

1. Managing the Upswing in Uncertain Times

Economic Activity Continues to Firm Up

Europe continues to enjoy a strong growth spurt. Growth has firmed up in many European economies, including all the major ones except the *United Kingdom*. Also, activity has broadened: for the first time since the global financial crisis all economies are growing. Real GDP increased by 2.8 percent in 2017, up from 1.8 percent in 2016. The expansion is largely driven by domestic demand (Figure 1.1, panel 1), initially mainly by vibrant private consumption but now also by investment (Figure 1.1, panel 3; Box 1.1).

- *Advanced European economies* grew by 2.4 percent in 2017, up from 1.9 percent in 2016 (Figure 1.1, panel 2). The upward revision of 0.2 percentage point since the November 2017 *Regional Economic Outlook: Europe* is due to higher-than-expected net exports growth (Figure 1.1, panel 4).
- In the *euro area*, quarterly growth has been positive for the last 19 quarters, and annual growth in 2017 reached 2.3 percent, up from 1.8 percent in 2016. The recovery is broad-based across countries and sectors, with a positive feedback loop between jobs, consumption, and investment. Moderate but sustained rises in wages and real disposable income and recovering asset prices are boosting household incomes and wealth. In *Germany*, household consumption grew by 2.1 percent in 2017, the largest increase since 2000. Business investment is being spurred by strong demand on the back of

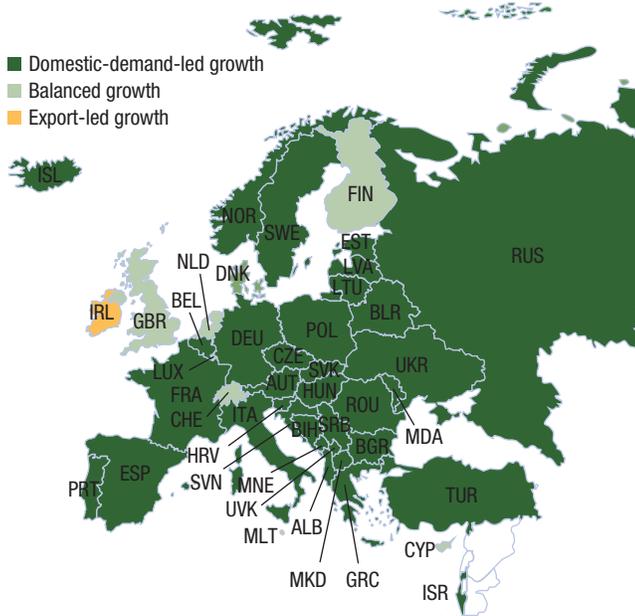
high capacity utilization, accommodative financing conditions, and gradually rising corporate profitability.

- *Nordic economies* expanded by 2.2 percent in 2017, broadly the same as in 2016. *Sweden* enjoyed robust growth, with unemployment declining to near precrisis low levels. However, weaker-than-forecast net exports in the second half of 2017 resulted in a downward revision of growth to 2.4 percent in 2017, from 3.1 percent in the November 2017 *Regional Economic Outlook: Europe*. *Norway's* economy accelerated to 1.8 percent in 2017 from 1.1 percent in 2016, supported by the recovery of business investment, stronger consumer spending, and higher oil prices.
- Growth in *other advanced European economies* was largely unchanged at 2 percent in 2017. In the *United Kingdom*, GDP growth slowed to 1.7 percent in 2017. Domestic demand is being held back by slower real income growth following the sharp depreciation of the pound as well as Brexit-related uncertainties that held back investment. However, favorable foreign demand and a cheaper pound led to a rise in exports of goods and services. In contrast, economic activity in the *Czech Republic* surged to 4.3 percent in 2017, due to strong private demand and increased absorption of the new round of EU Structural and Investment Funds (Figure 1.2).
- In most of *emerging Europe*, the strong cyclical upswing that took hold several years ago continued. The region more than doubled its annual real GDP growth rate to 3.7 percent in 2017, from 1.6 percent in 2016, a six-year high. The actual growth exceeded already strong projections in the November 2017 *Regional Economic Outlook:*

