and cargo transportation due to the pandemic emergency had a negative effect on the agribusiness sector during that month for six of the eight regions except for the Southwest and Northeast. The agricultural component was essentially influenced by labor shortages and unfavorable weather conditions in some cases. In particular, in Antioquia and the region of Bogotá, the greatest repercussions were on flower crops resulting from the cancellation of orders caused by the closing of borders. At the same time, in the Central and Eastern Plains regions, the biggest negative impact was on the livestock sector.

During the period April-May 2020, in all territories of the country, the annual declines became much deeper from the ones observed in March, as they showed the largest contractions so far this year and without historical precedents (Graph S2.1). In all the regions the transportation sector reinforced its decline with the reduction of passenger mobility, other than for humanitarian purposes, and minor commercial and industrial operations. Likewise, in different territories trade shutdown´s intensified its deterioration surged since March, with the highest impact in the regions of the Caribbean, *Eje Cafetero* (Coffee Region), and the Eastern Plains. At the same time, hotel occupancy and the commercialization of vehicles remained at critical levels in various areas around the country. Sales on foods and cleaning items slowed down due to households´ supplies ahead of time while the remaining categories continued to decline despite the efforts by retailers to use digital means and delivery services, among others.

The manufacturing industry in regions such as Bogotá, Antioquia, the Northeast, and the *Eje Cafetero* showed the highest annual decline during the 2-month period from April-May. In general, a lower demand characterized the diminishing of manufacturing production in all the territories around the country in addition to excess inventories, especially in Bogotá and the Southwest. Plant shutdowns were the main cause for the drop in factory production in Antioquia, the Northeast and the *Eje Cafetero*. In spite of that, the decline in Antioquia was slightly offset by some garment and textile manufacturing companies that redirected its production to elaborate face masks and medical uniforms, as well as in the chemicals industry for producing biosafety items. This last group continued to spur industry in the Caribbean.

In the face of this scenario, in June the sharp decline in economic activity was brought to a halt in all the regions around the country. The gradual reopening of various sectors since the end of May and the new economic policy measures taken contributed to this outcome. The manufacturing industry continued in negative outcomes explained by low levels of demand; however, its decline was less accentuated with the gradual normalization in activities. The exception was for the Caribbean and the Center that deepened its decline affected basically in chemicals industry in the former and in foods in the latter. In transport, despite the ongoing restrictions on mobility but favored by the reactivation of some economic sectors, slowed down its reduction in all the country's territories, supported by the trend in land transportation mode, mainly cargo, which showed some recovery, particularly in the *Eje Cafetero* and the Eastern Plains.

With respect to trade, the regions, except for Bogotá, continued to show negative results in June. Limitations on people's mobility and weak demand, maybe related to the increasing unemployment, did not allow major changes in this sector. Nevertheless, the decrease in the new vehicles´ sales segment was lower and the growth on sales in households´ appliances and technology products benefited from the day without VAT. In the agribusiness sector, where results have improved, the agricultural activity was highlighted in Antioquia, the Southwest, and the Center, which remained in a positive territory due to the favorable supply benefited from the adequate weather conditions. In contrast, in regions like the Caribbean and *Eje Cafetero*, the sector was negatively affected by the livestock segment although its decline was curtailed just as it was in most regions.

Shaded text 3
Colombia's Foreign Balance in the First Quarter of 2020

During the first quarter of 2020 the country's balance of payments current account registered a deficit of USD 2.712 billion (b) which is USD 817 m lower than what was registered the year before (Table S3.1). As a share of the quarterly GDP, the deficit was estimated to be 3.7% which is 0.8 percentage points (pp) lower in comparison to the estimate for the previous year. The smaller current account deficit is in line with the weakening of domestic demand, lower export prices, and our trading partners' economic crisis. First of all, the slowdown in household spending and the decrease in gross fixed capital formation, which showed annual changes of 3.8% and -6.7% respectively, are reflected in the decline of imports of goods and services and the worsening of sales for companies with foreign direct investment (FDI). The lower prices and production of crude oil, in turn, largely explain a drop in exports of goods that was more than proportional to the drop in imports. Added to the slowdown in our main trading partners, these factors would have been reflected in the deterioration of the trade balance of goods which rose USD 103 m with respect to the previous year and, to a lesser degree, in the trade balance of services which rose USD 55 m. In contrast, net expenditures for the factor income segment decreased (USD 667 m), and net income from current transfers rose USD 308 m.

Note that although the change in Colombia's current account balance of payments shows a close relationship to the performance of the trade balance in goods due to the high share of exports and imports in the country's total current income and expenditure,[1] the relevance acquired by factor income reached such an extent that it became the main source of the country's current account deficit in the first three months of this year.

The counterpart to the country's lower current deficit was the lower need for financing since, between January and March 2020, the financial account registered net capital inflows of USD 2.378 b (3.3% of the quarterly GDP) that were lower than what had been seen a year ago when they totaled USD 3.306 b (4.2% of the quarterly GDP) (Table S3.1). In spite of the above-mentioned domestic and foreign shocks, FDI continued to be the main source of foreign financing (USD 3.589 b; 5.0% of the quarterly GDP), especially those funds oriented towards companies whose operations are concentrated on providing utilities to the domestic market. However, note that capital inflows into the majority of economic activities, especially the mining-energy sector, declined. In addition, the rest of the sources of financing showed a mixed performance given that external indebtedness accounted for net disbursements of USD 1.229 b in contrast with the net liquidations of portfolio investment (USD 453 m).

