INTERNATIONAL MONETARY FUND

STAFF NOTE FOR THE G20

A GUIDING FRAMEWORK FOR STRUCTURAL REFORMS

March 2016

EXECUTIVE SUMMARY

This note responds to a request from the G20 for IMF assistance in helping develop priorities and guiding principles for structural reforms. Structural reforms have long been a central element of the G20's strategy of achieving job-rich growth, and G20 countries have made over 1,000 structural policy commitments in their national growth strategies. However, implementation of these commitments has been relatively weak so far. Faster progress on structural reforms is therefore needed to support growth in the near term and bolster potential growth in the medium term—and more generally to make economies more innovative, flexible, and resilient.

The design and choice of structural reforms will need to reflect the macroeconomic environment. How best to prioritize amongst structural reforms will depend critically on each country's macroeconomic conditions, as the interplay between demand and supply policies will impact both policies' effectiveness. For example, demand support can increase the effectiveness of structural reforms, either by bringing forward their long-term gains or by alleviating their short-run costs. This effect may be particularly important under weak macroeconomic conditions. And structural reforms in turn can make demand policies more effective, by enhancing the flexibility of the price mechanism.

This paper presents a conceptual framework for structural reforms, as a tool for policymakers to use when prioritizing amongst reform measures. At the country level, the starting point for identifying reform priorities should be an assessment of the country's structural policy gaps, as this will indicate where reforms are likely to have the largest pay-offs in terms of boosting growth. Generally, this assessment will leave policymakers with a wide array of potential reforms.

A crucial next step is to take into account the macroeconomic circumstances under which reforms are being carried out. Three dimensions are particularly relevant:

- **Income level**. Countries should generally prioritize structural reforms in areas that have been identified as having a high pay-off for their respective level of economic and financial development. For example, for emerging market economies, the largest productivity payoffs are associated with reforms that improve market functioning, while for advanced economies, higher priority should be given to reforms that facilitate technological progress.

- **Position in the economic cycle**. The larger a country's output gap, the more it should prioritize structural reforms that will support growth in the short and the longer term—such as infrastructure investment, given the larger fiscal multipliers in times of economic slack.

- **Resource space to finance reform.** A country's resource envelope will play an important role in determining whether—and if so, how—to implement structural reforms. Where budget constraints are binding, the sequencing of reforms might have to be adjusted to favor lower- or no-cost measures with positive demand effects of their own, or budget-neutral reform packages. In contrast, where there is fiscal space, available resources should be used to offset any short-term costs of growth-friendly structural reforms.

The conceptual framework set out in this paper would suggest, for example, that:

- **Advanced economies with some macroeconomic policy space and output around potential** may prioritize reforms based on their long-term payoffs. For example, countries that suffer a productivity gap and at the same time have comparatively low public R&D spending and/or an infrastructure shortfall may consider using available resource space to finance reforms in these areas. Similarly, reforming tight employment protection legislation alongside stepped-up active labor market policies to support displaced workers can yield long-term gains in growth while limiting the short-term impact on output.
- **Advanced economies with limited budgetary room and output below potential** may prioritize reforms that not only yield large long-term payoffs but also deliver short-term gains and/or can be implemented in a budget-neutral fashion. Product market deregulation (e.g., reductions in barriers to entry in some service sectors) can be a prime candidate in this situation; it can raise investment, employment and output already in the short-term, and does not generally involve upfront fiscal costs. Similarly, tax simplification and broadening measures can reduce inefficiencies, generating revenues to finance other high pay-off (but costly) reforms.
- **Emerging market economies with limited policy space and output below potential** may also prioritize reforms that not only yield large long-term payoffs but also deliver short-term gains and/or can be implemented in a budget neutral fashion. For example, financial liberalization can support consumption and investment by relaxing credit constraints and reducing barriers to FDI can give a quick boost to investment and productivity, while improving land acquisition laws can stimulate private spending on infrastructure.

CONTENTS

INTRODUCTION[1]

1. **This note responds to a request from the G20 for IMF assistance in helping develop priorities and guiding principles for structural reforms**. Against the background of a weakening recovery and slowing potential growth, it has become even more urgent for G20 countries to reinvigorate their commitment to ambitious structural reforms. This note presents a framework to identify and prioritize structural reforms, taking into account country differences. The framework brings together the identification of policy gaps in the structural area, with an assessment of the macroeconomic environment in which structural reforms might be implemented, including countries' income level, cyclical position, and available macroeconomic policy space. As a rule, securing higher, stable, and sustainable growth will require a well-designed mix of mutually reinforcing supply and demand policies.

