



Emerging risks to the recovery

The immediate economic effects of the COVID-19 pandemic were felt most acutely by households and firms, which experienced dramatic income losses. Financial risks resulting from these income losses can ultimately affect the entire economy through multiple, mutually reinforcing links that connect the financial health of households, firms, the financial sector, and government. Because of this interconnection, elevated financial risks in one sector can spill over and destabilize the economy as a whole. For example, income losses among businesses and households can create spillover risks for the financial and public sectors through rising loan defaults and reduced tax revenue. Similarly, the governments of many emerging economies were already heavily indebted before the pandemic and further increased borrowing to finance their crisis response. These relationships between sectors of an economy are not, however, deterministic. Well-designed fiscal, monetary, and financial sector policies can counteract and reduce these risks over time to support an equitable recovery.

Policy Priorities

The pandemic has increased economic risks for households, firms, financial institutions, and governments. Counteracting these risks to ensure an equitable recovery will require policy action in the following areas:

- **Recognizing and resolving asset distress in the financial sector** as support measures for households and firms are scaled back before economic activity has fully recovered.
- **Supporting insolvent households and businesses** that are unable to resolve their debts in countries with limited or no formal insolvency mechanisms.
- **Ensuring continued access to finance** in the face of tightening lending standards resulting from increased economic uncertainty and greater opacity about the true financial health of borrowers.
- **Managing and reducing high levels of government debt**, especially in countries that entered the pandemic with a high risk of debt distress.

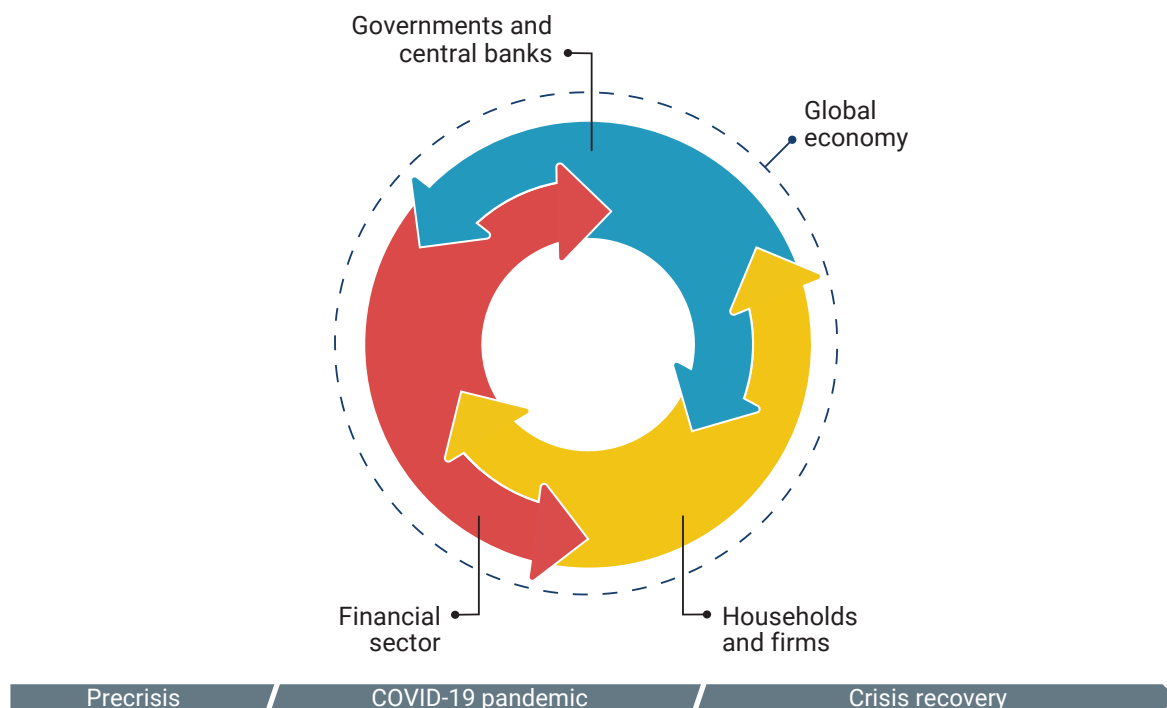
Introduction

The COVID-19 (coronavirus) pandemic sent shock waves through the world economy and heightened concerns about high levels of private and public sector debt. Although the immediate government response to the crisis was largely effective at stabilizing output and protecting incomes, it also aggravated some preexisting financial risks to household, firm, financial sector, and public sector balance sheets that may pose a threat to an equitable recovery in the longer term. These financial risks do not exist in isolation; rather, they are connected through a series of direct and indirect links, as illustrated in figure 1.1.

This chapter outlines a conceptual framework that offers an encompassing view of the interrelated financial risks that will shape the economic recovery. The framework recognizes the important role of preexisting fragilities and global economic factors in the recovery prospects of emerging economies and highlights the important complementarities that exist between policies aimed at addressing the financial risks that have accumulated across the economy.

Addressing the economic risks that have arisen from the pandemic is important not only to ensure a return to economic growth, but also to counteract the dramatic impacts of the COVID-19 crisis on poverty and inequality. Reducing overindebtedness among households and firms is, for example, important in its own right, but it also reduces the risk of a credit crunch that disproportionately affects small businesses and low-income households. Similarly, managing and reducing elevated levels of government debt preserve the ability of governments to assist vulnerable populations and support social safety nets that can mitigate the effects of the crisis on poverty and inequality in the longer term. The following

Figure 1.1 Conceptual framework: Interconnected balance sheet risks



Source: WDR 2022 team.

Note: The figure shows the links between the main sectors of an economy through which risks in one sector can affect the wider economy.

chapters apply this conceptual framework to the various areas where balance sheet risks have accumulated as a result of the pandemic and highlight priority areas where decisive policy action can support an equitable recovery.

Interconnected financial risks across the economy

The initial impacts of the COVID-19 crisis were felt most directly by households and firms, which saw a sharp decline in income and business revenue. These income losses are likely to have repercussions for the wider economy through several mutually reinforcing channels that connect the financial health of households, firms, financial institutions, and governments.

Economic links between sectors create spillover risks

The financial health of households is connected to the larger economy through the so-called household–financial sector nexus and household–government nexus. When the financial health of households deteriorates, it can directly affect the financial sector through a rise in loan defaults and an increase in loan provisioning requirements, which reduce the ability of banks to issue new loans to creditworthy borrowers. Similarly, when balance sheet conditions in the financial sector worsen, banks supply households with less credit and charge higher interest rates, which depresses economic activity.

The financial health of households is similarly connected with that of governments because governments can provide households with direct support in the form of transfer payments, social safety nets, insurance, and employment. These support measures can help households weather the effects of an economic downturn, or an aggregate shock such as the COVID-19 crisis, that overwhelms conventional insurance mechanisms. Governments, in turn, rely on households as a source of tax revenue, which declines when incomes are low, unemployment is high, and household balance sheets are under stress.

Similarly, the corporate sector is connected to the wider economy through links with the financial sector—the so-called corporate–financial sector nexus—and through links with the public sector—the corporate–government nexus. The financial condition of the corporate sector affects banks and non-bank financial institutions directly through insolvency and loan defaults. The health of the financial sector, in turn, affects firms through the availability of credit: when there is stress on financial sector balance sheets, banks extend less credit and charge more for it.

There are multiple feedback loops that can reinforce these links. First, banks are often tempted to delay recognition of nonperforming loans (NPLs) and keep channeling credit to firms that are de facto insolvent. Such “zombie lending” misallocates credit to unproductive firms, reduces the access of profitable firms to financing, and has historically been an important factor in prolonged periods of low economic growth. Second, in times of economic crisis lenders may not be able to distinguish between firms that face temporary liquidity problems and those that are truly insolvent. They may, then, ration credit to both, thereby further depressing economic activity.¹ In emerging economies, government ownership of banks and the greater opacity of market information make these feedback loops more pronounced.

The financial health of the corporate sector is also connected to that of the government. Government spending supports economic activity in the corporate sector directly through public procurement and indirectly through transfers, guarantees, infrastructure investments, and other support schemes, often aimed at priority sectors such as agriculture or small enterprises. Similarly, tax policy can stimulate economic activity and set incentives for the efficient allocation of resources. Through this channel, tax policy has a direct impact on productivity in the corporate sector. The financial

health of the corporate sector, in turn, affects governments directly through the taxation of firms and indirectly through the taxation of labor income and economic growth, which expands the tax base of the economy as a whole.

The connection between the government and financial sectors has received the most attention in recent economic crises² and is especially important in emerging economies where government debt and banking crises have often coincided.³ The domestic financial sector is connected to the financial health of the government through two direct and two indirect channels, collectively known as the government–financial sector nexus. As for the direct channels, first, banks are directly exposed to the government’s default risk if they hold government securities.⁴ Through this channel, a deterioration in the government’s financial position directly affects financial institutions’ balance sheets, increasing borrowing costs and reducing banks’ ability to supply credit. Conversely, banks are an important source of funding for the government through the purchase of government bonds. When financial sector balance sheets are weak, funding costs go up, making it difficult for governments to refinance existing short-term debt (known as rollover risk) and to finance new expenditures.⁵ The absence of well-functioning bank resolution and crisis management frameworks can amplify negative feedback loops, particularly if the government’s ability to support the financial system becomes compromised.

Second, governments and central banks have in place explicit arrangements, such as emergency liquidity assistance, to support ailing albeit solvent banks in well-circumscribed conditions. These commitments are more extensive in countries with substantial state ownership of banks. There, the government is directly exposed to losses in the financial sector through reduced dividends and losses in its equity holdings and is expected to provide liquidity and other types of support in times of crisis. However, even in countries with little or no state involvement in the financial sector, governments typically are not able to abstain from bailing out systemically important financial institutions in a crisis. Such bailouts for “too big to fail” institutions can have a significant direct impact on the government’s financial position. The mere expectation of such bailouts can worsen fragilities in the financial sector by encouraging excessive risk-taking among banks.⁶

Risks to financial sector and government balance sheets are also connected through two indirect channels and feedback loops. First, the two sectors are connected through interactions between the fiscal and real (nonfinancial) sectors of the economy. A deterioration in the government’s financial position will ultimately require fiscal consolidation (mobilizing tax revenue and reducing expenditures), which dampens economic activity. This, in turn, may increase insolvencies and put pressure on the financial sector. Second, the financial sector and government are connected through interactions between the banking and real sectors of the economy. The production of goods and services depends on access to credit, which is reduced when the financial sector is distressed. This reduction slows economic activity, triggers automatic stabilizers such as countercyclical welfare expenditures, and lessens the government’s ability to raise tax revenue. In addition, many governments support specific sectors of the economy, such as agriculture and small businesses, through financial sector programs such as partial credit guarantees, directed lending, or public-private partnerships. When business conditions worsen, governments can be exposed to credit losses in these loans.