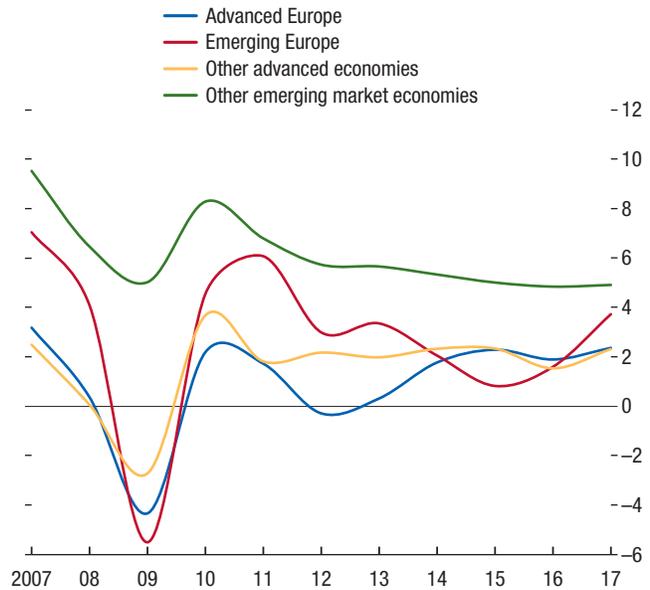
The chapter was prepared by a staff team comprising Vizhdan Boranova, Raju Huidrom, Sylwia Nowak, Faezeh Raei, and Yan Sun. Phillip-Bastian Brutscher and Miroslav Kollar of the European Investment Bank contributed to Box 1.2. The team was led by Emil Stavrev under the general guidance of Jörg Decressin. Laura Papi provided useful advice and comments. Lian Veluz provided administrative support. The chapter reflects data and developments as of April 19, 2018.

Figure 1.1. Real GDP Growth Developments

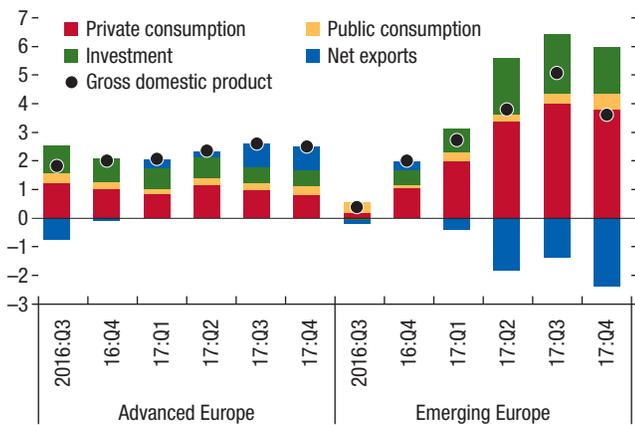
1. Drivers of Growth, 2017¹



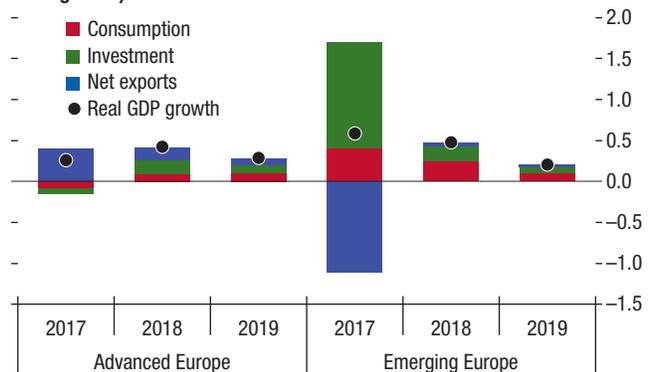
2. Real GDP Growth (Year-over-year percent change)



3. Contributions to Real GDP Growth (Percentage points)



4. Real GDP Forecast Revisions vis-à-vis October 2017 WEO Forecast (Percentage points for contributions; year-over-year percent change for growth)



Sources: Haver Analytics; IMF, *World Economic Outlook*; and IMF staff calculations.

Note: Data labels in the figure use International Organization for Standardization (ISO) country codes.

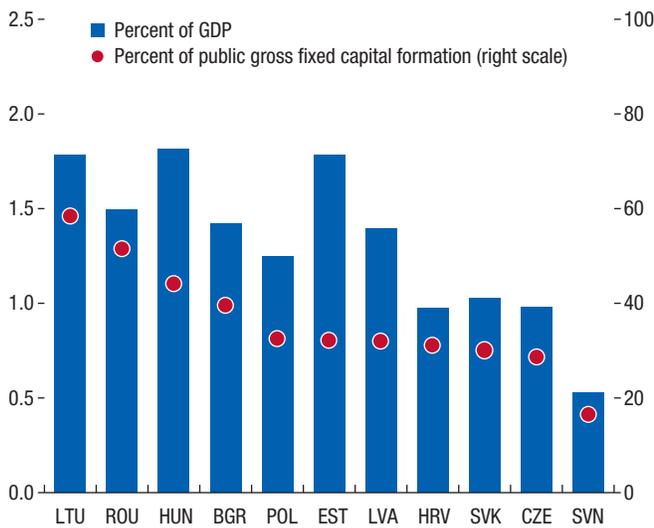
¹Domestic-demand-led growth implies net exports contribute less than a fourth of total growth, and export-led growth implies domestic demand contributes less than a fourth of total growth.