The deficit in the balance of trade in goods during the first quarter totaled USD 2.076 b with an increase of USD 103 m (5.2%) compared to the year before. This result is due to the USD 9.334 b in exports with an annual decline of 9.2% (USD 946 m) and USD 11.410 b in imports with an annual decrease of 6.9% (USD 843 m). The decline in exports arose mainly from the lower sales of petroleum and its derivatives (USD 904 m) and of industrial products (USD 112 m). In contrast, the sales abroad of non-monetary gold (USD 96 m), coal (USD 79 m), and bananas (USD 45 m) rose. The lower value of exported crude oil originates from the combined effect of the reduction in its export price (24.7%) and the lower volume exported (0.7%). On the other hand, the increase in external sales of coal and bananas is explained by the increase in their quantities sold (55.4% and 22.3%, respectively) and is partially offset by the reduction in their sales prices (32.3% and 2.1% respectively). As for exports of non-monetary gold, their increase occurred due to the rise in their export price (21.3%) and in their export volume (4.8%).

The imported value of merchandise between January and March 2020 totaled USD 11.410 b with an annual decrease of 6.9% (USD 843 m). This decline was widespread and was mainly due to the reduction in imports of supplies and capital goods for industry (USD 334 m, 5.4%), transportation equipment (USD 275 m, 25.6%), and of purchases abroad of fuel and lubricants (USD 173 m, 17.7%). Regarding the country's terms of trade, these declined 13.1% during the first quarter of 2020 with respect to the same period in 2019 and 12.8% in comparison to the immediately preceding quarter. This was because of the decline in export prices (16.1% per annum and 13.0% per quarter) which was not totally offset by the decrease that occurred in import prices (3.4% per annum and 0.2% per quarter).

In line with the trend for the balance of goods, the deficit in the service account experienced a USD 55 m

1 The analysis of the structure and the change in the current account income over the last 15 years shows that foreign sales of merchandise are its main component and hold a share that ranges between 70% and 81% of the total income. Regarding the current expenditures, their most important component is imported goods which represented, on average, 64% of the total outlays (61.9% during the first quarter of 2020).

Table S3.1
Colombia's Balance of Payments

Current Account (millions of dollars)	2019 (pr) (Jan-Mar)	2020 (pr) (Jan-Mar)	Change Dollars
Current Account (A + B + C)	-3,529	-2,712	817
Percentage of the GDP	-4.5%	-3.7%	
A. Goods and Services	-2,728	-2,886	-157
1. Goods	-1,973	-2,076	-103
Exports FOB	10,279	9,334	-946
Imports FOB	12,253	11,410	-843
2. Services	-755	-810	-55
Exports	2,543	2,353	-190
Imports	3,298	3,163	-135
B. Factor Income	-2,599	-1,932	667
Income	1,844	1,053	-791
Outlays	4,443	2,985	-1,458
C. Current Transfers	1,798	2,106	308
Income	2,026	2,331	305
Outlays	228	225	-2
Financial Account annual flows (millions of dollars)	**2019 (pr) (Jan-Mar)**	**2019 (pr) (Jan-Mar)**	**2019 (pr) (Jan-Mar)**
Financial account with change in Foreign Reserves (A + B + C + D)	-3,306	-2,378	927
Percentage of the GDP	-4.2%	-3.3%	
A. Direct Investment (ii - i)	-2,602	-2,321	281
i. Foreign in Colombia (FDI)	3,385	3,589	
Percentage of the GDP (FDI)	4.3%	5.0%	
ii. Colombian Abroad	783	1,268	
B. Portfolio Investment (1+2)	-1,307	-521	786
1. Public Sector (ii - i)	-263	-588	
i. Foreign Portfolio Investment (a + b)	793	-289	
a. International markets (bonds)	500	532	
b. Local Markets (TES)	293	-822	
ii. Portfolio Investment Abroad	530	-878	
2. Private Sector (ii - i)	-1,044	67	
i. Foreign Portfolio Investment (a + b)	-126	-163	
a. International markets (bonds)	0	0	
b. Local Markets	-126	-163	
ii. Portfolio Investment Abroad	-1,170	-96	
C. Other Capital Flows public sector + private sector	-1,748	634	2,382
D. Reserve Assets	2,351	-171	-2,522
Errors and Omissions (E and O)	223	333	110
Memo item:			
Financial account excluding change in Foreign Reserves	-5,657	-2,207	3,449
Change in International Reserve	2,351	-171	

(pr): preliminary
Source: *Banco de la República*.

rise between January and March 2020 (Table S3.1) due to the greater decrease in exports compared to the imported services. Note that, during the period under analysis, the export and import of trips and passenger air transportation were affected by the worldwide closure of airports and the contingency measures applied due to the pandemic that led to a lower flow of travelers carried by airlines. With respect to exports, this effect was primarily offset by the higher income received from business services, especially those related to call center operations. Regarding imports, the lower freight costs associated with the smaller quantities imported and technical and business services also stand out.

Unlike the trade balance, the reduced factor income deficit added to the higher income from workers' remittances more than compensated for the aforementioned deterioration. During the period under analysis, in turn, the decrease in net outflows due to factor income (USD 667 m) resulted mainly from the decline in the profits obtained by companies with FDI (USD 1.153 b). This decline was widespread throughout all of the economic sectors with the decrease in estimated profits for companies operating in mining and quarrying (USD 308 m), oil drilling (USD 277 m), transportation and communication (USD 199 m), manufacturing industry (USD 183 m), and financial and business services (USD 110 m) standing out. With regard to current transfers, USD 2.106 b in net income was received during the first quarter of this year, an amount that was 17.1% (USD 308 m) more than what was received a year earlier and was mostly the result of the amount and increase in worker's remittances which came to USD 1.729 b during the period under analysis with an annual rise of 14.4% (USD 218 m). The main increases in remittance income were seen in those sent from the United States, Spain, and Chile while remittances from Argentina, Mexico, Brazil, and Panama in turn, decreased.[2]

As for the result of the financial account (Table S3.1), net capital inflows of USD 2.378 b were registered between January and March 2020 that were USD 927 m lower than what was seen a year earlier. These net inflows were due to foreign capital income (USD 4.365 b), outflows of Colombian capital abroad (USD 2.013 b), payments of residents to non-residents due to financial derivatives (USD 145 m), and a decrease in the foreign reserves as a result of balance of payment transactions (USD 171 m).[3] The errors and omissions were estimated at USD 333 m. These foreign funds received by the country came from FDI (USD 3.589 b), the net disbursement of loans and other credit from abroad (USD 1.229 b), and the net disbursements from long-term debt securities placed on the international market (USD 532 m). This inflow was partially offset by net sales of TES in the local market by non-residents (USD 822 m) and the settlements of variable income securities in the local market by non-residents (USD 163 m).