In emerging economies, the interconnected risks of households, firms, the financial sector, and government are exacerbated by external factors stemming from developments in the global economy. For example, in many small, open economies, households, firms, and government borrow in foreign currency. When the value of the local currency depreciates, foreign currency debt becomes more expensive and often unsustainable relative to the local currency income of the borrower. Low- and middle-income countries, and low-income countries in particular, are also more dependent on commodity exports (32 percent of high-income countries are commodity-dependent, compared with 91 percent of low-income

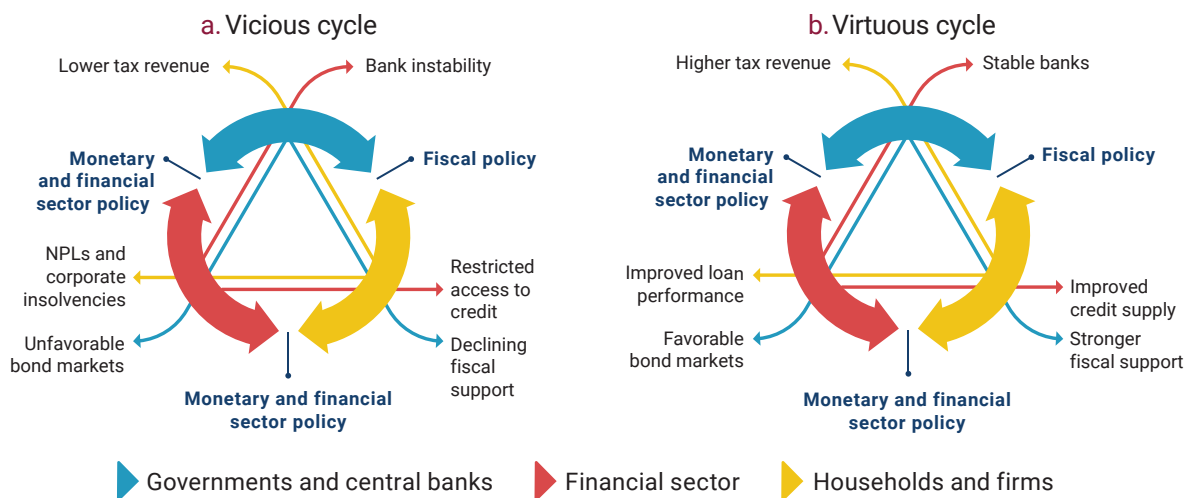
countries).⁷ Global economic crises, such as the COVID-19 shock, often coincide with a decline in commodity prices. This disproportionately affects government revenue in low-income countries, further reducing their ability to counteract the crisis through expansionary fiscal policy (higher government spending or tax reductions).

Effective policies can counteract risks to the recovery

Although the economic risks faced by households, firms, the financial sector, and government are interconnected, the relationship between these risks is not predetermined (figure 1.2). Well-designed fiscal, monetary, and financial sector policies can turn the links between sectors of the economy from a vicious cycle into a virtuous cycle. In response to the COVID-19 crisis, for example, many governments immediately used fiscal resources to support the balance sheets of households and businesses in order to prevent a wave of loan defaults and a spillover of the economic shock to the financial sector. Similarly, countries made extensive use of monetary and financial sector policies to strengthen the resilience of the financial sector and ensure that well-capitalized banks were in a position to continue supplying the economy with credit.

However, the extent to which governments can mitigate the longer-term risks arising from the COVID-19 crisis differs dramatically across countries because of wide variation in preexisting economic fragilities and access to resources. This disparity makes an unequal recovery within and across countries a very likely outcome. For example, preventing a spillover of household and corporate balance sheet risks to the financial sector requires direct fiscal support to households and firms whose incomes have been affected by the pandemic. But given high preexisting levels of government debt and declining tax revenue during the crisis, few emerging economies had the capacity to finance such anticyclical policies. The result was one of two pitfalls: countries either were not able to enact support policies comprehensive enough to prevent a surge in insolvencies, loan defaults, and spillovers from households and firms to the financial sector, or the scale of support programs required significant new government borrowing, which will constrain the ability of governments to provide ongoing support in the event of a drawn-out recovery.

Figure 1.2 Conceptual framework: Vicious and virtuous cycles



Source: WDR 2022 team, based on Schnabel (2021).

Note: NPLs = nonperforming loans.

In addition to different degrees of policy space, there is also wide variation in structural factors, such as the extent of informality in the economy, the quality of the legal system, the independence of the central bank, and the access to financial and nonfinancial technologies that can help or hinder the reduction of economic risks that may threaten the recovery.

The COVID-19 pandemic is also the first crisis in which access to digital technology and infrastructure plays an important role in determining both the severity of the crisis impacts and the speed of the crisis recovery. In economies with a strong digital infrastructure, a larger share of the workforce was able to work remotely, thereby reducing economic disruptions and job losses arising from the pandemic. Moreover, digital payment channels were used where they were available to disburse support payments to households and firms, allowing beneficiaries to receive relief payments more quickly. A strong digital infrastructure will also be an important factor in the crisis recovery because digital payments, e-commerce, and digital communications reduce the need for in-person interactions and enable normal economic activity to resume faster. New financial technologies can also reduce information asymmetries, support sound risk management, and allow lenders to support the recovery through the uninterrupted provision of credit to households and businesses.

Where governments are able to enact effective crisis response policies, these policies can act as a circuit breaker that lessens balance sheet risks and gives rise to a virtuous cycle with positive spillovers between the sectors. Where governments are unable to enact effective policies, or where such policies are hampered by structural factors beyond their control, a vicious cycle can emerge in which risks in each sector accumulate and reinforce each other over time.

From health crisis to financial distress: Emerging risks to the recovery

The COVID-19 crisis and many of the policies enacted to counter it have reinforced the economic links between households and firms, the financial sector, and government. Although the immediate government response to the crisis was swift and largely effective at mitigating the worst human costs of the pandemic, it also exacerbated preexisting financial fragilities by, for example, triggering a dramatic increase in private and public sector debt. These fragilities, if not addressed decisively, could pose a threat to a strong and equitable recovery in the longer term. One challenge policy makers face is that many of the policies undertaken during the COVID-19 crisis are altogether novel (such as central bank asset purchase programs in emerging economies), have not previously been used at this scale (such as debt moratoria and regulatory forbearance), or have the potential to create various longer-term risks to the recovery, such as hidden debts and contingent liabilities, which may become apparent only much later. As the immediate effects of the pandemic subside, policy makers face the difficult task of scaling back these policies without dampening the recovery or worsening the already highly regressive impacts of the crisis.

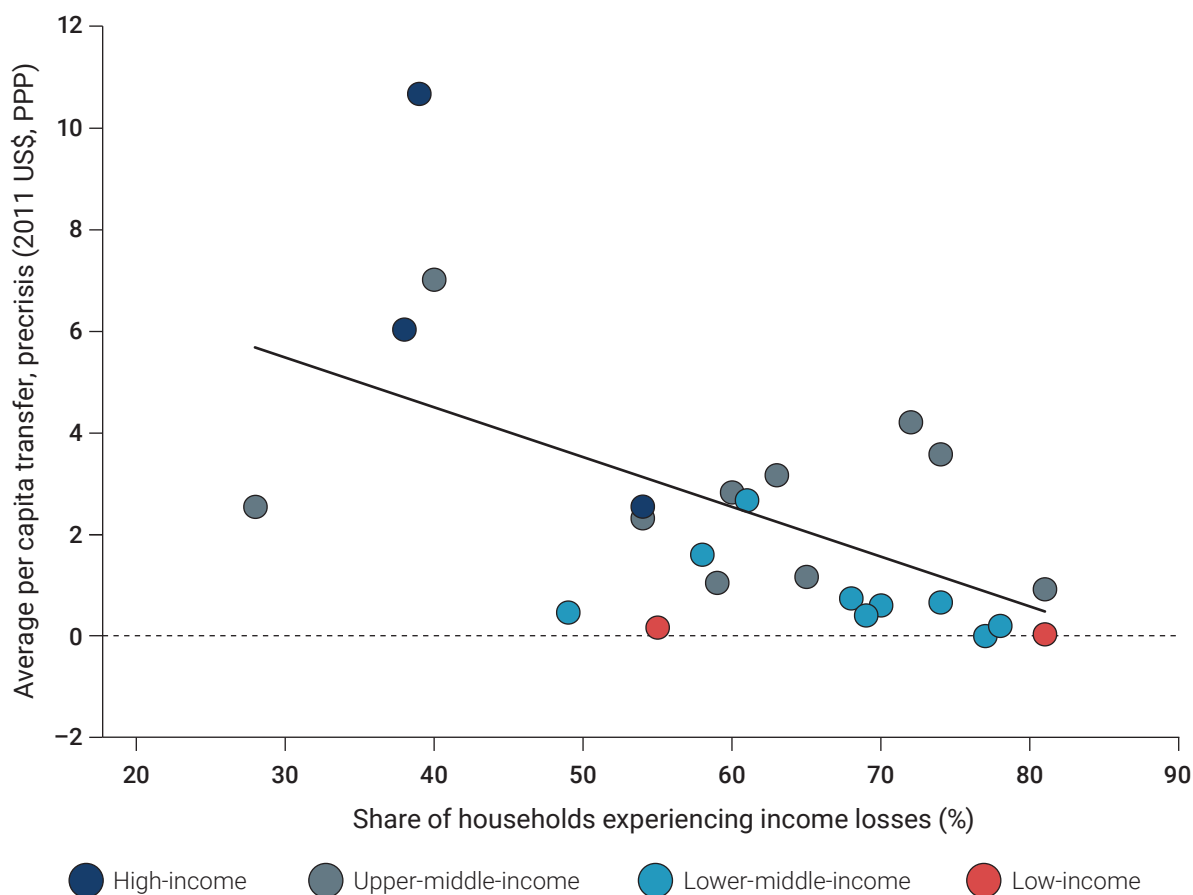
Households and firms

Despite the extensive fiscal support measures taken by governments worldwide, the pandemic has led to a significant tightening of household balance sheets. Although many countries enacted cash transfer and income support measures to support households and prevent spillovers to the financial sector, many of these programs were not sufficient to compensate for the full extent of income losses. As highlighted in the introduction to this Report (figure I.5), the majority of households in both emerging and advanced economies do not have enough liquid assets to sustain basic consumption for more than three months

in the face of a large income shock, and most governments lack the fiscal resources to maintain income support programs for a substantial amount of time. As a result, many income support programs had to be phased out before household earnings fully recovered. This was especially true in countries that were hit by multiple waves of the pandemic, lacked strong automatic stabilizers such as unemployment insurance and other social safety nets, and were unable to mobilize external fiscal resources for prolonged support measures. These factors increase the vulnerability of households, as well as the risk of spillovers to financial institutions through increases in nonperforming loans.