Europe by 0.6 percentage point, despite an unexpectedly large drag from net exports of about 1 percentage point.

- In *Central Europe*, growth increased to 4.4 percent in 2017, and in *Southeastern European EU member states (SEE-EU)* growth increased to 5.8 percent. Activity

was mainly driven by strong consumption on the back of high wage growth, higher public investment boosted by EU funds, and a modest recovery of private investment. As expected, the absorption of the new round of EU Structural and Investment Funds picked up pace after a slow start (see the May 2017 *Regional Economic Issues: Central, Eastern,*

Figure 1.2. EU Funds' Absorption in Selected New Member States, 2017



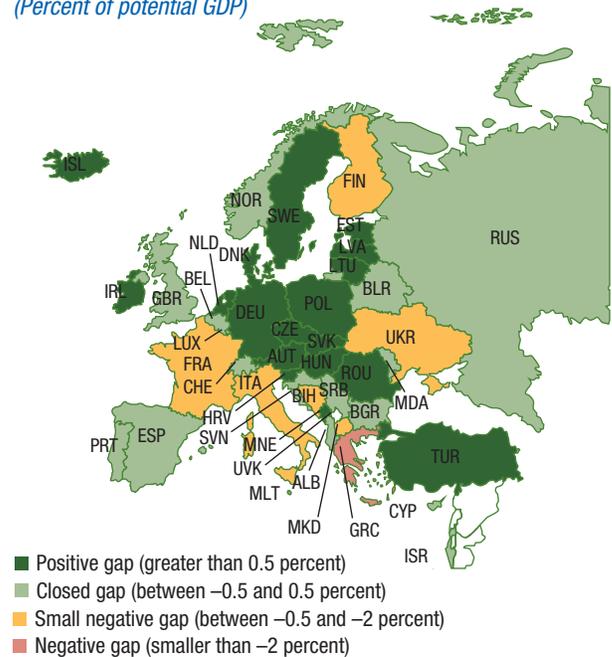
Sources: Haver Analytics; IMF, *World Economic Outlook*; and IMF staff calculations.

Note: Data labels in the figure use International Organization for Standardization (ISO) country codes.

and Southeastern Europe). In 2017, EU funds financed an equivalent of about half of public investment in *Romania* and *Hungary*, and a third elsewhere (Figure 1.2). Growth was further supported by discretionary fiscal spending in *Poland* and procyclical fiscal policy in *Romania*.

- In *Turkey*, growth accelerated sharply to 7 percent in 2017, from 3.2 percent the previous year. A sizable credit impulse (driven by state loan guarantees and relaxed macroprudential measures) and strong policy stimulus in the wake of the 2016 coup attempt stimulated domestic demand. In addition, exports increased considerably on the back of stronger external demand and a sizable depreciation of the lira.
- *Russia's* oil-dependent economy expanded by 1.5 percent in 2017, supported by higher oil prices, easier domestic financial conditions, and improved domestic demand. However, momentum softened in the second half of 2017. Economic activity in the other members of the *Commonwealth of*

Figure 1.3. Output Gap, 2018¹
(Percent of potential GDP)



Sources: IMF, *World Economic Outlook*; and IMF staff calculations.

Note: Data labels in the figure use International Organization for Standardization (ISO) country codes.

¹Output gaps reflect IMF country desks' estimates.

Independent States (CIS) also picked up in 2017 to 2.2 percent, with *Belarus* bouncing back from a two-year recession and recording growth of 2.4 percent.

- Growth moderated in the *Western Balkan* countries to 2.3 percent in 2017 from 3.1 percent in 2016, reflecting mainly a temporary slowdown in *Serbia* caused by a prolonged drought and electricity disruptions.

In addition to upward revisions to growth, the pickup in investment has also led to higher estimates of potential growth in 2018, by 0.2 percentage point in *advanced Europe* and by 0.1 percentage point in *emerging Europe*. While the estimates of potential growth and output gaps are uncertain (November 2017 *Regional Economic Outlook: Europe*), output gaps appear largely closed in most of the region (Figure 1.3). However, a broader set of indicators paints a mixed picture of overheating pressures in the largest European economies (Table 1.1). Many countries are seeing

Table 1.1. Overheating Indicators for Selected European Countries
 2017 estimates above the 1996–2015 average, except as noted below, by