Thus, in the first quarter of 2020, USD 3.589 b was received through FDI (5.0% of the quarterly GDP), an amount that is USD 204 m (6.0%) higher than what had been received the year before. The distribution of the FDI received during this period by economic activity was as follows: mining and petroleum (30.7%), electricity (18.6%), financial and business services (13.8%), manufacturing industry (9.2%), retail trade and hotels (8.0%), transportation and communication (4.0%), and the remaining sectors (15.8%). The flow of Colombian direct investment abroad, in turn, was estimated at USD 1.268 b, and the majority of this was made by firms in the mining-energy and electrical sectors. Between January and March 2020, the liquidation of foreign portfolio investment, in turn, totaled USD 453 m (0.6% of the quarterly GDP). This was the result of the net sales of fixed income (USD 822 m) and variable income (USD 163 m) securities on the local market by non-residents and partly offset by the net income from long-term debt securities placed on international markets (USD 532 m). The outflows of Colombian capital for this totaled USD 973 m in net liquidations and corresponded to portfolio investments that were liquidated by both the public sector (USD 878 m) and the private sector (USD 96 m). Finally, due to other capital flows, the country received USD 1.229 b in net disbursements through mainly short-term loans and other credit. The private sector received USD 646 m in net disbursements, loans contracted especially by companies working in the private banking sector that used these funds for the purchase of assets abroad and as working capital. The public sector, in turn, received USD 587 m in net loan disbursements, mainly on long-term loans.

2 In the first quarter of 2020, remittances from Chile amounted to USD 110 m with an annual growth of 12% which contributed 5.0% of the total growth. The United States and Spain contributed 71% and 12% of the total growth respectively.

3 Note that this accumulation of reserves is the result of the net purchases of USD 2.478 b in foreign currencies, USD 938 m in income from the net yields on international reserves, and USD 84 m in net outflows for other *Banco de la República* transactions.

Shaded text 4
Recent Trend in Demand for Cash

In accordance with the provisions of the Constitution and Act 31/1992, *Banco de la República* has the exclusive state function of issuing Colombian legal currency. In the exercise of this function, the Bank seeks to ensure the provision of banknotes and coins with the quality, opportunity, and in the denominations required by the economy for its transactions.

1. Channels for supplying cash

The Bank provides cash through the three following distribution channels:

i. Commercial banks, through withdrawals against their deposit account (CUD) at *Banco de la República* or through exchange operations.[1] Requests from banks represent, on average, 92.7% of the total annual cash provided by the monetary authority.
ii. *Banco de la República*'s public service windows in Bogotá and in the branches that have a treasury office[2] through which they supply low-denomination banknotes (COP 2,000 and COP 5,000) and coins through exchange operations for retailers, tollbooth companies, and transportation companies, etc. These operations represent, on average, 2.8% of the total annual cash provided by the Bank.
iii. The Complementary Cash Centers (CCE in Spanish) that operate in fifteen cities, some of which have no Bank branch.[3] Commercial banks, retailers, and other economic sectors are supplied with cash (mainly low-denomination banknotes and coins) through exchange operations by means of this channel. The requests for cash handled through this channel represent, on average, 4.5% of the cash supplied by *Banco de la República* yearly.

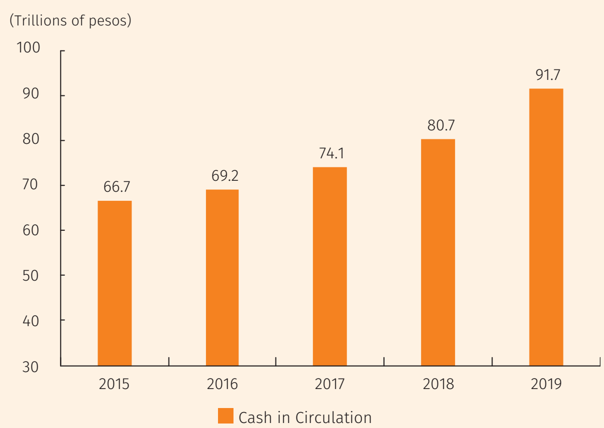
2. Change in Cash in Circulation

The cash in circulation is the net result between the cash *Banco de la República* provides for economic agents through the previously described channels and the cash it receives, whether by means of deposits financial entities make in their deposit accounts at *Banco de la República* or through exchange operations. Therefore, the cash in circulation is a balance that changes daily and corresponds to banknotes and coins that are held by financial entities, the real sector, and the public.

Graph S4.1 shows the change in the balance of cash in circulation at the end of the year. In 2019, the value of the cash in circulation closed at COP 91.7 trillion (97% banknotes and 3.0% coins) with an annual nominal growth rate of 13.6% in comparison to 2018.