Household incomes were especially hard-hit in countries with limited social safety nets (see figure 1.3) and a large share of employment in the informal sector. Because of the aggregate nature of the shock,

Figure 1.3 Social safety nets and income losses during the COVID-19 crisis, by country income group



Source: WDR 2022 team, based on data from World Bank, ASPIRE (Atlas of Social Protection Indicators of Resilience and Equity) (dashboard), <http://datatopics.worldbank.org/aspire/>; World Bank, COVID-19 Household Monitoring Dashboard, <https://www.worldbank.org/en/data/interactive/2020/11/11/covid-19-high-frequency-monitoring-dashboard>.

Note: The figure shows the average per capita transfer of social protection payments, including transfer payments from social assistance, social insurance, and labor market programs. For each household, the per capita average transfer is the total amount of transfers received (constant 2011 US dollars adjusted for purchasing power parity, PPP) divided by household size, for the latest precrisis year available for each country. Data on income losses were collected between April and December 2020.

informal insurance mechanisms that could have mitigated the impact of the economic shock, such as borrowing from family and friends, were largely ineffective. In the majority of emerging economies, government transfer payments could not compensate for the sharp decline in incomes and were an insufficient substitute for these informal insurance mechanisms. Moreover, access to available support schemes often varied dramatically across population groups and did not reach households employed in the informal sector or households without access to a formal financial account, who were among those most severely affected by the crisis. This uneven access to support programs is likely to increase poverty and inequality and weaken the resilience of households in the longer run (see spotlight 1.1).

To ward off an immediate spike in defaults on consumer debt and spillovers to the financial sector, many governments supplemented income support measures with far-reaching debt forbearance policies. Many of these debt relief measures also included a freeze on credit reporting—that is, borrowers who were late on their loan payments were not reported to credit bureaus and did not suffer a deterioration of their credit score. Such policies create a difficult trade-off. On the one hand, they can be useful in the face of a transitory shock because they reduce the likelihood that borrowers are forced to default on their loans or lose access to credit as a result of temporary liquidity problems. However, such forbearance policies may not be sufficient to prevent spillovers to the financial sector if they are lifted prematurely, forcing defaults among otherwise creditworthy borrowers whose income has not yet recovered. On the other hand, if debt relief policies are left in place too long, they can hide the true extent of nonperforming loans and mask credit risks that materialize once debt moratoria are lifted. Box 1.1 describes how debt moratoria were used as part of the short-term response to the pandemic in India and were successful in warding off a large spike in loan defaults in the early stages of the crisis.

Similarly, a broad range of policies have been enacted to provide liquidity to the corporate sector in the hope that, because the public health crisis will be temporary, so, too, will be the financial distress of firms. These policies have included direct grants and transfer payments, tax breaks, as well as credit subsidies and guarantees. Although the extension of direct support to businesses is sensible in the short run to prevent insolvencies of viable firms and associated job losses, it is important that support policies be designed in a way that does not distort the allocation of resources in the longer term. The pandemic has triggered structural changes in the world economy, which will ultimately necessitate a reallocation of resources between sectors. Some areas such as tourism and corporate real estate are expected to take a long time to recover to their precrisis levels, while areas such as e-commerce, services, and information technology are expected to expand their relative shares of the economy. Temporary support programs that are left in place for too long, or that target specific industries through preferential tax treatment, transfers, or credit subsidies, run the risk of channeling scarce resources to sectors and firms that the crisis has rendered unviable. Evidence from past crises shows that this type of misallocation tends to benefit large firms in stagnating sectors to the detriment of smaller and more efficient firms, as well as sectors with higher growth potential. Emerging evidence on the impacts of COVID-19 support programs suggests that this pattern also holds in the current crisis, with support programs disproportionately benefiting less productive firms in politically favored sectors.⁸ This discrepancy could slow the economic recovery and delay the reallocation of resources to more sustainable sectors.

The financial position of households and firms will also be affected by feedback effects from the government and the financial sector. Governments that entered the crisis with elevated debt and limited fiscal resources were either unable to mobilize sufficient resources for the crisis response or will have to phase out support programs prematurely. Data from the World Bank's COVID-19 Crisis Response Survey reveal that the fiscal response to the pandemic was significantly constrained by limited access to domestic borrowing in 72 percent of low-income countries and 57 percent of lower-middle-income countries, by limited access to foreign borrowing in 83 percent of low-income countries and 61 percent

Box 1.1 Case study: Supporting borrowers and the financial sector in India

The world over, governments and regulators responded to the COVID-19 crisis with financial sector policies aimed at supporting borrowers and reducing risks to financial stability. Many of these policies, such as debt moratoria, had never been used on this scale. It is possible to draw some first lessons about the effectiveness of these policies from the experience of countries that were confronted with multiple waves of the pandemic and introduced several rounds of support programs in response.

The case of India offers an especially instructive example. India's government and financial regulators put forth a large, decisive policy response to the first wave of the pandemic that used a variety of monetary and financial sector policies aimed at stabilizing the financial sector and supporting households and firms.

Monetary policy tools: Effective but cannot be targeted

In March 2020, the Reserve Bank of India (RBI) approved a first monetary stimulus totaling some

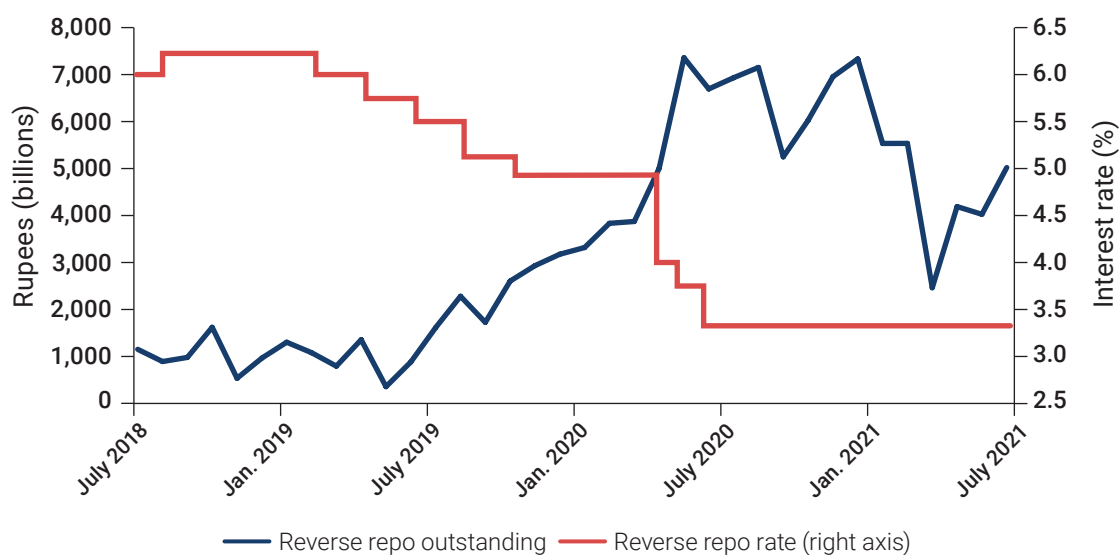
\$75 billion. This stimulus was expanded in later rounds, and by the end of 2021 the RBI had introduced monetary policy measures totaling \$231 billion.^a The first round of liquidity measures reduced interest rates by 100–200 basis points across the yield curve and successfully averted financial distress among banks and nonbank lenders. Figure B1.1.1 shows how the RBI implemented the monetary stimulus through the repurchase agreement (repo) market and how this action lowered interest rates and shifted the yield curve.

Debt moratoria: Covered 50 percent of all loans in India, most stabilized

India's first COVID-19 package also included a generous debt repayment moratorium for households and firms. Participation in this moratorium, which granted borrowers a freeze on loan repayments for 90 days, was voluntary, but nearly 50 percent of bank loans were eventually covered by the program. As lockdowns continued, another 90-day

Figure B1.1.1 Use of monetary policy to reduce interest rates in India

a. Effects of monetary stimulus through repo market, 2018–21

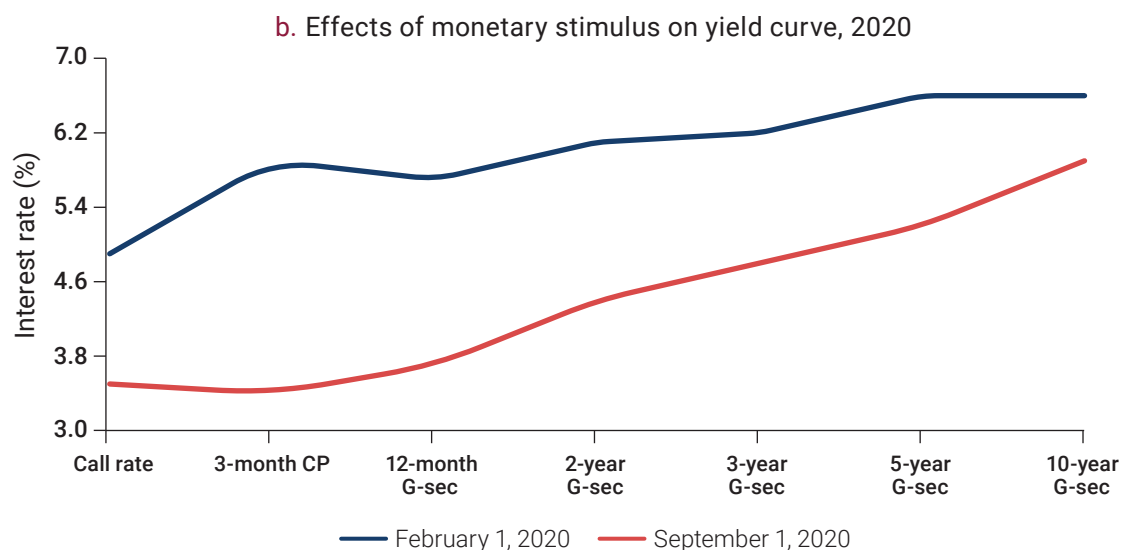


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Box 1.1 Case study: Supporting borrowers and the financial sector in India (continued)

Figure B1.1.1 Use of monetary policy to reduce interest rates in India (continued)



Source: Reserve Bank of India.