Country	Domestic				External			Financial					
	Real GDP ¹	Output Gap ²	Unemployment	Inflation ³	Summary	Terms of Trade	Capital Flows ⁴	Current Account ⁵	Summary	Private Sector Credit Growth ⁴	Real House Price Growth	Equity Price Growth	Summary
Germany	●	●	●	●	●	●	●	●	●	●	●	●	●
France	●	●	●	●	●	●	●	●	●	●	●	●	●
Italy	●	●	●	●	●	●	●	●	●	●	●	●	●
Spain	●	●	●	●	●	●	●	●	●	●	●	●	●
United Kingdom	●	●	●	●	●	●	●	●	●	●	●	●	●
Sweden	●	●	●	●	●	●	●	●	●	●	●	●	●
Czech Republic	●	●	●	●	●	●	●	●	●	●	●	●	●
Russia	●	●	●	●	●	●	●	●	●	●	●	●	●
Turkey	●	●	●	●	●	●	●	●	●	●	●	●	●
Poland	●	●	●	●	●	●	●	●	●	●	●	●	●
Romania	●	●	●	●	●	●	●	●	●	●	●	●	●

Sources: Bloomberg Finance L.P.; Haver Analytics; IMF, *World Economic Outlook*; and IMF staff calculations.

Note: For each indicator, except as noted below, economies are assigned colors based on estimated 2017 values relative to their 1996–2015 period average. Calculations are based on annual data except for capital flows and financial indicators, which are based on quarterly data. Each indicator is scored as red = 2, yellow = 1, and green = 0; summary scores are calculated as the sum of selected component scores divided by the maximum possible sum of those scores. Summary colors are assigned red if the summary score is greater than or equal to 0.66, yellow if greater than or equal to 0.33 but less than 0.66, and green if less than 0.33.

¹Level of output more than 2.5 percent above the precrisis trend (1996–2006) is indicated by red; less than 2.5 percent by green; orange otherwise.

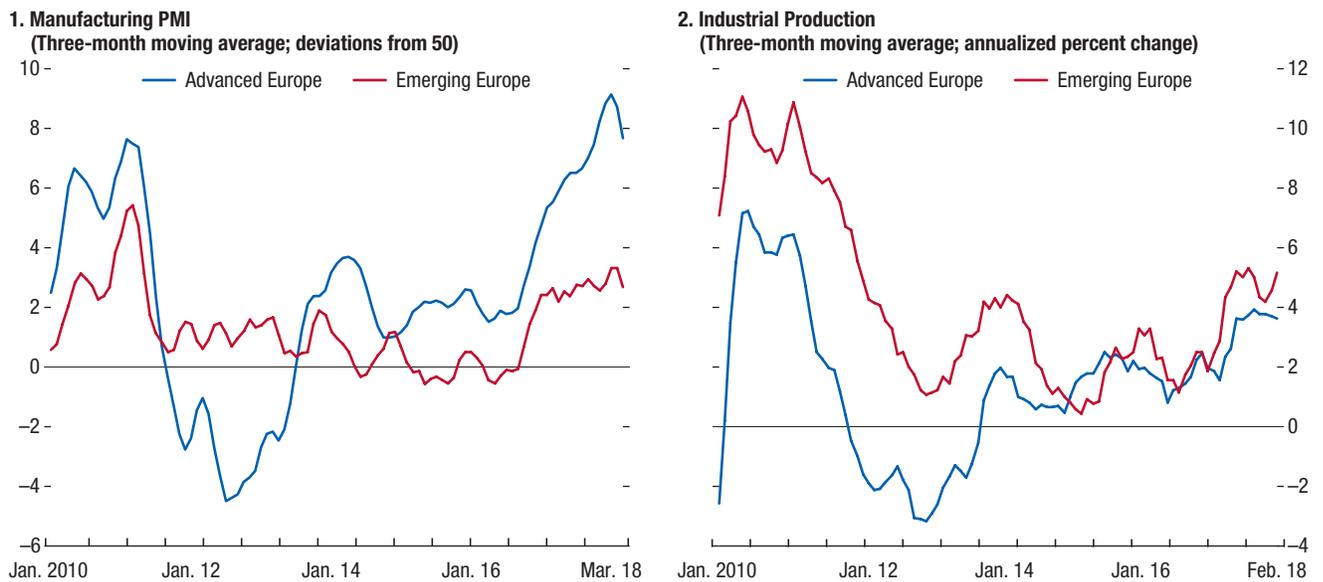
²Output gaps reflect IMF country desk estimates. Red is assigned for positive gap greater than 0.5 percent; yellow for gaps between –0.5 and 0.5 percent; and green for gaps smaller than –0.5 percent.

³The target inflation rate is used instead of the 1996–2015 period average in the calculation of the inflation indicator.