The performance of cash in circulation has seasonal adjustments i.e., every year some months are characterized by a high demand for cash. The trend for the monthly value of cash in circulation for 2018 and 2019 can be seen in Graph S4.2. Here it is evident that the circulation rises in the last quarter of the year due to the end-of-the-year seasonal period and during the months in the middle of the year because of the vacation period and payment of mid-year bonuses. The first months of the

Graph S4.1
Nominal Value of Cash in Circulation at the End of the Year



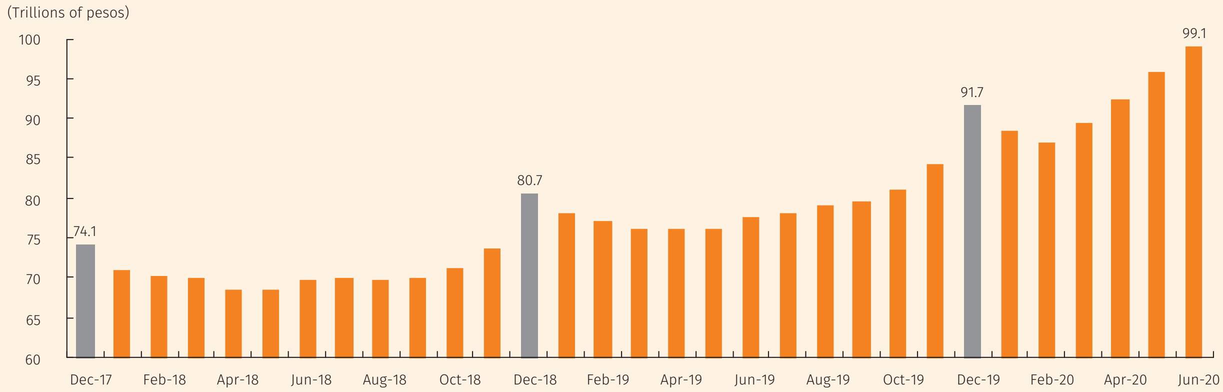
Source: *Banco de la República.*

1 The exchange operations consist of receiving deteriorated banknotes in exchange for new banknotes or banknotes suitable for circulation in order to ensure the quality of the cash in circulation. These operations may also consist of receiving banknotes to be exchanged for coins.

2 The *Banco de la República*'s facilities with public service windows are located in Bogotá and in thirteen branches (Armenia, Barranquilla, Bucaramanga, Cali, Cucuta, Ibague, Leticia, Medellin, Monteria, Pasto, Quibdó, Riohacha, and Villavicencio).

3 The CCE are the Bank's cash funds managed by Cash in Transit (CIT) companies. There are currently 32 CCE operating in fifteen cities nine of which are where *Banco de la República* does not provide treasury service (Cartagena, Florencia, Manizales, Neiva, Pereira, Popayan, Santa Marta, Sincelejo and Valledupar) and six where *Banco de la República* does provide this service (Barranquilla, Bogotá, Bucaramanga, Cali, Medellin, and Monteria.).

Graph S4.2
Nominal Value of Cash in Circulation at the End of the Month (banknotes and coins)



Source: *Banco de la República*.

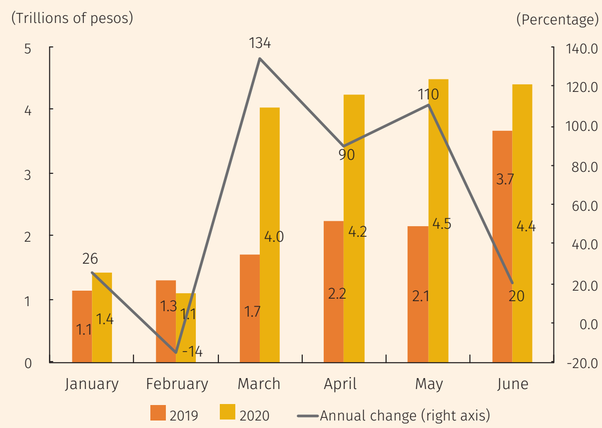
year, in turn, are characterized by a decline in demand and the larger deposits made by commercial banks in their accounts at *Banco de la República*.

However, Graph S4.2 also shows that cash in circulation has followed a different trend in 2020 compared to previous years. Since March, there has been a significant and sustained increase in the demand for cash such that the balance in circulation at the end of June was COP 99.1 trillion. This figure represents a rise of 8.1% compared to the value seen at the end of 2019 (COP 91.7 t) and a 27.5% rise with respect to the end of June 2019 (COP 77.7 t).

In the first half of 2020, the Bank supplied the economy with COP 19.7 trillion in banknotes, a figure that represents a 62% change with respect to what was seen during the same period last year (COP 12.2 trillion). The largest increases in the demand for cash were registered in the months of March, April, and May 2020 due to the situation associated with the Covid-19 health emergency (Graph S4.3).

Some of the measures designed by the national government to protect the vulnerable population during the economic, social, and ecological emergency have entailed monetary transfers[4] that have been channeled through financial entities. To address these

Graph S4.3
Supply of Banknotes by *Banco de la República* (January to June monthly comparison)



Source: *Banco de la República*.

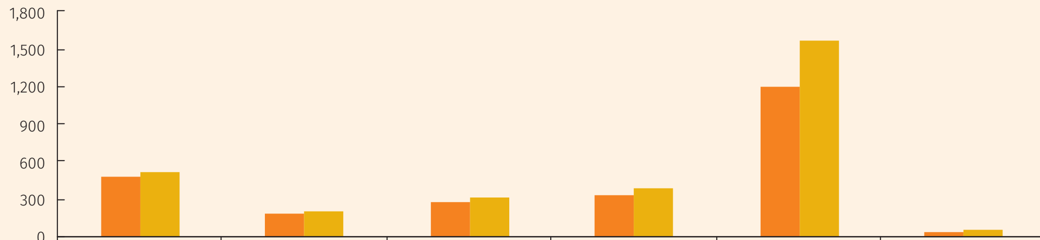
additional requirements, commercial banks have increased cash withdrawals from their deposit accounts at *Banco de la República*.