Note: The figure shows the effects of the Reserve Bank of India's intervention in the repurchase agreement (repo) market. Panel a indicates its importance as a source of financing for financial institutions. Panel b indicates the shift in India's yield curve (that is, the reduction of interest rates at different maturities) that resulted from liquidity infusion through this channel and other actions of the central bank. CP = commercial paper; G-sec = government security.

extension of the program was introduced, which ultimately covered 40 percent of all outstanding loans in India.^b As the moratorium was eventually being phased out, the central bank opened up a special restructuring window for loans to consumers, micro-, small, and medium enterprises (MSMEs), and larger firms to facilitate the reduction of debt burdens.

Although banks were concerned about the high share of loans covered by the moratorium, the outcomes were relatively benign. In the six months after the moratorium, banks managed to contain additional nonperforming loans to 2–4 percent.^c However, this relative stability masked considerable differences across segments, with consumer loan delinquency rising while nonperforming loans among MSMEs and larger firms remained stable.

Loan performance in segments such as micro-finance was the most severely affected, with nonperforming loans increasing from 1 percentage point to more than 5 percentage points.

Although India's experience with a debt moratorium was overall favorable, applying such a measure repeatedly is challenging because it may affect borrowers' behavior. India later enacted another debt moratorium as part of its response to the severe second wave of the pandemic from March to June 2021. However, the possible effects on hidden debts and credit discipline were a much-debated issue.

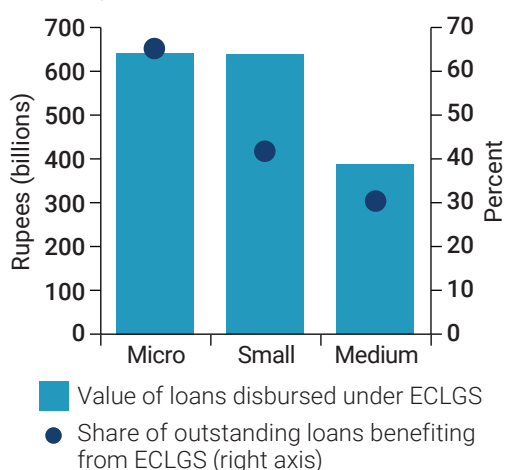
Guarantee schemes: Well targeted, but a potential source of contingent liabilities

The Indian government also introduced a partial credit guarantee scheme, the Emergency Credit

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Box 1.1 Case study: Supporting borrowers and the financial sector in India (continued)

Figure B1.1.2 Support for new lending through partial credit guarantees in India, by firm size



Source: Reserve Bank of India.

Note: The figure shows the amount of new lending to micro-, small, and medium enterprises under India's credit guarantee scheme initiated in response to the pandemic. ECLGS = Emergency Credit Line Guarantee Scheme.

Line Guarantee Scheme (ECLGS). This scheme enabled the government to provide the economy with additional liquidity with a minimal immediate effect on its fiscal position (figure B1.1.2). Initially, guarantees of Rs 3 trillion (\$40 billion) were

announced, and most of the Rs 2.5 trillion (\$34 billion) allocated under this scheme went to small and microenterprises.

However, the true cost of these guarantees to the government will only become clear in the longer term. Although India's economic recovery from the first waves of the pandemic has been remarkably robust and the immediate fiscal impact of credit guarantee schemes is low, credit guarantees always carry the risk of turning into a liability for the government if an economic downturn causes loan defaults to rise. This risk is of particular concern in the context of the COVID-19 crisis, in which business prospects across countries and sectors of the economy remain uncertain in the face of possible future waves of the pandemic.

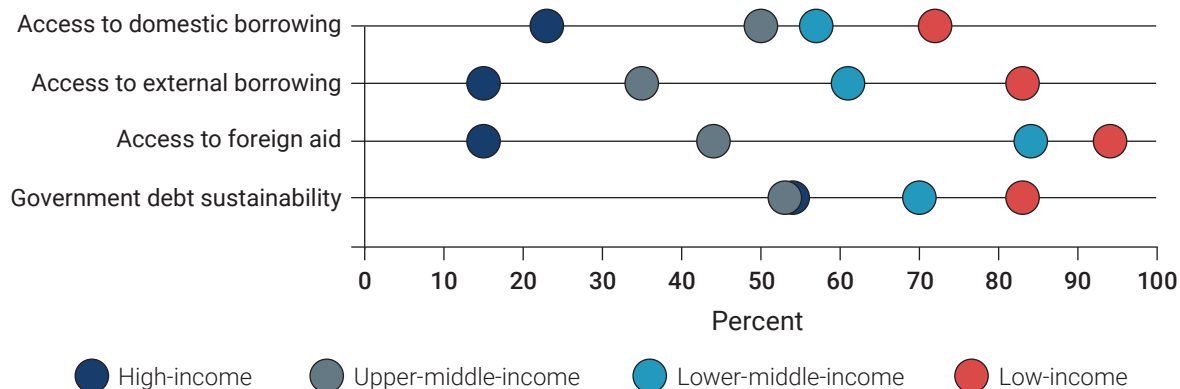
Rising inequality despite a strong crisis response

Although a large spike in insolvencies and loan defaults has been averted thanks to India's ambitious policy response,^d inequality has increased. While agricultural incomes have been remarkably resilient, the 40 percent of India's informal workforce outside the agriculture sector has suffered the brunt of the economic distress caused by the pandemic.^e This is not unique to India and mirrors developments in many other countries where the pandemic has worsened inequality despite extensive policy measures aimed at protecting the incomes of the poor.^f

- RBI (2021).
- RBI (2020a, 2020b).
- Even when the 2 percent of loans under the special restructuring window are included, the total addition in problem loans was only 5 percent of banks' total loan portfolios.
- RBI (2021).
- See Azim Premji University (2021), CMIE (2021), and Dhingra and Ghatak (2021). While the data show stark increases in poverty and inequality during India's first lockdown, some recent evidence suggests that these trends may have been more muted and partly reversed later in the pandemic (Gupta, Malani, and Woda 2021).
- World Bank (2021b, 2022).

of lower-middle-income countries, and by concerns about the overall sustainability of government debt in 83 percent of low-income countries and 70 percent of lower-middle-income countries (figure 1.4). Governments facing such tight fiscal limitations will be unable to protect households and firms from adverse events during the recovery. These include external economic shocks, which are a very real prospect for low- and middle-income countries, where the recovery is highly dependent on a favorable international

Figure 1.4 Fiscal constraints to the COVID-19 response, by country income group



Source: World Bank, COVID-19 Crisis Response Survey, 2021, http://bit.do/WDR2022-Covid-19_survey.

Note: The figure shows the percentage of countries in which each of the listed factors was identified as a significant or moderate constraint to the response to the pandemic. Data are as of June 30, 2021.

environment. Similarly, the survival of many viable firms depends on an ongoing supply of credit, which may be threatened if the financial sector comes under stress from external shocks, exposure to the government risk, or an increase in loan defaults as government support programs are phased out.

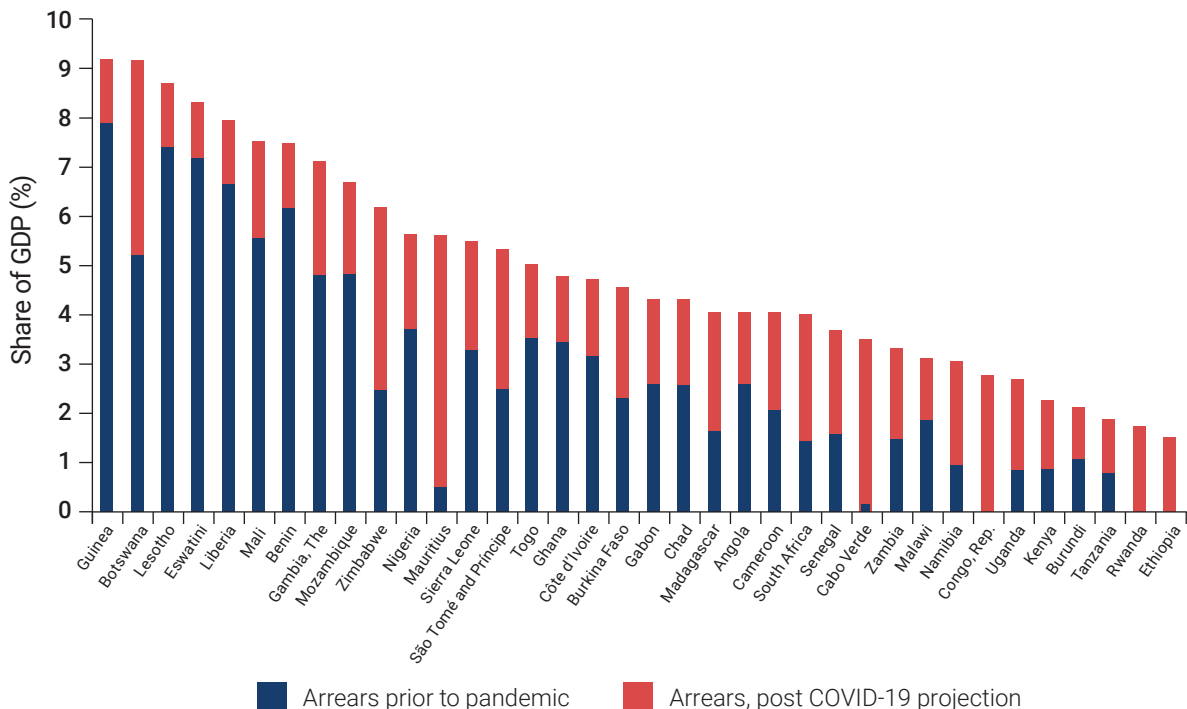
Households and businesses are also exposed to tightening public sector balance sheets through government arrears. As a result of the crisis, many governments, particularly in low-income countries, have resorted to suspending or delaying the payments for goods, services, and works procured from the private sector. Some governments have also suspended or delayed paying the salaries of public sector employees. In Sub-Saharan Africa, for example, the government is one of the biggest purchasers of goods and services, and public procurement averages 12 percent of gross domestic product (GDP). Government arrears stood at a staggering 4.26 percent of GDP prior to the COVID-19 pandemic (figure 1.5).⁹ The economic contraction stemming from the pandemic has only aggravated the problem. Conservative estimates for the region suggest government arrears increased by nearly 2 percent of GDP during the first year of the pandemic.¹⁰ Financing relief and recovery programs by accumulating arrears is economically costly because it directly counteracts stimulus efforts by depriving households of income and reducing firm revenue at a time when liquidity is crucial for their survival. The accumulation of government arrears is a prime example of an economic link between the public and private sectors that has been exacerbated by the crisis, has an asymmetrically larger adverse effect on small and informal firms, and poses a very real threat to the recovery.