⁴The indicators for credit growth and capital flows refer to the latest available quarterly values in percent of GDP. Red is assigned if the annual change is greater than 5 percentage points, yellow if greater than 3 percentage points but less than or equal to 5 percentage points, and green if the annual change is equal to or less than 3 percentage points.

⁵In percent of GDP; difference between an average over 1996–2015 and the 2017 estimate.

Figure 1.4. High-Frequency Indicators



Sources: Haver Analytics; and IMF staff calculations.
Note: PMI = purchasing managers' index.

buoyant activity and unemployment rates below historical averages, with the notable exception of *France, Italy, and Spain*. Output is above precrisis levels but still below precrisis trend in most countries. However, inflation remains below central bank targets almost everywhere (partly reflecting slack, as discussed in Chapter 2), except in *Turkey* and the *United Kingdom*. Also, external indicators generally do not suggest overheating. Similarly, indicators of financial stability appear mostly benign, with a few exceptions (including high credit growth in *Turkey* and a rapid increase in house prices in *Romania*).

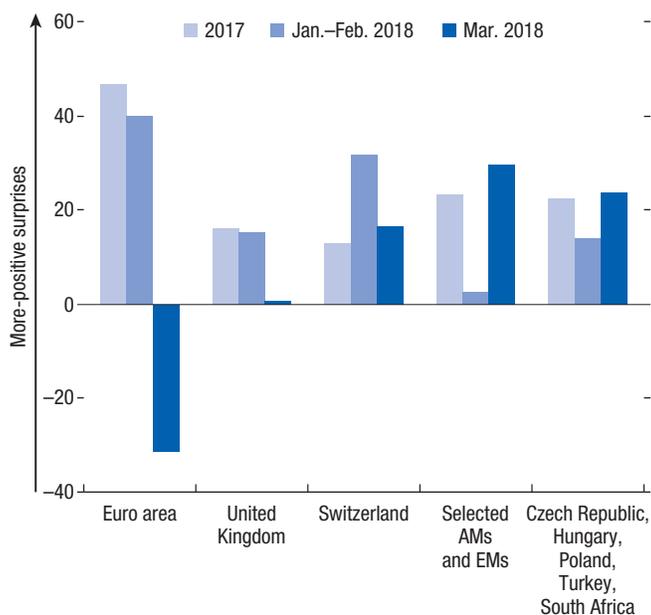
High-frequency data and indicators point to continued expansion in the near term, though likely with fewer upward surprises. Manufacturing purchasing managers' indices (PMIs) remain firmly in expansion territory (Figure 1.4). However, the March readings softened from their long string of gains. *Russia's* PMI came in barely above 50, and the composite index for the *euro area* has declined by a cumulative 4 points since the end of 2017—the largest three-month decrease since May 2012. Similarly, confidence among *euro area* and *Nordic* households eased in March, though it remains

historically high. Hard data paint a similar picture: the trends remain favorable, but there is some softening. Industrial output continued to expand in January 2018 at about 3.6 percent in *advanced Europe* and 4.6 percent in *emerging Europe*, but the most recent growth rates are lower than in the second half of 2017. In *Germany*, industrial orders fell almost 4 percent, and factory sales edged down 0.2 percent month over month in January 2018. Looking ahead, Citigroup's Economic Surprise Index suggests that upside surprises are now less frequent than last year, especially in the *euro area* (Figure 1.5).

Inflation Still Subdued in the Euro Area but Gathering Pace in Eastern Europe

Price pressures are diverging across the region, but this is mostly visible in headline rates, owing to different weights of energy and food in household consumption baskets. Inflation rates are low in *advanced Europe* but gradually closing in or surpassing targets in *eastern Europe*. But even

Figure 1.5. Citigroup Economic Surprise Index¹
(Percent; period average)



Sources: Haver Analytics; and IMF staff calculations.

¹The index measures macroeconomic data surprises relative to market expectations. A positive reading means that the data releases were stronger than expected. Selected advanced markets (AMs) and emerging markets (EMs) comprise the Czech Republic, Hungary, Poland, Turkey, and 16 other countries.

there, core inflation is still quite low in most economies, despite higher wage growth.