BACKGROUND AND POLICY CONTEXT

2. **The global recovery has weakened further and the global economy is highly vulnerable to adverse shocks.** Activity softened towards the end of 2015 and the likelihood of a further downgrade of the outlook has increased. Against a background of heightened financial market volatility and concerns about the lack of policy space, financial conditions have tightened, especially for emerging market economies. This adds to existing concerns about the global impact of demand rebalancing in China and the impact of falling commodity prices on emerging markets, as well as non-economic risks such as the refugee surge in Europe or a possible exit of the U.K. from the European Union.

3. **The further weakening in economic activity comes at a time of declining potential output growth**. In many advanced economies this decline started as far back as the early 2000s and accelerated with the impact of the Great Recession on investment and employment. Potential growth has also weakened in emerging economies since the crisis, due to lower growth of total factor productivity and of investment.

4. **The fragile conjuncture increases the urgency of a broad-based policy response that strengthens growth and manages vulnerabilities**. In advanced economies, this requires a mix of mutually reinforcing demand and supply policies, including continued accommodative monetary policy and supportive fiscal policies—making the best possible use of fiscal space (for example, through infrastructure spending) where it exists and ensuring a strong medium-term fiscal framework is in place. In emerging market economies, it requires reducing vulnerabilities and

[1] Prepared by an IMF staff team comprising Astou Diouf, David Furceri, Hajime Takizawa, and Evridiki Tsounta, led by Helge Berger, Romain Duval, and Andrea Richter Hume.

rebuilding resilience—for example, by strengthening fiscal buffers and diversifying growth in commodity-exporting countries. Reinvigorated structural reforms are a critical element of the necessary policy package.

THE G20'S COMMITMENT TO STRUCTURAL REFORMS

5. **Structural reforms have been central to the G20's strategy of achieving strong, sustainable, and balanced growth and creating jobs** (Box 1)**.** Commitments in the areas of structural policies have been a critical element of successive G20 Action Plans. In 2014, G20 leaders endorsed the Comprehensive Growth Strategies—with over 1,000 structural policy commitments—at the Brisbane Summit. Updated growth strategies, with additional structural policies, were then endorsed at the Antalya Summit in 2015.

Box 1. G20 Commitments to Structural Reforms

In 2009, leaders committed at Pittsburgh to make decisive progress on structural reforms that foster private demand and strengthen long-run growth potential. They also launched the Framework for Strong, Sustainable, and Balanced Growth, a vehicle for the G20 to set out its objectives, put forward policies to achieve these objectives, and together assess their progress. Subsequent G20 summits reinforced the importance of structural reforms to achieving their goals.

At the 2014 Brisbane Summit, leaders pledged to step up their efforts. Against a background of moderate global growth, they re-affirmed that addressing supply constraints would be key to lifting potential growth. Leaders committed to growth strategies that by 2018 would lift their GDP by more than 2 percent above the baseline trajectory. Countries' strategies focused on four broad areas: product and labor market reforms, investment in public infrastructure, tax reforms, and innovation policies. These would be in addition to stimulating demand in the short-term.

Implementation of countries' individual growth strategies has been a key priority since the Brisbane Summit. At the Antalya Summit in November 2015, analysis by the IMF, OECD and the World Bank Group indicated that implementation so far represented more than one third of the collective growth ambition. Leaders acknowledged that more needed to be done, and committed to take prompt action to expedite implementation of the remaining commitments, which they would continue to monitor closely through the robust framework developed in 2015. Reflecting their determination to overcome global economic challenges, they also adopted the Antalya Action Plan, comprising adjusted growth strategies and implementation schedules for key commitments.

6. **At their Shanghai meeting in February 2016, Finance Ministers and Central Bank Governors reaffirmed the role of mutually-reinforcing macroeconomic and structural policies.** Reflecting on the relatively weak implementation of structural reforms so far and disappointing economic growth, they noted that faster progress on structural reforms should bolster potential

growth in the medium term, and make their economies more innovative, flexible, and resilient. To this end, they committed to identifying three high impact measures as their key commitments for delivering stronger growth.