Financial sector

In contrast to earlier crises, the COVID-19 recession did not originate in the financial sector and was not set off by a specific event, such as the failure of a systemically important institution. Nonetheless, a gradual deterioration of asset quality in the aftermath of the pandemic could lead to a longer-term outcome that looks very similar to that after a traditional financial sector crisis.

Mandated by governments and regulators, financial institutions worldwide have granted grace periods and moratoria for loan repayments on an unprecedented scale (figure 1.6). These forbearance policies play an important role in preventing avoidable defaults among creditworthy borrowers suffering temporary liquidity problems. However, if left in place too long these policies can lead to credit market distortions and make it difficult for banks to distinguish between creditworthy and noncreditworthy borrowers, ultimately reducing new lending.

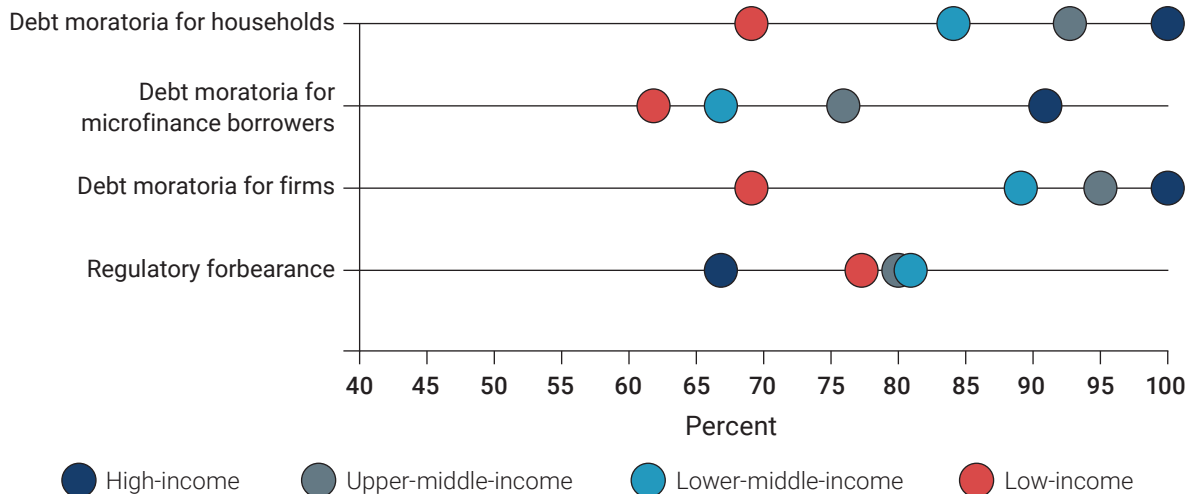
Figure 1.5 Government arrears in Sub-Saharan Africa



Source: WDR 2022 team, based on Bosio, Ramalho, and Reinhart (2021).

Note: The arrears are computed using the ratio of the number of days required to process payment beyond 45 days to the number of days in a year, multiplied by total public procurement as a percentage of GDP. Projections are based on data from the October 2020 IMF World Economic Outlook. See International Monetary Fund, WEO (World Economic Outlook Databases) (dashboard), <https://www.imf.org/en/Publications/SPROLLS/world-economic-outlook-databases>.

Figure 1.6 Financial sector policies during the COVID-19 crisis, by country income group



Source: World Bank, COVID-19 Crisis Response Survey, 2021, http://bit.do/WDR2022-Covid-19_survey.

Note: The figure shows the percentage of countries in which each of the listed policies was implemented in response to the pandemic. Data are as of June 30, 2021.

Some debt moratoria enacted in response to the COVID-19 crisis were accompanied by a freeze on credit reporting—that is, regulators instructed banks to not report delinquent borrowers to credit bureaus for the duration of the moratorium. Although such a measure protects borrowers from being excluded from the credit market because of a temporary liquidity shock, it complicates the task of assessing the true credit risk on bank balance sheets. So long as forbearance programs are in place, banks are largely unable to distinguish illiquid from insolvent borrowers, which may make them more reluctant to issue new credit. This pattern may already be evident in some economies. Since the fourth quarter of 2019, the percentage of loans to total assets has fallen, and lending standards have tightened in countries that were more severely affected by emergency measures (see chapter 2 for a discussion).

Finally, debt forbearance programs always carry the risk of creating incentives for evergreening and zombie lending—that is, they tempt lenders to extend credit to insolvent borrowers to avoid having to classify these loans as nonperforming. Through the financial sector–corporate nexus and the financial sector–household nexus, evergreening and zombie lending have negative effects on the real economy because they depress lending to creditworthy households and viable firms. As a result, households and firms are less resilient to the adverse shocks that may arise during the crisis recovery period and are less able to finance new consumption and investment.

In addition to debt moratoria, many countries have relaxed banking regulations, accounting standards, and capital provisioning rules for bad loans in an effort to stimulate lending and prevent a credit crunch (see box 1.2). Although international regulatory standards, such as the Basel III framework, allow for some flexibility to enact such regulatory forbearance measures, some regulators relaxed prudential regulation beyond international standards in response to the crisis. This is an extremely problematic policy choice because the relaxation of prudential oversight encourages financial institutions to originate poorly screened loans. This contributes to the accumulation of loans whose true credit risk is unknown, but likely much higher than accounted for by those institutions. In addition, numerous political economy factors will make it extremely difficult to reverse the relaxation of regulatory standards once the crisis subsides, especially in countries with weaker institutions and limited central bank independence. In the longer run, the use of regulatory forbearance policies that go beyond the flexibility embedded in international frameworks will magnify financial sector risks and increase the vulnerability of countries to financial crises. This is illustrated by previous crisis episodes in which such policies were used on a much more limited scale than in the COVID-19 crisis and had far-reaching negative consequences, including zombie lending and excessive risk-taking invited by lax regulatory oversight.

In many emerging markets, nonbank financial institutions account for a high share of private credit. They are typically less regulated than banks and may therefore accumulate credit risks that are less apparent than the risks to bank balance sheets. Nonbank lenders—including microfinance institutions and fintech lenders—also account for a large share of lending to consumers and small businesses, which have been especially hard-hit by the pandemic. When the balance sheets of nonbank lenders come under stress, there are far-reaching repercussions for the real economy. In the Indian microfinance crisis of 2010–11, for example, the aggregate loan portfolio of microfinance lenders contracted by 20 percent. This contraction had severe negative effects on household wage earnings and consumption.¹¹

Nonbank lenders in emerging economies are also much more exposed to risks originating in the global economy. Unlike deposit-taking commercial banks, nonbank lenders refinance themselves in domestic and international markets, sometimes in foreign currency, which means their ability to supply credit is directly affected by exchange rate fluctuations and the international interest rate environment. Because nonbank lenders in emerging economies deal predominantly with low-income consumers and

Box 1.2 The unintended consequences of regulatory forbearance

During the COVID-19 crisis, many countries experimented with regulatory forbearance policies that relaxed capital requirements or accounting standards for banks in the hope they would provide borrowers with temporary relief.³ Although it is too early to assess the impact of these regulatory forbearance policies, past experiences can serve as a useful illustration of the longer-term risks such policies can pose to financial stability and economic growth.

One especially instructive example is India, which lowered capital provisioning requirements in response to the 2007–09 global financial crisis. In 2008, the Reserve Bank of India (RBI) announced it would apply “special regulatory treatment” to loans under temporary liquidity stress. The policy relaxed asset risk classification rules that govern capital provisioning requirements for financial institutions with the intent of making it easier for banks to provide forbearance to firms that had suffered temporary cash-flow shocks during the crisis.

With the new regulation, banks were no longer required to automatically downgrade the asset quality of loans to substandard because of a missed principal or interest payment. They could claim that delinquent firms merely faced temporary liquidity problems and place these assets into a new “restructured” category. Under normal circumstances, all loans in the restructured category would be subject to immediate downgrades to substandard, and capital provisioning requirements would increase proportionately and substantially, as table B1.2.1 illustrates. In other words, banks would be required to increase their capital reserves to protect themselves against the higher default risk of these loans.

The RBI regulation did not provide explicit criteria for identifying liquidity-constrained firms, leaving it up to the banks to decide which loans to assign to the new restructured category. Banks took full advantage of this ambiguity and extensively used the restructured category to avoid having to add to their capital reserves. In this way, the policy gave banks an incentive to obscure the true asset quality of the loans on their books and offered them a route to continually postponing or altogether avoiding recognition of troubled assets.

Table B1.2.1 Provisioning requirements by loan category, India, 2008

Asset category	NPL duration (months)	Provisioning rate (%)
Standard	—	0.25–1
Substandard	<12	10
Doubtful	12–24	20
	25–48	30
	>48	100
Loss	—	100

Source: Reserve Bank of India.

Note: The table lists provisioning requirements on various categories of loans as defined by the Reserve Bank of India. The provisioning requirements for standard assets depend on the industry sector of the loan, and thus the table indicates the range of provisioning rates across all industries. NPL = nonperforming loan.

This situation led to a significant buildup of stressed assets in the Indian banking system. State-owned banks, in particular, saw their stressed assets pile up—a problem that became apparent once the regulation was withdrawn (see figure B1.2.1).^b The marked difference in the accumulation of stressed assets between private and state-owned banks indicates that the negative consequences of the policy are not uniform and may be exacerbated by poor corporate governance.