The demand for cash has been concentrated mainly in high-denomination banknotes ($20,000 and $50,000) since these are the ones that are most commonly supplied through the commercial bank ATMs. Graph S4.4 compares the composition in the number of banknotes in circulation by denomination at the end of June 2019 and 2020 and their respective proportions. The increase in the number of COP 50 thousand

4 Source: Presentation "Economic Plan to Address the Economic, Social, and Ecological Emergency" (*Plan Económico para la atención de la Emergencia Económica, Social y Ecológica*), Ministry of the Treasury and Public Credit. (June 2020) which explains the measures, etc. adopted by the government to mitigate the impact of the Covid-19 emergency on the most vulnerable population, including: 1) additional and extraordinary transfers from the state programs: *Familias en Accion* (Families in Action), *Colombia Mayor, Jóvenes en Acción* (Youth in Action), and VAT refund; 2) the Solidarity Income program, and 3) economic transfer: protection mechanism for the laid off workers. Available at: https://www.minhacienda.gov.co/webcenter/ShowProperty?nodeId=%2FConexionContent%2FWCC_CLUSTER-134564%2F%2FidcPrimaryFile&revision=latestreleased

Graph S4.4
Banknotes in Circulation by Denomination
(close of June)

(Millions of banknotes and share)



	COP 2,000	COP 5,000	COP 10,000	COP 20,000	COP 50,000	COP 100,000
jun-19	477.1	189.1	284.7	339.5	1.201.0	35.1
jun-20	510.2	208.4	311.7	383.0	1.563.8	52.8
Share. June-19	18.9	7.5	11.3	13.4	47.5	1.4
Share. June-20	16.8	6.9	10.3	12.6	51.6	1,7

Source: *Banco de la República*.

banknotes was notable as its percentage share went from 47.5% to 51.6%.

To deal with the increased demand for cash, *Banco de la República* has kept its industrial plants operating to produce banknotes and coins, organized a plan of work shifts, and strictly complied with the biosecurity measures established by the national government. The Bank has, likewise, continued to provide its services by supplying, receiving, and classifying cash for financial entities as well as exchange operations for retailers and the public, in general, in Bogotá, the thirteen branches, and the thirty-two CCEs.

Shaded text 5
Participation of *Banco de la República* in the Bank for International Settlements

Act 1484/December 12, 2011 authorized *Banco de la República* to participate as a shareholder of the Bank for International Settlements (BIS).[1] Based on the authorization conferred on it, the Bank acquired 3,000 shares of the BIS for a price of 65,712,000 in special drawing rights (SDR), which is equivalent to USD 100,978,710 that are registered on the books at their acquisition cost in SDR under "contributions to international organizations and entities.»

The effects of the Covid-19 pandemic and the resulting substantial losses in the financial markets were reflected in low net profits for the organization. This resulted in the BIS Board of Governors decision of not paying dividends on June 30, 2020 to any of its members for the 2019-2020 period. Instead, and pending of an improvement of the financial conditions, a supplementary dividend will probably be paid for the 2020-2021 period and thus offset the non-payment of this year's dividends. Thus, all profits for the 2019-2020 period will go to the General Reserve Fund and the BIS Free Reserve Fund.

The membership of *Banco de la República* in the BIS has allowed the directors of the Bank to participate in periodic meetings in which the outlook for the global economy and the financial markets are examined. These meetings correspond to a valuable discussion forum where points of view and experiences with issues of particular relevance to central banks are exchanged, contributing to better understanding of the challenges that affect countries and to implementing appropriate policy measures. In the current situation associated with the Covid-19 pandemic, having the possibility of discussing with other central banks and the BIS technical team has been very useful when it comes to learning from international experience in the design and use of policy as well as from the analysis of the international environment.

Since 2019, *Banco de la República* has been part of the Central Bank Governance Group (CBGG) of the BIS. The objective of this group is to share experiences regarding the design, operation, and management of central banks and to encourage the best practices in these institutions. Recently, the CBGG has addressed various issues related to central bank independence, personnel management strategies and research, strategic planning, the operation of their codes of conduct, and ways to avoid group think in decision making. Starting in 2018, the Bank participates in the Meeting of Small and Open Economies. The most recent discussions included issues such as economic policy responses to the Covid-19 crisis and recent changes in global capital flows and their possible implications.

During 2020, discussions at the meetings of governors of BIS member countries have focused on a number of issues such as the effects of the Covid-19 pandemic on the world economy and the way countries have responded in their economic policy, the transmission of monetary policy, challenges to global financial stability, etc. Since April, the BIS has also begun to publish the *BIS Bulletins* series,[2] in which brief analytical documents on the effects of coronavirus and the recent developments in the markets and economy in general are presented, and the *FSI Briefs* series,[3] where a set of brief notes on regulatory and supervisory issues associated with the responses of financial sector authorities to the pandemic crisis are published.

The BIS is organized into various consultative groups that do research and analysis in areas such as financial stability and banking operations. The Bank participates in these groups through the Consulting Council for the Americas (CCA), which consists of the governors of the central banks of America that are members of the BIS.[4] These forums foster international cooperation and research on issues related to central bank policies and other topics that impinge on macroeconomic and financial stability. Likewise, the Bank is a member of the Consulting Group of Directors of Operations (CGDO), a network of representatives of the central banks who are responsible for central bank operations and the Consulting Group of Directors for Financial Stability (CGDFS). In February 2020 this Group published the report, *Stress Testing*

1 This international institution was created in 1930 and currently includes 62 central banks. Its mission is to serve central banks in their quest for monetary and financial stability by fostering international cooperation in these areas as well as to serve as a bank for member central banks. Its headquarters are located in Basel, Switzerland, and it has two representative offices: one in Hong Kong and another in Mexico City.

2 The series is available at: https://www.bis.org/bisbulletins/index.htm?m=5%7C439

3 The series is available at: https://www.bis.org/fsi/fsipapers.htm?m=5%7C440

4 Argentina, Brazil, Canada, Chile, Colombia, the United States, Mexico, and Peru.

in Latin America: a Comparison of Approaches and Methodologies,[5] on a technical cooperation project that was spearheaded by *Banco de la República*.