PLACING STRUCTURAL REFORMS INTO A COMPREHENSIVE POLICY CONTEXT

7. **Structural reforms should be considered within the broader macroeconomic context to maximize their impact within the larger growth-enhancing strategy.** Specifically, the design of structural reforms should take into account their short-term impact on demand. While some types of reforms tend to support short-term growth, others do not, possibly adding to a shortfall in domestic demand. This could further weaken potential output due to hysteresis effects, which, in turn, can depress expected future income and firms' profitability, thereby reducing consumption and investment today. Mutually reinforcing demand and supply policy actions are therefore essential to address these near and medium term challenges.

A. Demand policies also affect supply

8. **While structural reforms are key to lifting output in the medium and long term, demand side polices can mitigate hysteresis effects.** Monetary policy should remain accommodative where inflation is too low relative to central bank targets. In addition, where fiscal space is available, fiscal stimulus should be implemented, focusing on boosting future productive capacity. By supporting demand and helping to close output gaps, fiscal support can bolster private-sector investment through accelerator effects, boost employment, and reduce long-term unemployment and skill-loss in the labor market. Investing in public infrastructure is especially helpful, as it directly lifts not only short-term output, but also long-term output and private sector productivity.[2] Where public debt is high or financing conditions unfavorable, commitments to credible medium-term consolidation plans can create policy space. And where fiscal consolidation is necessary, it should remain growth-friendly, fostering innovation and productivity while protecting the most vulnerable.

B. Structural reforms also affect demand in the short term

9. **In addition to raising potential output, structural reforms can also support growth in the short term.** Structural reforms help raise potential output by increasing employment, investment, and total factor productivity over the medium term. However, structural reforms can

[2] *World Economic Outlook*, October 2014, Chapter 3.

also stimulate consumption and investment today, either directly or by improving expectations about future income and corporate profitability. For example, product market reforms aimed at reducing barriers to firm entry—for instance, in certain network industries, or in retail trade and professional services—can boost private investment and hiring as new firms expand. Similarly, reforms that entail fiscal spending—including those that raise infrastructure investment, reduce labor tax wedges, or increase public expenditure on active labor market policies—would directly boost output and employment in the short term. While such measures are effective when implemented in a budget-neutral way (for example, as part of broad reforms of tax and spending policies) their short-term impact will be amplified if they are accompanied by a fiscal stimulus on net.

C. Interaction between structural reforms and demand policies

10. **Structural reforms can make demand policies more effective.** An important example is structural reforms that address imperfections in the financial sector. In addition, reforms that increase the responsiveness of wages and prices to business conditions can promote microeconomic efficiency while enhancing economic resilience, by strengthening the ability of macroeconomic policies to smooth economies' response to shocks.