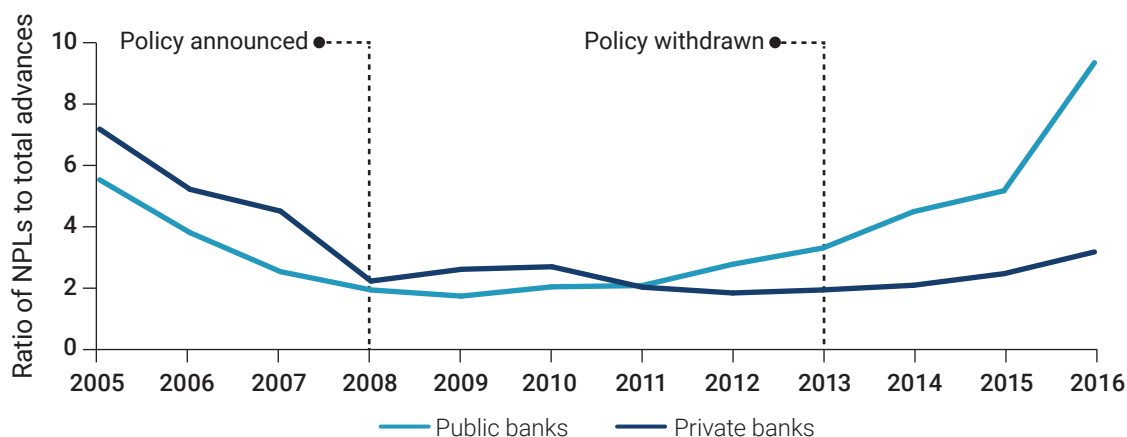
The rise in nonperforming loans (NPLs) resulting from diminishment of the crisis had a large impact on asset quality in the Indian financial sector. Prior to the global financial crisis, India had the lowest NPL ratio (2 percent) of all G20 nations. Between 2008 and 2018, the share of nonperforming and restructured loans in India’s banking system rose dramatically, and by 2018 India had the highest NPL ratio (11 percent) among this group of countries.

Contrary to the intention of the policy, regulatory forbearance also encouraged banks to channel credit to low-liquidity and low-solvency borrowers. As a result, zombie firms emerged on a large scale in the Indian corporate sector. In 2016, approximately 40 percent of nonfinancial firms in India had

(Box continues next page)

Box 1.2 The unintended consequences of regulatory forbearance (continued)

Figure B1.2.1 Nonperforming loans in India, 2005–16



Source: Chari, Jain, and Kulkarni 2021.

Note: The figure shows the ratio of nonperforming loans (NPLs) to total advances for state-owned banks and private banks in India between 2005 and 2016. Dashed lines mark the announcement and withdrawal of the regulatory forbearance policy.

an interest coverage ratio (the ratio of revenue to interest payments) of less than 2, and 21 percent of firms had an interest coverage ratio of less than 1, meaning that they were unable to cover their debt payments with current revenue. The average interest coverage ratio of Indian firms fell by nearly half, from 6.92 in 2007 to 3.38 by 2015. At the same time, overall debt levels remained unchanged, suggesting that the debt service capacity of the Indian corporate sector had sharply declined. This increase in zombie lending also made it more difficult for healthy firms to obtain loans from banks, with obvious negative implications for economic growth.

Meanwhile, regulatory forbearance functioned as an implicit subsidy for the financial sector that allowed the government to delay costly bank recapitalization. Recognizing loan losses in a timely fashion would have undoubtedly weakened bank

balance sheets and necessitated large bank recapitalizations. Because state-owned banks account for approximately 70 percent of the Indian banking sector, recognition would have entailed significant costs for the government relative to budget-neutral forbearance schemes.

In light of the many regulatory forbearance policies enacted in the wake of the COVID-19 crisis, India's experiment with regulatory forbearance in a past crisis serves as a cautionary tale. It may be challenging to unwind improperly designed temporary forbearance measures, and many of these policies will have long-lasting negative effects on access to credit, industry structure, and financial stability even after a policy is withdrawn. As economies recover, active and costly intervention may be needed to address some of these longer-term legacies, such as zombie lending and the undercapitalization of banks.

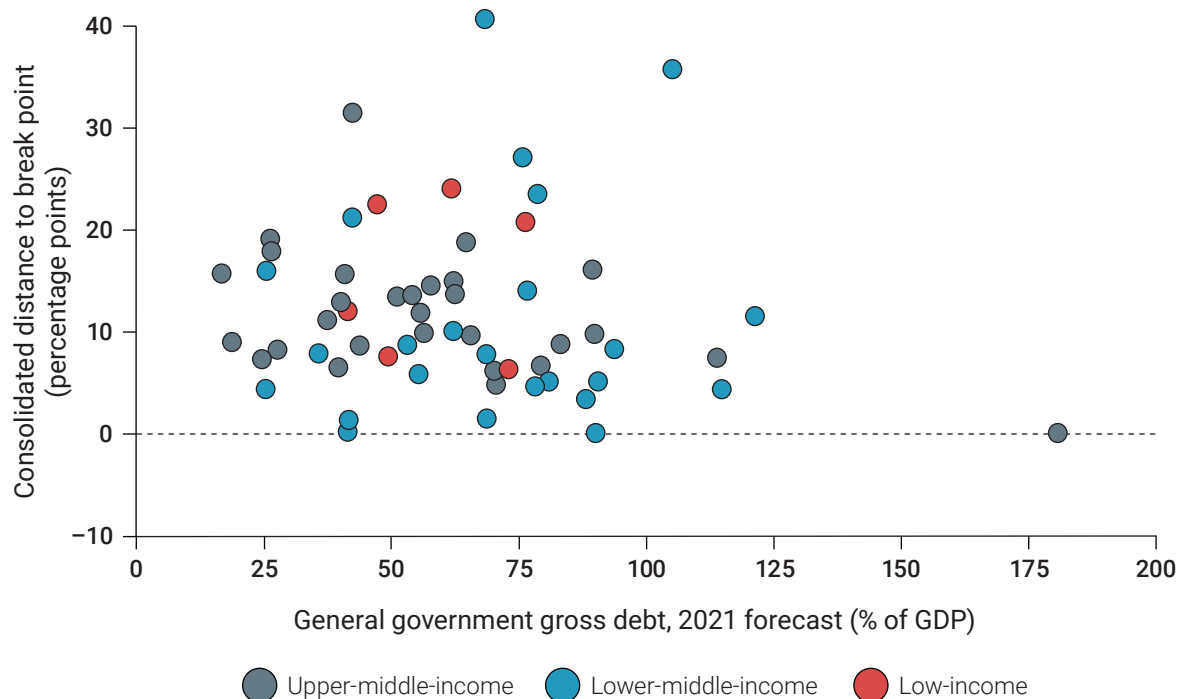
a. Acharya, Engle, and Steffen (2021).

b. Chari, Jain and Kulkarni (2021).

small businesses, the impacts of external shocks on their ability to supply credit will have a disproportionately negative effect on these vulnerable segments of the population.

Financial fragilities in the postcrisis period could also arise from a tightening of the government-financial sector nexus (figure 1.7). Many governments have financed their COVID-19 response by issuing new debt that is held by domestic financial institutions. As the government's fiscal position worsens and

Figure 1.7 Government debt and banking sector fragility during the COVID-19 crisis, by country income group



Source: WDR 2022 team, based on Feyen and Mare (2021); World Bank Macro-Fiscal Model Data Base, see Burns and Jooste (2019); Burns et al. (2019).

Note: The consolidated distance to break point is the percentage point increase in the nonperforming loan ratio that wipes out capital buffers for banks representing at least 20 percent of banking system assets (see Feyen and Mare 2021). GDP = gross domestic product.

its credit rating falls, asset quality in the financial sector deteriorates. This deterioration in asset quality has negative feedback effects on the wider economy because it limits the ability of banks to support the recovery through new lending. This situation raises the possibility of mutually reinforcing crises of government finances and the financial sector. In Tunisia and several other countries, for example, international rating agencies, reacting to the crisis, downgraded both the government’s issuer ratings, as well as the outlook for some of the country’s largest banks. The government–banking sector nexus could also become more precarious because of increases in the relative size of the banking sector, which makes it more difficult for governments to resolve systemwide distress in the event of a crisis.¹²

Governments

In emerging economies, the challenges created by the pandemic go beyond household and firm balance sheets and encompass the financial position of the government. The large fiscal support programs enacted in response to the crisis led to a dramatic increase in government debt, with average debt loads increasing by roughly 7.4 percentage points of GDP since the beginning of the COVID-19 crisis, compared with an average of 1.8 percentage points over the previous decade. This increase in government debt was uneven in several respects (see table 1.1). First, higher-income countries were able to access financing more easily than lower-income countries. Second, upper-middle-income countries relied on international markets to mobilize resources for the crisis response, while, relative to the previous decade, lower-middle-income

Table 1.1 Change in average central government debt stocks, by country income group, 2010–20

Share of GDP (%)

Change in average total debt to GDP ratio	Low-income	Lower-middle-income	Upper-middle-income	High-income	All
Total debt					
Average, 2010–19	2.88	1.82	1.46	1.20	1.84
2020	3.81	6.69	5.55	13.63	7.42
Domestic debt					
Average, 2010–19	0.79	0.59	0.97	-0.30	0.51
2020	0.86	3.04	1.80	9.24	3.73
External debt					
Average, 2010–19	2.09	1.23	0.49	1.41	1.30
2020	3.03	3.66	3.74	4.54	3.74

Source: Barrot 2021.

Note: The table shows the changes in government total, domestic, and external debt stocks for the period 2010–19 and in 2020. GDP = gross domestic product.

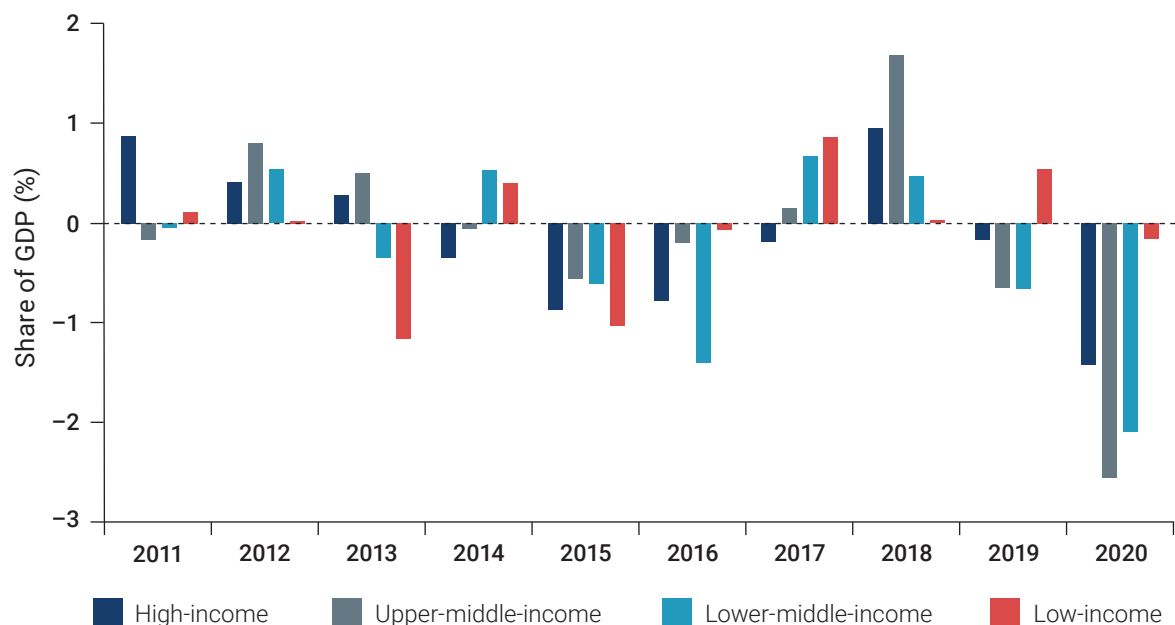
countries relied more heavily on domestic debt. Finally, low-income countries with market access turned mostly to external financing to meet increased funding needs for the response to the pandemic.