Within the framework of the work coordinated by the CCA of the BIS, the Bank actively participates in research projects and conferences on various areas relevant to central banks. Among them, the Scientific Committee (which includes the chief economists of the respective central banks) organized a meeting regarding frameworks for monetary policy and communication in February of this year. At the CCA's Annual Research Conference that will deal with monetary policy transmission and various tools, the Bank will present a paper on the effectiveness of exchange rate intervention.[6] Likewise, in April 2020, some selected papers from a BIS network on the assessment of macroprudential policies using micro-level data were published in a special edition of the *Journal of Financial Intermediation*.[7] This special issue includes a paper that evaluates the effects of macroprudential policies used in Colombia between 2006 and 2009.[8]

Within the framework of the BIS Innovation Hub, which was created by the BIS to encourage international collaboration on financial technology issues within central banks, the Consulting Group on Innovation and the Digital Economy (CGIDE), which is composed of representatives of the region's central banks, was created. The first projects will focus mainly on improving the system for low-value payments and cross-border payments as well as the expansion of financial inclusion through smart phone technology.

Given the Covid-19 pandemic, the activities of the BIS have been adjusted and the Bank's involvement has been concentrated in various virtual meetings. The Bank have participated in: 1) the annual meeting of the deputy governors of central banks of emerging countries that are members of the BIS, which was focused on the financial market developments, monetary policy, and financial stability in emerging economies. For this meeting, the Bank prepared a paper on the effects of foreign participation in the local Colombian public debt market[9]; 2) the CCA governors' conference on the financial and economic impacts of the coronavirus, and; 3) webinars held by the BIS on lessons learned from the response to the Covid-19 economic emergency, models on asset price spirals, and expansion of aggregate demand under the impact of the coronavirus shock. In addition, the Bank is working with the BIS to develop a repository of measures implemented by central banks during the health crisis.

Last of all, in May 2020, the BIS announced the opening of the new bank trading room at its Representative Office for the Americas located in Mexico City. This new room complements the existing BIS trading rooms in Basel and Hong Kong and will enable the organization to undertake international reserve operations for the region's central banks.

5 The document is available at: https://www.bis.org/publ/bppdf/bispap108.pdf

6 The paper is titled, "Effectiveness of FX Intervention and the Flimsiness of Exchange Rate Expectations," and is available at: https://www.banrep.gov.co/en/borrador-1070

7 The special issue is entitled, *Macroprudential Policies in the Americas, Journal of Financial Intermediation,* vol. 42, April 2020. It is available at: https://www.sciencedirect.com/journal/journal-of-financial-intermediation/vol/42/suppl/C

8 The paper is entitled, "Evaluating the Impact of Macroprudential Policies on Credit Growth in Colombia" and is available at: https://www.sciencedirect.com/science/article/pii/S1042957319300592

9 The Bank's contribution to this conference is entitled, "Effects of Foreign Participation in the Colombian Local Public Debt Market on Domestic Financial Conditions," and will soon be published as a BIS paper. The preliminary version is available at: https://repositorio.banrep.gov.co/handle/20.500.12134/9844

Appendix
Management Policy for the International Reserve Investment Portfolio

According to good practice recommendations, the management of foreign reserves should be based on liquidity, risk management, and profitability criteria. In that respect, an attempt must be made to: 1) have enough liquidity in foreign currency, 2) have strict policies regarding the management of the different risks that the transactions face, and 3) generate reasonable, risk-adjusted returns subject to liquidity and other risk restrictions.[1] How these rules are applied in the management of Colombia's foreign reserves is explained below.

1. Risk Management Policy

Banco de la República has a framework for risk management that identifies and assesses the risks to which their transactions are exposed in order to keep them low. Some of the main policies for risk management are as follows:

Liquidity Risk: The Investment Portfolio is divided into tranches and invested in financial assets that are permanently in demand on the secondary markets and is divided into tranches. This is done in order to have the ability to convert reserve assets into cash rapidly and at a low cost, and so that some of the defined tranches can be liquidated faster.

Market Risk: investment is made into a limited group of eligible assets with strict investment limits on the effective duration, spread duration, foreign exchange and sector breakdowns. The goal is for the value of the portfolio to be moderately sensitive to interest rate movements in the market.

Credit risk: investments are only made in assets with high credit ratings given that these investments have a low probability of defaulting on their payments. The minimum credit rating for governments and entities related to governments is A-. With respect to private issuers, the minimum rating is A+ for exposure to individual issuers, and BBB- (investment grade) when the investment is done through funds. Historically, the percentage of issuers with these ratings that have defaulted on their payments within a one-year period is close to 0%. If the rating of an issuer that the portfolio has invested in directly drops below the minimum allowed, the exposure is liquidated within a short period of time. Moreover, the maximum exposures are limited by sector and issuer in order to limit the impact of credit events on the value of the portfolio.

Exchange risk: the impact of the foreign exchange risk is mitigated by the "foreign exchange adjustment" equity account that is dealt with under Decree 2520/1993, article 62, number 4 (Bylaws of *Banco de la República*). This account rises when reserve currencies become stronger with respect to the Colombian peso and declines when they weaken. Therefore, the variations in the currencies do not have any impact on the consolidated profit or loss statement. *Banco de la República*, like most central banks around the world, has currencies other than the US dollar in the international reserve portfolios. This is in order to cover the country's payments abroad, which are made in many currencies. It is important to keep in mind the fact that the prices of the currencies are highly volatile and do not often have defined long-term trends. This makes it very difficult to reliably predict their behavior.

Counterparty risk: to mitigate the counterparty risk, transactions are settled through payment on delivery mechanisms. Counterparties in fixed income trading are required to be market makers, and the counterparties in currency trading are required to have high credit ratings. The purpose for payment on delivery mechanisms is to make the simultaneous exchange of securities for cash or the simultaneous exchange of payments in a foreign currency exchange transaction in order to eliminate the possibility of a default by one of the parties to the trade. The foreign currency exchange counterparties must have a minimum credit rating of A- if they have an ISDA framework contract.[2] If they do not have said contract, the minimum rating is A+.

1 One example of good practice in this respect can be found in the document "Guidelines for the Management of International Reserves," produced by the International Monetary Fund, which can be consulted at this link http://www.imf.org/external/np/sec/pr/2013/pr13138.htm

2 The purpose of the framework contract established by the International Swaps and Derivatives Association (ISDA) is to establish the terms and conditions that govern over-the-counter derivatives traded between entities.