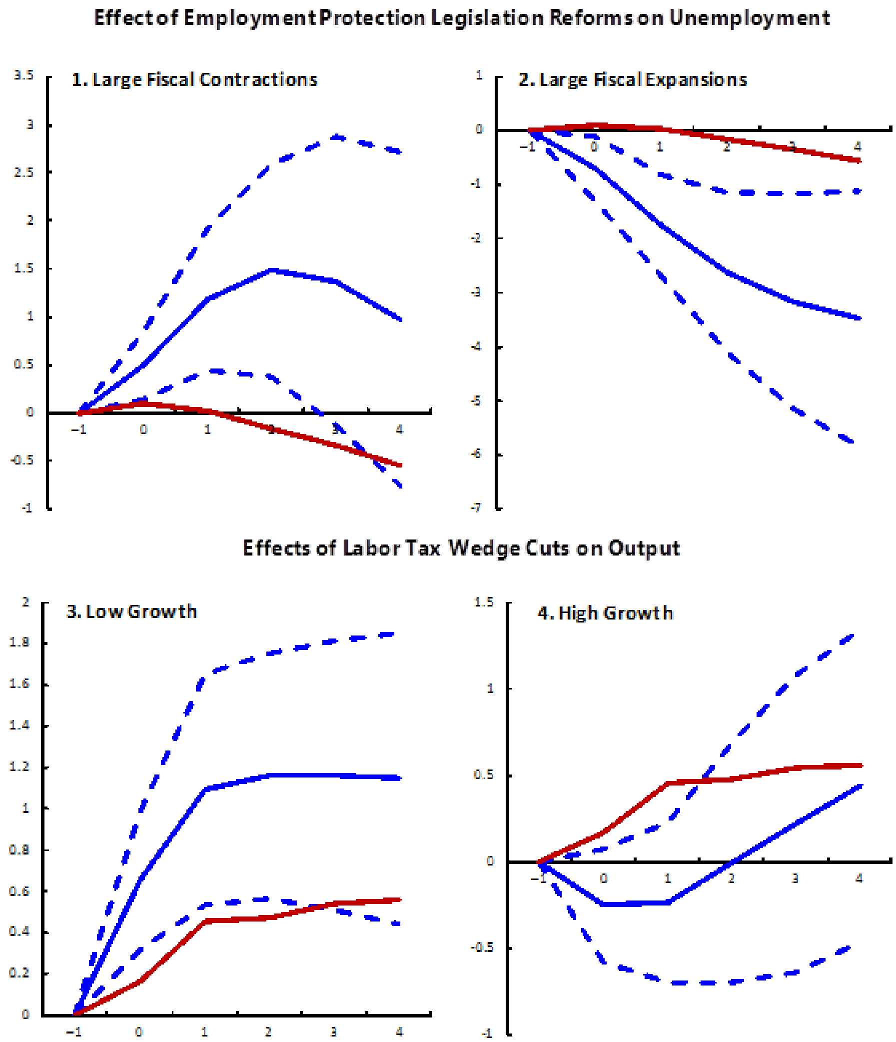
11. **However, some reforms entail transitory costs, especially when macroeconomic conditions are weak**. For example, new IMF analysis suggests that looser employment-protection legislation may increase unemployment in the short term when current and expected future growth are low—while the incentives for incumbent firms to recruit are increased given looser employment protection, firms' willingness to recruit, and of new firms to enter the market, are reduced given the economic climate. Furthermore, some structural reforms may result in slower wage and price growth, which could lower expected inflation and can increase the real interest rate, especially where monetary policy is operating at the zero lower bound.

12. **This suggests that demand policies can play a critical role in enhancing the benefits of structural reforms**. While the rationale for structural reforms does not depend on the availability of demand policies, in some cases, demand policies can help bring forward the long-term gains of structural reforms. In other cases, they may alleviate their short-run costs, particularly under weak macroeconomic conditions. Demand policies will generally involve all standard tools; however, depending on country circumstances, the availability of monetary and fiscal policy might depend on the available policy space. Specifically, there are two inter-related, but conceptually distinct, channels through which accommodative macroeconomic policies can increase the short-term impact of structural reforms on output and employment:

- **Amplifying structural reform effects**. By improving overall business conditions, macroeconomic policy stimulus improves the incentives of firms and workers to respond positively to structural reforms. For example, new IMF research finds that the employment gains from reducing excess job protection will be larger when accompanied by fiscal expansion (Figure 1, upper panel). Thus, the benefit of implementing structural reforms and demand support together exceeds the sum of the benefits from implementing them separately, as firms are more willing to recruit new employees (and retain those already employed). Likewise, workers may be less likely to reduce their consumption in response to a cut in unemployment benefits when there is fiscal stimulus. There is also some tentative evidence that fiscal policy support accelerates the entry of new firms when entry barriers are lowered.

- **Larger payoffs for structural reforms that entail additional fiscal support.** New IMF research suggests that reforms such as reductions in labor tax wedges and increases in public spending on active labor market policies have larger positive effects during periods of low growth and when not accompanied by offsetting spending cuts or tax increases (Figure 1, lower panel). This is because such reforms entail a fiscal multiplier effect, which in general tends to be larger in bad times, when output gaps are large.

Figure 1. Impact of Selected Reforms under Alternative Macroeconomic Conditions and Policies



Source: IMF Staff analysis.