In addition to increased global debt loads, other indicators point to latent risks that may endanger the financial position of governments. In 2020, five governments defaulted on their obligations to external private creditors, a worrying increase compared with the norm over the post–World War II period. In the previous decade, an average of two governments defaulted every year. Moreover, more than half of the countries eligible for relief under the G20 Debt Service Suspension Initiative (DSSI) are in debt distress or at high risk of debt distress. These heightened risks at the government level have direct implications for poverty and inequality, as well as for the economic resilience of households and firms. Governments that face dramatically increased debt loads may be unable to finance social safety nets and essential public goods, such as health care and education, and may not be able to mobilize the resources to support households and firms that have been directly affected by the crisis.

The deteriorating financial position of governments will not be easily reversed because it is the combined effect of the fiscal response to the crisis, a dramatic decline in tax revenue (averaging almost 1.5 percent of GDP in 2020), the widespread use of tax forbearance schemes, and, in many emerging economies, the worsening balance sheets of state-owned enterprises. Many countries are counting on a rebound in economic activity and tax revenue to mitigate the economic damage resulting from the pandemic. However, unequal access to vaccines, the need to keep public health measures in place longer than anticipated, and a worsening international economic environment have cast doubt on the prospects for a quick recovery. Following a positive trend in the fiscal position of governments, the onset of the pandemic brought about a dramatic reversal as GDP and tax revenue collapsed, widening primary deficits and undoing much of the progress in revenue mobilization efforts implemented in recent years (figures 1.8 and 1.9).

Limited fiscal resources may require many governments to phase out fiscal support for households and firms and resume revenue mobilization efforts, including tax collection, before incomes and employment have fully rebounded. This effort to raise revenue could put further pressure on household and firm balance sheets and threaten hard-won gains in poverty reduction. Historically, episodes of high

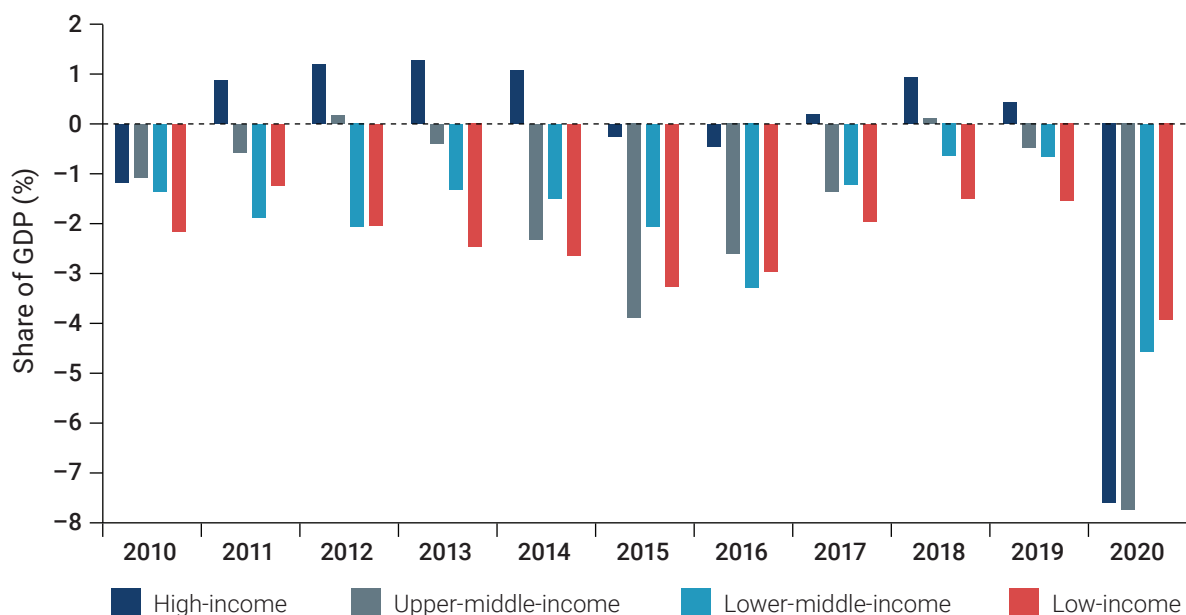
Figure 1.8 Change in average government revenue, by country income group, 2011–20



Source: WDR 2022 team, based on data from IMF (2021b).

Note: The figure shows the difference relative to the prior year in average revenue as a share of the gross domestic product (GDP) for each country group.

Figure 1.9 Average primary government balances, by country income group, 2010–20



Source: WDR 2022 team, based on data from IMF (2021b).

Note: The figure shows the difference relative to the prior year in average primary balance (noninterest revenue minus non-interest expenditures) as a share of the gross domestic product (GDP) for each country group.

fiscal deficits and significant increases in the stock of domestic debt have also been associated with higher inflation, which acts as a highly regressive tax on low incomes and exacerbates the impacts of a crisis on poverty and inequality.

Elevated government risks can also spill over to the financial sector, particularly in low- and middle-income economies. Recent studies have evaluated the potential fallout from rising government debt levels. One study finds that about half of identified episodes of rapid debt accumulation across country groups are associated with financial crises, which tend to be severer than those occurring without the presence of a debt buildup in the public sector.¹³ Another study finds no association between debt buildups and a higher likelihood that high-income economies undergo a financial crisis, but it confirms that debt buildups are associated with worse outcomes in the financial crises that do occur.¹⁴ Increases in government debt are thus potentially associated with a heightened risk of financial crises in emerging economies, and, once they occur, large debt loads pose a significant obstacle to crisis resolution.

Against this backdrop, it is important to note that the fiscal response to the COVID-19 crisis has been significantly financed with domestic debt held by local investors such as banks, pension funds, and other financial institutions, thereby tightening the link between government and financial sector balance sheets. Government risk downgrades thus lead to a direct deterioration of asset quality on the balance sheets of financial institutions and reduce the financial sector's ability to support the recovery. During 2020, one-third of the governments assessed by the three main rating agencies suffered a downgrade in their risk rating.¹⁵ This deterioration can, in turn, require governmental intervention to recapitalize financial institutions and potentially trigger shocks to government budgets through contingent liabilities and further increases in the debt stock.

Recent research on the fiscal costs of contingent liabilities can help to quantify these risks. One study finds that when contingent liabilities materialize (such as when a government needs to rescue a state-owned enterprise or subnational entity), the average fiscal cost is 6 percent of GDP. The fiscal costs are even higher for contingent liabilities in the financial sector, where bailouts can cost as much as 40 percent of GDP.¹⁶ State-owned enterprises, which account for a large share of the corporate revenue base and essential services in many countries, are a source of significant contingent liability risks for governments. For example, in 2018 Angola faced downward pressure on its government credit ratings after an unexpected one-off support payment of \$8 billion (7 percent of GDP) to Sonangol, the national oil company, became necessary.¹⁷ Similarly, Indonesia's largest utility company required a bailout at a cost of 4 percent of GDP to the taxpayer in 1998. In the same way, financial pressures on state-owned enterprises increased considerably during the pandemic. Many of the largest state-owned enterprises, especially in low-income countries, export natural resources, which are vulnerable to the commodity price shocks and exchange rate fluctuations that will occur during the crisis recovery period.

Meanwhile, some COVID-19 crisis response programs have given rise to new contingent liabilities altogether. Many governments extensively used credit guarantee schemes to continue the flow of credit to households and firms during the crisis. Such programs are attractive in the short run because they have no immediate fiscal cost to the government, but they can create significant longer-term risks to government finances if loans covered by the program default. The magnitude of contingent liabilities stemming from credit guarantee schemes is typically difficult to estimate, but it can be substantial, as evidence from past crises illustrates.¹⁸

The global economy

External factors will play an important role in shaping the recovery prospects of emerging economies (box 1.3). The COVID-19 crisis has taken place against the backdrop of a relatively benign economic environment characterized by historically low interest rates globally, which remained low because of

Box 1.3 External factors in the recovery: Will this “taper tantrum” be different?

The link between developments in the global economy and the crisis recovery in emerging economies is well illustrated by the withdrawal of stimulus policies in the United States after the 2007–09 global financial crisis, which triggered an event that would later be known as the “taper tantrum.”

In response to the global financial crisis, the US Federal Reserve enacted in 2008 a massive monetary policy stimulus. The stimulus relied largely on quantitative easing, a form of unconventional monetary policy in which the central bank purchases securities on the open market to increase the money supply and keep interest rates low. In 2013, the Fed contemplated winding down the program, and Federal Reserve chairman Ben Bernanke hinted at the Fed’s intentions in a hearing before Congress.

This statement had an immediate effect on emerging markets, including Brazil, India, Indonesia, South Africa, and Turkey (known as the “fragile five”). Stock prices fell, bond yields rose sharply, and exchange rates depreciated significantly. The fragile five were hit the hardest because their economies shared some important vulnerabilities: large current account deficits financed with a high share of liquid portfolio investments rather than foreign direct investment, large capital inflows, and a sharp appreciation in exchange rates while the US stimulus was in place.^a

In Indonesia, one of the most severely affected emerging markets, the taper tantrum reversed economic trends (figure B1.3.1). Faced with pressure in financial markets, Indonesia’s government and central bank pursued a “stabilization over growth” approach to reducing the current account deficit. Among other measures, the government cut fuel subsidies, a large item in the national budget. As a result, the cost of fuel increased by an average of 40 percent. The central bank raised the base rate by 175 basis points and allowed the Indonesian rupiah to depreciate. These classical expenditure-reducing and expenditure-switching policies successfully stabilized the economy in a relatively short time. Net capital inflows turned positive again in early 2014, less than a year after the onset of the taper tantrum.