2. Tranche of the Investment Portfolio

The investment portfolio is made up of three tranches: the short term, the medium term and the gold tranche.

The purpose of the short-term tranche is to cover potential liquidity needs from the reserves in twelve months. Currently, this tranche consists of working capital and a debt portfolio. The working capital is the portfolio into which the funds that come from intervention in the exchange market are placed and their investments are concentrated in very short-term assets denominated in dollars. Given that the objective of this tranche is to provide immediate liquidity for intervention in the foreign exchange market, the working capital is concentrated in deposits and investments that can be liquidated in one day at a very low cost. As of June 2020, the value of the short-term tranche was USD 37,601.3 b, of which USD 1,482.0 b corresponded to working capital and USD 36,119.3 b to the passive portfolio.

The passive portfolio is the main component of the short-term tranche. This portfolio is characterized by an investment horizon and profile of expected profitability that are higher than those of the working capital portfolio. In addition, it has a foreign exchange breakdown that is intended to duplicate the performance of the country's balance of payment outflows, and a profitability that is similar to that of its benchmark index.[3] The passive portfolio is invested in multiple currencies and instruments that are in line with those in a benchmark index defined under the restrictions that the expected return on the portfolio, excluding the foreign exchange component, must be positive in 12 months with a confidence level of 95% and that the expected value of a possible loss must not exceed 1.0%.

The medium-term tranche is intended to raise the expected profitability of the foreign reserves in the long term while preserving a conservative portfolio with a profile of expected profitability that is higher than that of the short-term tranche and the benchmark index. Its goal is to maximize the risk-adjusted return in US dollars, the currency in which foreign reserves are valued, for the portion of the portfolio that is less likely to be used within a twelve-month period. Thus, the maximum return is sought subject to the restrictions that the expected return in US dollars for this tranche must be positive in three years with a confidence level of 95%, and that the expected value of a possible loss must not exceed 1.0% over the same horizon. Currently, the majority of the medium-term tranche consists of actively managed portfolios that seek to generate a return that is higher than that of the benchmark index.[4] As of June 2020, the value of the medium-term tranche came to USD 16,541.3 b.

The last tranche corresponds to the international reserve investments in certified physical gold that can be easily traded on international markets. Gold makes it possible to diversify the investment portfolio since its price behaves differently than the prices of the securities which the short- and medium-term tranches are invested in. As of June 2020, the market value of the gold in the reserves came to USD 237.3 m.

The securities in the investment portfolio are deposited in financial institutions known as trustees.[5] The entities that provide custody service for the securities in the foreign reserves are the New York Federal Reserve, Euroclear, JP Morgan Chase, and State Street. The investments in physical gold are in the custody of the Bank of England.

3. Benchmark indices

To manage the reserve investment portfolio, *Banco de la República* has defined theoretical portfolios or benchmark indices[6] for the short- and medium-term tranches. Different indices are built for each one of these tranches in order to reflect their investment goals. The indices serve as a frame of reference to measure the management of each one of the portfolios. The way the two benchmark indices are built is explained below.

The first step in building the index of the short-term tranche[7] is to define a target foreign exchange breakdown which seeks to replicate the behavior of the country´s balance of payment outflows. Once the foreign exchange components are defined, a portfolio is sought that maximizes risk-adjusted return[8] and complies with the loss restrictions defined for this tranche. The foreign exchange components for this index are intended to replicate the trend of the outflows from the country's balance of payments.[9] The goal is for the currencies other than the US dollar to appreciate during periods in which the dollar value of the country's payments abroad increases, which would mean that the value of these foreign currencies could decline with respect to the US dollar during periods in which the dollar value of the foreign payments decreases. As of June 2020, the foreign exchange breakdown of the short-term tranche index was 82% US dollars, 9.0% Australian dollars, 5.0% Canadian dollars, 1.0% New Zealand dollars, 2.0% Norwegian krone, and 1.0% Korean won.[10] The

3 The concept and breakdown of the benchmark index will be explained in the next subsection.

4 The section, "External Management Program," explains that one of the eight active portfolios is managed directly by *Banco de la República* and the rest by external managers. An explanation on how this program functions can also be found there.

5 Currently, the minimum credit rating for the trustees is A-.

6 In the capital markets, a benchmark index is a basket of assets with predetermined weights in accordance with certain rules that define their composition. In general, an index tries to comprehensively duplicate the trend of a financial asset market and serves as an indicator of the performance of other investment portfolios in the same market. For example, some of the best-known benchmark indices on the stock markets are the ColCap in Colombia, or the S&P500 and the Dow Jones in the United States (the Bank uses fixed income market indices only).

7 This benchmark index does not apply to working capital since there are no benchmark portfolios that make it possible to properly measure the instruments allowed in this portfolio.

8 The detailed description of the methodology for building the benchmark index is located in the Box, "Technical Explanation of the Methodology for Building the Benchmark Index," in the March 2013 *Management Report on the International Reserves*.

9 See the box, "International-reserve Portfolio's New Foreign Exchange Components in the March 2012 Report to Congress for a detailed explanation of the methodology for the foreign exchange breakdown of the reserves.

10 The euro is not part of the group of currencies that the benchmark index is made up of. The reason why it is not in this group is because both the benchmark interest rate of the European Central Bank and the rates for the main short-term sovereign bonds issued in euros are negative. The Korean won has been included in the adjusted index since November 29, 2019.

loss restrictions defined for the short-term tranche are: 1) having positive returns over a horizon of twelve months with a 95% level of confidence while excluding the exchange rate effect and 2) that the expected value of a possible loss over a horizon of twelve months does not exceed 1.0% of the value of the tranche.