Note: t=0 is the year of the reform shock—major historical reform of employment protection legislation (upper two charts) and a one percentage point change in the labor tax wedge (lower two charts), respectively. Solid blue lines denote the estimated response to the shock, and dashed blue lines denote 90 percent confidence intervals. The solid red line shows the unconditional result, i.e. the average estimated impact across fiscal and growth regimes, respectively. Both the fiscal regime (fiscal expansion vs. contraction) and the growth regime (high vs. low growth) are defined using a smooth transition function as in Auerbach and Gorodnichenko (2012): $F(z_{it}) = \frac{\exp(-\gamma z_{it})}{1+\exp(-\gamma z_{it})}$, $\gamma > 0$, in which z is an indicator of the stance of fiscal policy or the state of the economy normalized to have zero mean and unit variance. The indicator of the stance of fiscal policy is a government consumption shock, identified as the forecast error of government consumption expenditure relative to GDP (see e.g., Auerbach and Gorodnichenko 2012 and 2013; Abiad, Furceri and Topalova 2015). The indicator of the state of the economy is GDP growth. The charts show estimated impulse responses for hypothetical very large and very low values of the smooth transition function.

A CONCEPTUAL FRAMEWORK FOR PRIORITIZING STRUCTURAL REFORMS

13. **The prioritization of reform options starts with the assessment of each country's structural policy gaps**. This will generally leave policymakers with a wide array of potential reforms, drawn from the priority areas and affecting growth through total factor productivity, capital, employment, or the capacity to adjust. For example, in countries with weak or declining productivity growth relative to best-performing countries, potential reforms could be aimed at increasing competition in domestic and external markets as well as policies that promote innovation and technology diffusion. Similarly, in countries with weak employment performance, labor market reforms as well as policies to increase labor market participation of underrepresented groups could be considered. Policymakers can draw on several sources for input on where their performance gaps are largest. The assessments undertaken by the OECD in the context of its "Going for Growth" framework would be particularly useful to identify where the performance gaps may be most significant.

14. **A crucial next step is to take into account the macroeconomic environment**. The previous discussion and ongoing analytical work undertaken by the IMF suggests a framework to help policymakers select and sequence their reform agenda, taking into account the large diversity of individual country experiences. The framework includes three macroeconomic dimensions: (i) a country's income level, (ii) its position in the economic cycle, and (iii) its resource space to finance reform.

15. **A first dimension is the country's *income level*.** Countries should generally prioritize structural reforms in areas that have been identified as having a high pay-off for their respective level of economic and financial development. IMF research[3] finds that some structural reforms have the potential for large payoffs in both advanced and emerging markets—for example, infrastructure and banking sector reforms, as well as fiscal reforms aimed at strengthening tax administration and improving spending efficiency. However, the specifics can differ between different country income groupings, and the nature and effect of many other reforms can vary significantly depending on the level of economic development (Figure 2):

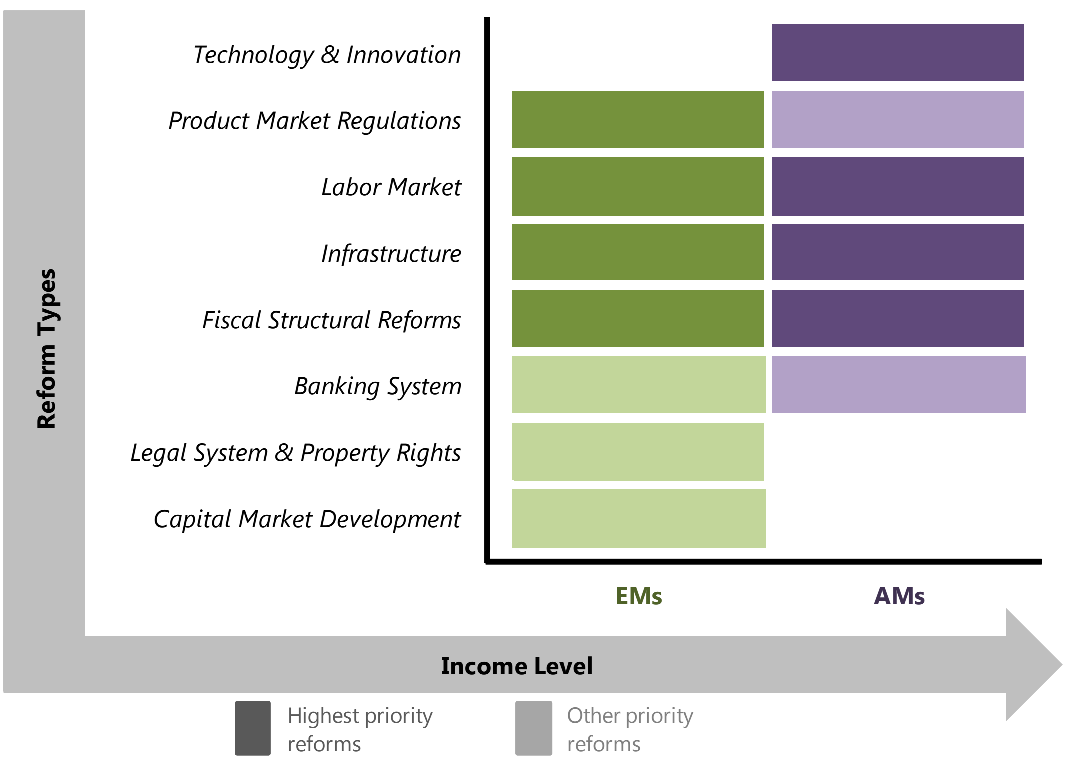
- For *emerging market economies,* the largest productivity payoffs are associated with reforms that improve market functioning—in particular, those that focus on business regulations, labor markets, and infrastructure. Capital market development also has the potential to