In the aftermath of the COVID-19 crisis, emerging economies are likely to face a very similar

scenario. As stimulus policies in advanced economies are scaled back, interest rates will increase, leading to an exit of portfolio investment, exchange rate depreciation, and refinancing problems for firms and governments. However, because of the lack of economic growth, it is unlikely that the same recipe applied to the taper tantrum can be applied in the aftermath of the COVID-19 crisis. In 2012, the Indonesian economy grew at 6.2 percent. By contrast, in 2020 the economy shrank by 2.1 percent. Tightening fiscal and monetary policy in this scenario threatens newly recovering economic growth. Economic stabilization when growth is low is not a good option.

At the same time, the risk of recurring taper tantrums seems lower than in 2013: Indonesia experienced large capital outflows at the beginning of the crisis, making it less vulnerable to capital flight than in 2013.^b In addition, the crisis led to a decline in production and investment. Because more than 90 percent of Indonesia’s imports consists of raw materials and capital goods, imports have sharply fallen, resulting in a much smaller current account deficit than in 2012–13. Since the taper tantrum, several other emerging markets, such as India, have also markedly improved their external vulnerability indicators, such as the short-term debt to GDP ratio and the current account to GDP ratio.

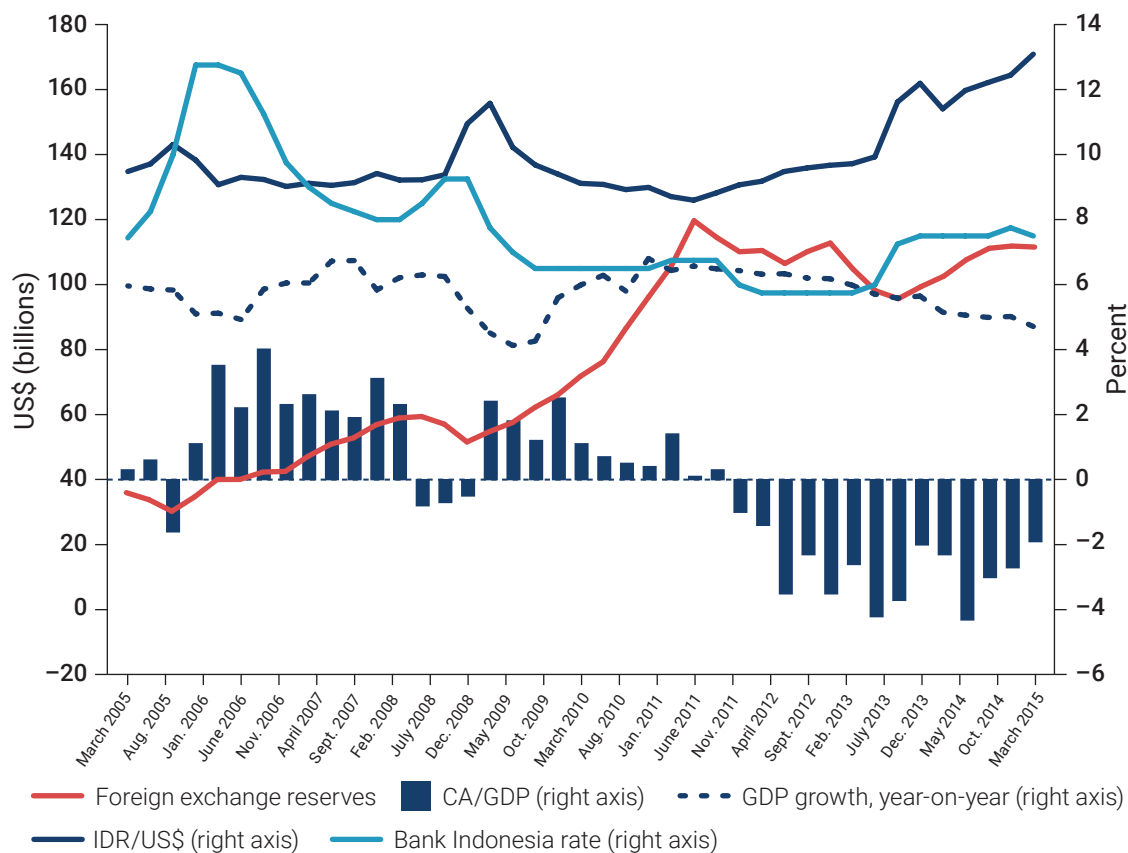
Still, several issues must be anticipated. The pandemic has disrupted economic activity, increasing the risk of nonperforming loans (NPLs). To assist businesses and the financial sector, Indonesia has relaxed credit through regulatory forbearance, which may mask the true extent of NPLs. The withdrawal of the stimulus in high-income economies will also increase risks for highly leveraged companies that are exposed to exchange rate risks and “rollover risk” (the risk that a firm cannot refinance short-term debt at higher interest rates). As in other emerging economies, this is especially true for state-owned enterprises, and it increases the risk of contingent liabilities for the government.

In addition, increases in the federal funds rate will create a dilemma for central banks in emerging economies, such as Bank Indonesia. On the one

(Box continues next page)

Box 1.3 External factors in the recovery: Will this “taper tantrum” be different? (continued)

Figure B1.3.1 Impacts of the “taper tantrum” on the Indonesian economy, 2005–15



Source: Basri 2017, based on data from Economist Intelligence Unit and Bank Indonesia.

Note: The figure shows the growth of GDP, the Bank Indonesia reference rate, the Indonesian rupiah to US dollar exchange rate, and currency reserves in the Indonesian central bank from 2005 to 2015. CA/GDP = current account/gross domestic product; IDR = Indonesian rupiah.

hand, if banks do not follow the US Federal Reserve in raising interest rates, there is a risk of depreciation of the local currency from capital outflows. On the other hand, if interest rates increase, the risk of insolvencies will increase, disrupting the recovery. The Indonesian government plans to return to the

budget deficit limit of 3 percent in 2023. It must do so cautiously, however, because the combination of concurrent fiscal and monetary tightening poses a risk to the recovery. The timing of the stimulus withdrawal is crucial and must be based on economic developments.

- a. In several countries such as Brazil, China, India, Indonesia, Mexico, and Turkey, the capital inflow was greater than the absorption capacity of their national economies (Sahay et al. 2014).
- b. The share of foreign holders of Indonesian government bonds fell from 32 percent in April 2020 to 23 percent at the end of May 2021.

the massive monetary policy response to the pandemic. As the economic recovery proceeds and stimulus measures are gradually withdrawn in advanced economies, interest rates will rise. This increase could threaten the solvency of firms, financial institutions, and governments in emerging economies that have benefited from short-term financing at low interest rates and will face higher refinancing costs going forward. Rising interest rates in high-income economies will also put pressure on the currencies of emerging economies, which increases the financial burdens faced by firms, financial institutions, and governments that have debt denominated in a foreign currency.

In addition to a less benign interest rate environment, the recovery in emerging economies will also be affected by the lower growth of the world economy. In the aftermath of the global financial crisis, low-income economies were only moderately affected, largely due to robust growth in important emerging markets, particularly China, which accounts for a sizable share of bilateral lending and direct investment in low-income economies. By contrast, the economic effects of the COVID-19 crisis have been felt globally, and lower economic growth in China and other emerging markets could affect low-income countries through several channels, including commodity prices and a reduction in bilateral lending and direct investment.

Conclusion

Although the immediate crisis response, which included extensive efforts to provide households and firms with liquidity, was essential to mitigate the hardships caused by income losses from the pandemic, few governments have the resources to sustain these programs until economic activity has fully recovered. This gives rise to the possibility that risk spillovers among the household, firm, financial, and government sectors of the economy will aggravate preexisting economic fragilities and pose a threat to an equitable recovery. Interconnected risks to the recovery are a concern, especially in emerging economies where such fragilities were already more pronounced at the onset of the pandemic.

Well-designed fiscal, monetary, and financial sector policies can help reduce these risks and prevent them from affecting the wider economy. The following chapters explore the primary risks that affect each of the main sectors of the economy and propose policies that can counteract these risks with the goal of supporting an equitable recovery.

Beginning with the concern that many households and firms will continue to face income losses resulting in loan defaults once debt moratoria are lifted, chapter 2 turns to the risk to the financial sector posed by uncertainty about the true extent of credit risk and the quality of assets on the balance sheets of financial institutions. The chapter examines the steps regulators can take to proactively increase transparency about credit risk and deal with distressed assets and, if necessary, troubled banks. Chapter 3 takes a closer look at how the establishment and reform of insolvency frameworks can help the recovery by allowing private sector borrowers to reduce their debts to sustainable levels. Chapter 4 then explores how financial institutions can continue to provide credit to households and firms through the recovery. It focuses on approaches to managing and mitigating risks in the face of heightened economic uncertainty, which limits the ability of lenders to form an accurate assessment of credit risk and reduces the recourse they have in the event of default. Chapter 5 discusses the risks posed by the dramatic increase in levels of government debt and describes policies that can improve debt management and avoid debt distress. Chapter 6 concludes the Report by outlining policy priorities for the recovery.

Notes

1. Stiglitz and Weiss (1981).
2. Acharya, Drechsler, and Schnabl (2014); Brunnermeier et al. (2016); Gennaioli, Martin, and Rossi (2014).
3. Feyen and Zuccardi Huertas (2019); Laeven and Valencia (2018); Reinhart and Rogoff (2009, 2011).
4. Regulation often forces banks to hold government bonds. In Ethiopia, banks must invest 27 percent of their loan portfolio in government bonds. Emergency measures of this kind were also introduced in response to the COVID-19 crisis. For example, in Ethiopia commercial banks were mandated to invest annually at least 1 percent of their loan portfolio in bonds issued by the National Bank of Ethiopia (NBE 2021), and insurance companies were required to invest at least 40 percent of their assets in treasury bills (Tadesse 2020).
5. Farhi and Tirole (2018).
6. Acharya, Mehran, and Thakor (2016).
7. UNCTAD (2019).
8. See, for example, World Bank (2021a).
9. Bosio et al. (2020); IMF (2019, 2020).
10. Bosio, Ramalho, and Reinhart (2021).
11. Breza and Kinnan (2021).
12. Feyen and Zuccardi Huertas (2019).
13. Koh et al. (2020).
14. Jordà, Schularick, and Taylor (2016).
15. Based on Reinhart (2021) and Standard & Poor's, Moody's, and Fitch ratings, 51 countries—among them 44 middle-income and 4 low-income countries—suffered a downgrade in 2020 of their sovereign risk rating. See Trading Economics, Credit Rating (database), <https://tradingeconomics.com/country-list/rating>.
16. Bova et al. (2016).
17. Moody's Investors Service (2019).
18. In the United Kingdom, for example, the Office of Budget Responsibility estimates that up to 40 percent of participants in one of its most popular guarantee programs, the Bounce Back Loans Scheme, may default (Browning 2021). Also see IMF (2021a).

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