In order to build the index of the medium-term tranche, a similar procedure is followed with two basic differences: no restriction is imposed on the foreign exchange breakdown and the loss restrictions are defined over a longer horizon. First, there are no restrictions on the foreign exchange composition because the goal of this tranche is to maximize the risk-adjusted return in US dollars. Second, the restrictions of having positive returns at a 95% confidence level and that the expected value of a possible loss do not exceed 1.0% of the value of the tranche are defined for a horizon of three years in order to reflect the lower probability of using the funds in this tranche in the short term. When building a portfolio that maximizes risk-adjusted profitability in dollars, investments in currencies other than the dollar are allowed.

As of June 2020, the benchmark indices defined for the two tranches have a low level of market risk with an effective duration of 0.93 for the short-term tranche index and of 1.77 for the medium-term tranche.[11] Graph A shows the benchmark indices approved for the short- and medium-term tranches.[12]

4. External Management Program

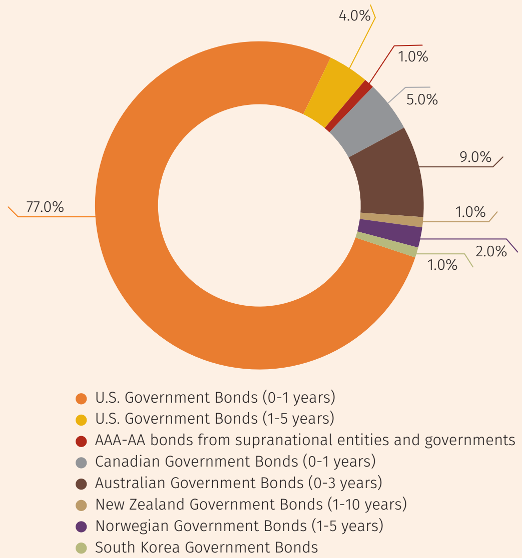
Banco de la República manages the short-term tranche, a portion of the medium-term tranche, and the gold tranche directly. The remaining medium-term tranche funds are managed by external portfolio managers. At the end of June 2020, the portion of the investment portfolio that is managed internally corresponded to USD 40,139.3 b (73.81% of the investment portfolio) while the external management program came to USD 14,240.7 b (26.19% of the investment portfolio).

The main reasons for using external managers are to generate returns that are higher than the benchmark index and to improve the diversification of the portfolio. In this respect, the firms chosen to participate in the program are highly capable in the analysis of financial markets and have a sophisticated infrastructure that can be taken advantage of to define investment strategies and to train Bank officials in the management of international investments. The latter is another objective that the external management program has.

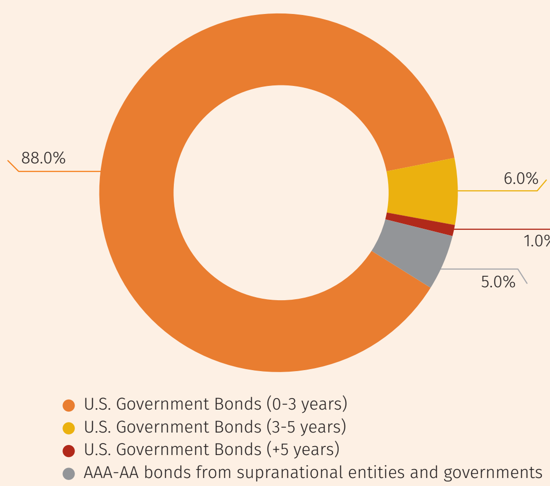
The private firms that participate in the program are chosen through a competitive selection process and are continuously evaluated. The amount of assets under management and the continuation in the external management program are tied to the results obtained by each administrator in the

Graph A
Breakdown of the Benchmark Index
(information as of Tuesday, June 30, 2020)

1. Short-term Tranche



2. Medium-term Tranche



Source: *Banco de la República.*

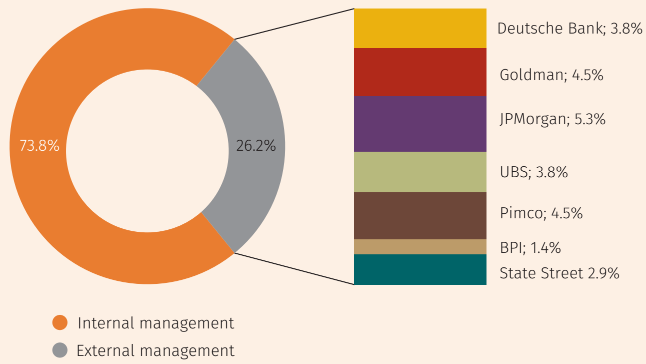
evaluation process. The private companies that currently participate in the external management program are: DWS International aGmbH, BNP Paribas Asset Management USA, Inc., Goldman Sachs Asset Management, L.P., J.P. Morgan Asset Management (UK) Limited, Pacific Investment Management Company LLC, State Street Global Advisors Trust Company, and UBS Asset Management (Americas) Inc., (Graph B). The funds that these companies manage are in *Banco de la República's* custody accounts and the administrators' contracts can be canceled whenever considered necessary. The investments in funds managed by the Bank for International Settlements (BIS) are also considered part of the external management program. Only central banks and multilateral entities have access to these funds and the purpose of

11 The effective duration is a risk measure defined as a percentage decrease (increase) in the value of the portfolio with respect to a 1.0% increase (decrease) in all of the interest rates.

12 For the different sectors that that the benchmark index consists of, the indices published by ICE Data Indices are used.

them is to invest in assets that are appropriate for global foreign reserves in an effort by different countries to work cooperatively.[13]

Graph B
Breakdown of the Investment Portfolio
(information as of Tuesday, June 30, 2020)



Note: approximate values due to rounding.
Source: *Banco de la República*.

13 At present, the investments are made in a fund of inflation-indexed securities issued by the Treasury of the United States (USD 121.1 m), a fund of securities issued by the government of China (USD 262.5 m), a fund of securities issued by the government of Korea (USD 103.7 m), and a fund of securities issued by non-financial corporations (USD 278.1 m).

This Report was coordinated, edited, and designed by the Publishing Management Section of the Administrative Services Department, with font Fira Sans, 10.5.

Printed by Nomos

August 2020