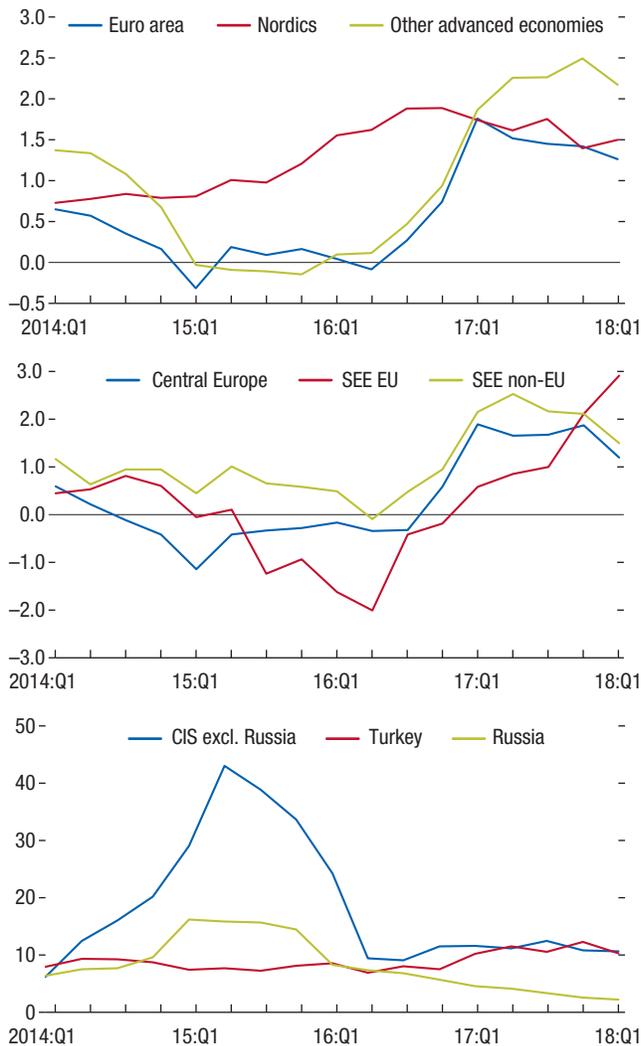
- In many *advanced European economies*, inflation remains subdued (Figure 1.6, panel 1). In the *euro area*, headline inflation declined to 1.1 percent in February 2018, below the European Central Bank's (ECB's) target, most recently reflecting mainly lower food prices. On the back of sluggish wage growth, core inflation remains low (Figure 1.6, panel 2). Inflation is similarly subdued in the *Nordic economies*, with readings at 1.5 percent in February 2018. By contrast, inflation in the *United Kingdom* reached 2.7 percent in February 2018.
- In other advanced European economies, inflation has risen moderately, with the impact of high wage growth becoming increasingly visible. In the *Czech Republic*, inflation surpassed the 2 percent target of the central bank starting in early 2017 before declining

at the beginning of this year. In the *Baltics*, inflation reached almost 4 percent in the second quarter of 2017, but then dropped to 2.8 percent in February 2018.

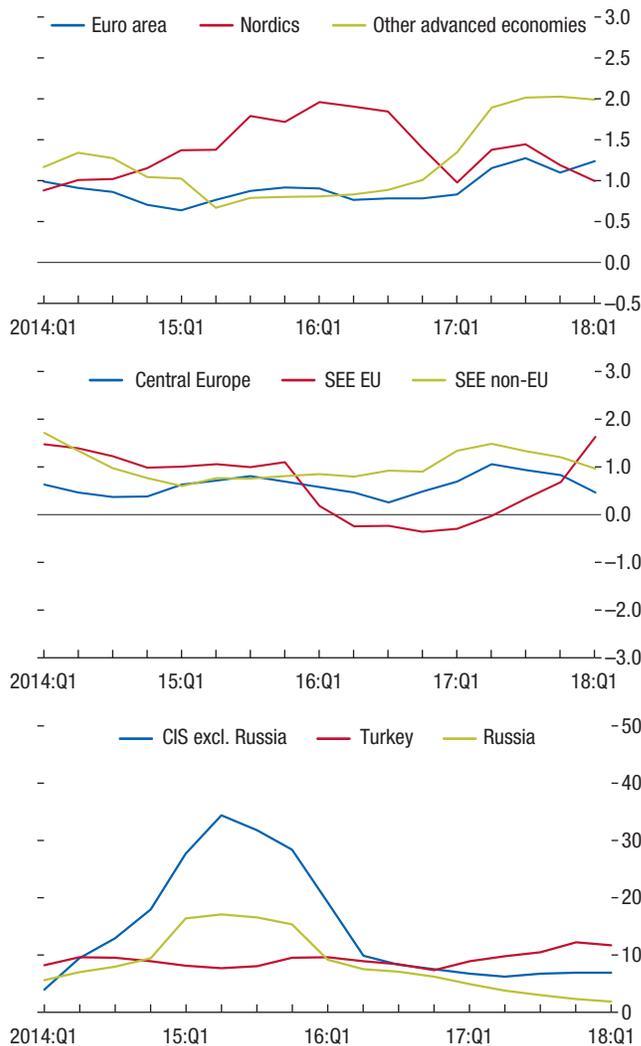
- Regarding *emerging Europe*, headline inflation in *Central and Southeastern Europe* increased appreciably to about 2 percent at the end of 2017, mostly owing to higher energy prices. Core inflation, however, while inching up, remains subdued at about 1 percent despite strong wage growth. In *Poland*, headline inflation hit 2.5 percent—the central bank's target—in November 2017 but has fallen since then, and core inflation has hovered around 0.8 percent in recent months. Among the *Southeastern Europe* (SEE) economies, headline inflation has increased steeply in *Romania* as the effects of tax and other administrative adjustments are dissipating. In the *non-EU SEE economies*, headline inflation, after picking up sharply to 2½ percent in mid-2017, declined somewhat in the second half of 2017, as inflation in *Serbia* fell to 3 percent. Core inflation remains relatively low at about 1 percent in *SEE countries*.
- In *Russia*, inflation has declined further amid tight monetary policy, a weaker-than-expected recovery, and a good harvest. The decline continues to be broad-based, and both headline and core inflation reached record lows of 2.2 and 2 percent, respectively, during January–February 2018.
- In contrast, inflation remains elevated in *Turkey*, reflecting strong domestic demand, expansionary fiscal and insufficiently tight monetary policies, and the pass-through of lira depreciation. Core inflation has picked up noticeably to about 12 percent in recent months, from about 10 percent in August 2017.