[3] "Structural Reforms and Macroeconomic Performance–Initial Considerations for the Fund", September 2015.

deliver significant benefits, especially in countries with weak legal systems and property rights.

- For *advanced economies*, higher priority should be given to reforms geared toward supporting technological progress. Labor and product market reforms, as well as innovation, appear to have the greatest productivity payoffs, particularly for economies closest to the technology frontier.

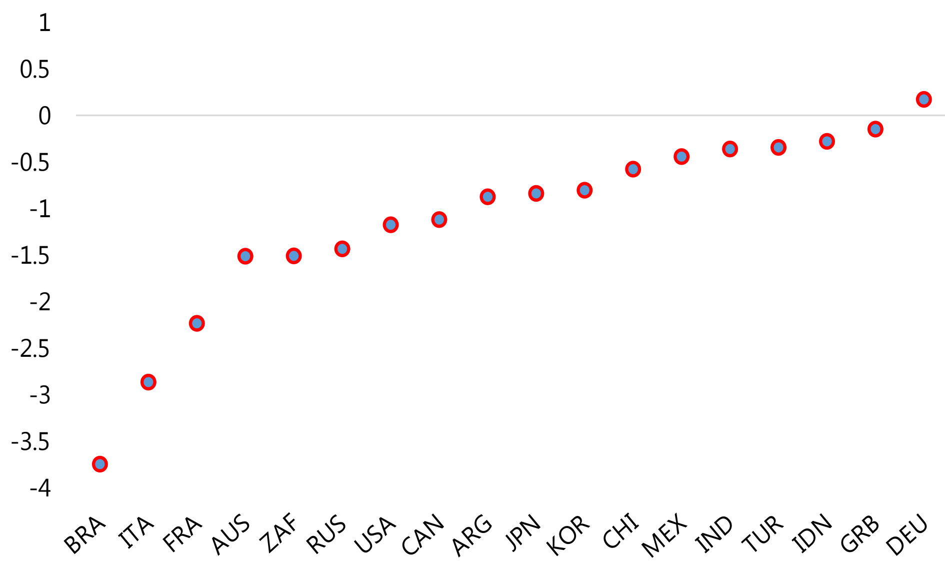
Figure 2. Structural Reforms with the Highest Productivity Payoffs Within Each Country Group



Note: Comparisons ***across*** reforms ***within*** each country group. Darker shades imply larger gains from reforms.

16. **A second dimension is the country's *position in the economic cycle*.** The larger a country's output gap (Figure 3), the more it should prioritize structural reforms that will support growth both in the short and the longer term—for example, eliminating labor tax wedges and increasing spending on active labor market policies or infrastructure investment. Such measures also tend to have higher fiscal multipliers in times of large economic slack.

Figure 3. 2016 Output Gap
(In percent of potential GDP)



Source: WEO January 2016 Update

17. **A third dimension is the country's *resource space for reform*.** A country's resource envelope will play an important role in determining whether—and if so, how—to implement certain structural reforms. Where budget constraints are binding, the sequencing of reforms might have to be adjusted to favor lower- or no-cost measures with positive demand effects of their own (e.g., reducing product market entry barriers), or budget-neutral reform packages (e.g., an increase in infrastructure spending financed by a reduction in energy subsidies). Moreover, the absence of fiscal space for demand support will make it less attractive to implement reforms with possible negative short-term growth effects, especially in times of economic slack (see below). Where such reforms are necessary and cannot be delayed, but budget constraints are binding and other macroeconomic policy tools (e.g., monetary policy) are not available, it will be important to form realistic expectations about the time required for these reforms to have a positive impact on growth.