Figure 1.6. Inflation
(Year-over-year percent change)

1. Headline Inflation



2. Core Inflation



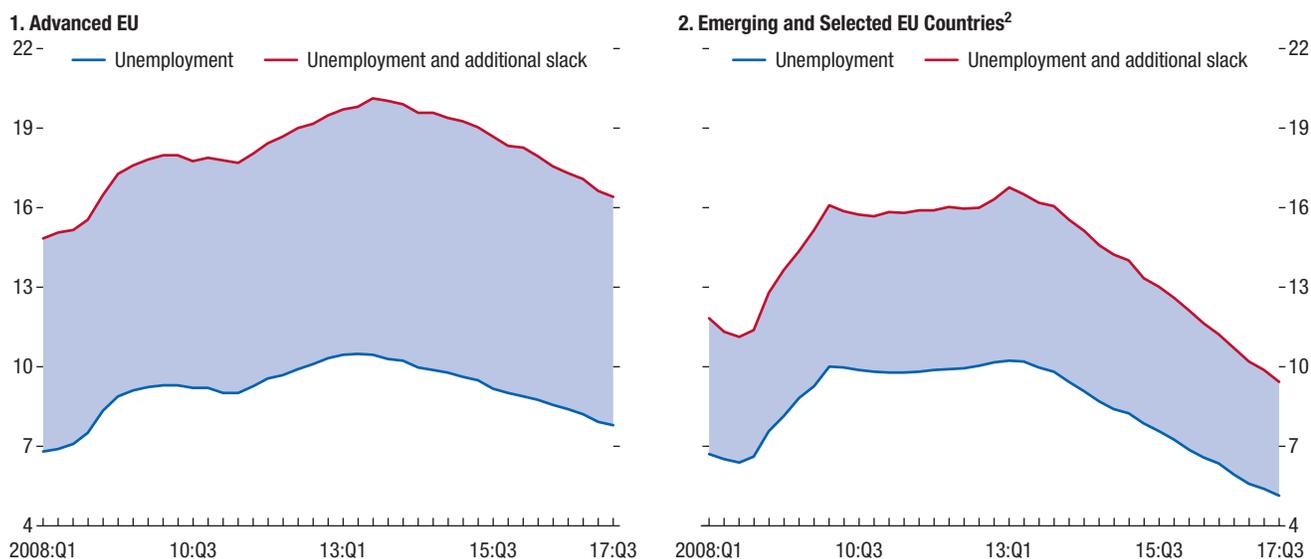
Sources: Haver Analytics; and IMF staff calculations.
Note: CIS = Commonwealth of Independent States; SEE = Southeastern Europe.

Different Wage Dynamics Continue across Europe: Sluggish in Most Advanced Economies but Strong Growth in the Newer EU Member States

Wage growth continues to be low in most of *advanced Europe*, but is strong in the rest of the region owing to tighter labor supply (Figure 1.7). While employment growth has been robust and there are notable reductions in indicators of labor

market slack, wage growth is still subdued in the *euro area* and many *other advanced European economies*. However, recent wage negotiations in some *euro area economies* (such as *Germany*) suggest that employers are willing to accommodate demands for higher wage growth in tightening labor markets. In contrast, wage growth continues to be strong in the *newer EU member states* (*Czech Republic, Baltics, Central Europe, SEE economies*)—significantly outpacing inflation as unemployment rates dip below precrisis lows.