18. **Where there are tradeoffs between growth—the core focus of the proposed framework—and other public policy objectives, policy choices will also be shaped by each country's societal preferences**. For example, a given performance gap can sometimes be addressed through alternative policy options, whose implications for other policy objectives may differ. For example, both the Anglo-Saxon and the Nordic "flexicurity" approaches have been

successful in achieving high and stable employment. But they are based on different labor market policies, with different implications for inequality.

APPLICATION OF THE CONCEPTUAL FRAMEWORK

19. **How would the conceptual framework described above be applied?** The framework suggests that the macroeconomic circumstances of countries can differ along three key categories, including their income level (advanced or emerging economy), cyclical position (below or around/above potential), and policy space (available or limited). The examples below seek to explain how the framework might be applied, in principle, in the following cases: (i) an advanced economy with some policy space and output around potential; (ii) an advanced economy with little policy space and output below potential; and (iii) an emerging economy with little policy space and output below potential.

Example 1: Advanced economy with some policy space and output around potential

20. **Advanced economies with some policy space and output around potential may prioritize reforms based on their long-term pay-offs.** In turn, these pay-offs will be country-specific and will depend both on the relative importance of each potential area for growth in general (e.g., product market regulations vs. infrastructure) and the country's scope for reform in each area (e.g., whether the country's policy settings are more distant from best practice in the area of product market regulation or in infrastructure). For example, countries that suffer a productivity gap and at the same time have comparatively low R&D spending, stringent product market regulation in services, tight employment protection legislation and/or an infrastructure shortfall, may consider reforms in these areas, prioritizing those that can deliver the largest output gains over the medium term.

Example 2: Advanced economy with little policy space and output below potential

21. **Advanced economies with limited budgetary room and output below potential may prioritize reforms that do not only yield large long-term pay-offs but also deliver short-term gains and/or can be implemented in a budget-neutral fashion.** Product market deregulation (e.g., reductions in barriers to entry in some service sectors) can be a prime candidate in this situation: it can raise investment, employment and output already in the short-term, and does not generally involve upfront fiscal costs. Tax simplification and broadening measures can reduce inefficiencies, generating revenues to finance other high pay-off (but costly) reforms such as tax reductions or increased spending on active labor market policies, childcare facilities, infrastructure or education. Well-designed pension reform can also free up fiscal space without harming the economy in the near term—unlike, for example, unemployment benefit or employment protection legislation reforms which can entail short-term costs if carried out under weak macroeconomic conditions and without demand policy support.

Example 3: Emerging economy with little policy space and output below potential

22. **Emerging market economies with limited policy space and output below potential may also prioritize reforms that do not only yield large long-term pay-offs but also deliver short-term gains and/or can be implemented in a budget-neutral fashion.** Some major reforms can be achieved through legislative changes at little or no fiscal cost. For example, financial liberalization can support consumption and investment by relaxing credit constraints. Reducing barriers to FDI, where these are particularly stringent, can give a quick boost to investment and productivity. Improving land acquisition laws and procedures can stimulate private spending on infrastructure. Reforms that entail upfront fiscal costs, such as increased public spending on infrastructure and education or scaling up social protection, can still be prioritized, but should be implemented as part of broad packages that include cost-saving reforms such as cuts in inefficient subsidies or tax base broadening.

NEXT STEPS

23. **The conceptual framework set out above may be useful to policymakers when considering their structural reform agenda.** This guidance may be particularly timely, given the G20's commitment to reinvigorate their growth strategies. It may also serve as a useful tool for the peer review framework.

24. **As G20 countries review their structural reform commitments and potentially seek to identify new ones, they can also draw on the advice of international institutions.** The IMF identifies macro-critical structural reforms in its Article IV staff reports. The OECD highlights reforms with the greatest productivity pay-offs in its "Going for Growth" recommendations. While there is considerable overlap of reform recommendations and commitments in most cases, there are also areas of divergence, including from the priorities that have been set out by G20 countries themselves. The conceptual framework discussed above can facilitate the prioritization of structural reforms also in this context. The IMF stands ready to contribute to this effort, together with other international organizations.