Figure 1.7. EU: Labor Market Slack
(Percent of active labor force¹)



Sources: Eurostat; and IMF staff calculations.

Note: EU = European Union.

¹Additional slack comprises persons available but not seeking work, seeking work but not immediately available, and underemployed part-time workers.

²Selected advanced EU countries comprise the Baltics, the Czech Republic, the Slovak Republic, and Slovenia.

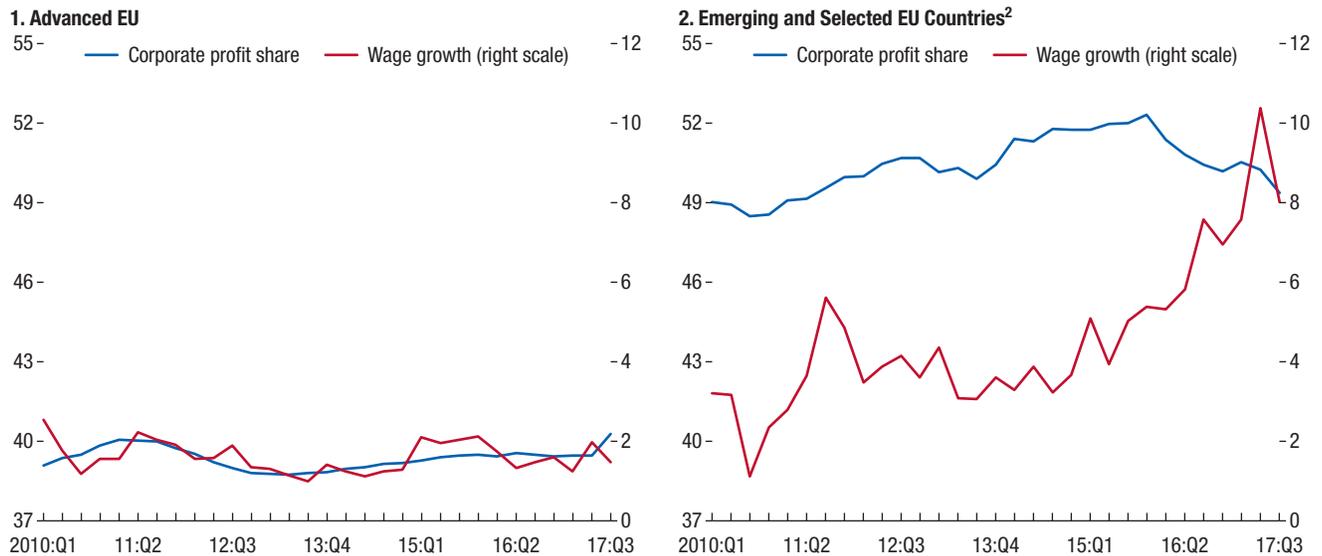
Differences in wage growth dynamics in the region are also the result of differences in labor productivity growth, wage-setting mechanisms, and inflation expectations. As examined in Chapter 2, wage Phillips curves appear alive and well, having broadly stable parameters, with a modest slope in the *EU15* and especially strong wage responses to slack in the *newer EU member states*. Wage growth has generally been synchronized with labor productivity in most of *advanced Europe*. In contrast, in the *newer EU member states*, wage growth has outpaced productivity growth, though the gap narrowed as labor productivity rose strongly in late 2017. In *advanced Europe*, low inflation expectations and external competition have been important factors in muting the response of wages to slack. As a result, corporate profitability has been broadly stable. In comparison, corporate profitability declined moderately in *Eastern Europe* in recent years, although it is still about 10 percentage points higher than in *advanced Europe* (Figure 1.8).

Credit Is Picking Up

After a long creditless recovery, credit growth has been picking up since 2016 in many *European countries*, but it continues to lag domestic demand and output. As investment gains further strength, credit growth should follow, with beneficial effects for bank profitability and balance sheets (see Box 1.2 for an in-depth discussion comparing the current recovery to the previous ones).

- In the *euro area* and other *advanced European countries*, bank credit to the private sector is picking up (Figure 1.9). However, growth in credit to businesses remains uneven across countries (Figure 1.9, panel 4) and is particularly weak in countries with high levels of nonperforming loans (NPLs). In the *Nordic economies*, credit to businesses is robust, in line with a pickup in investment and exports, while credit growth to households has slowed somewhat following the recent macroprudential measures aimed at containing the housing boom and elevated household debt levels.

Figure 1.8. EU: Corporate Profitability and Wage Growth¹
(Year-over-year percent change)



Sources: Eurostat; and IMF staff calculations.

Note: EU = European Union.

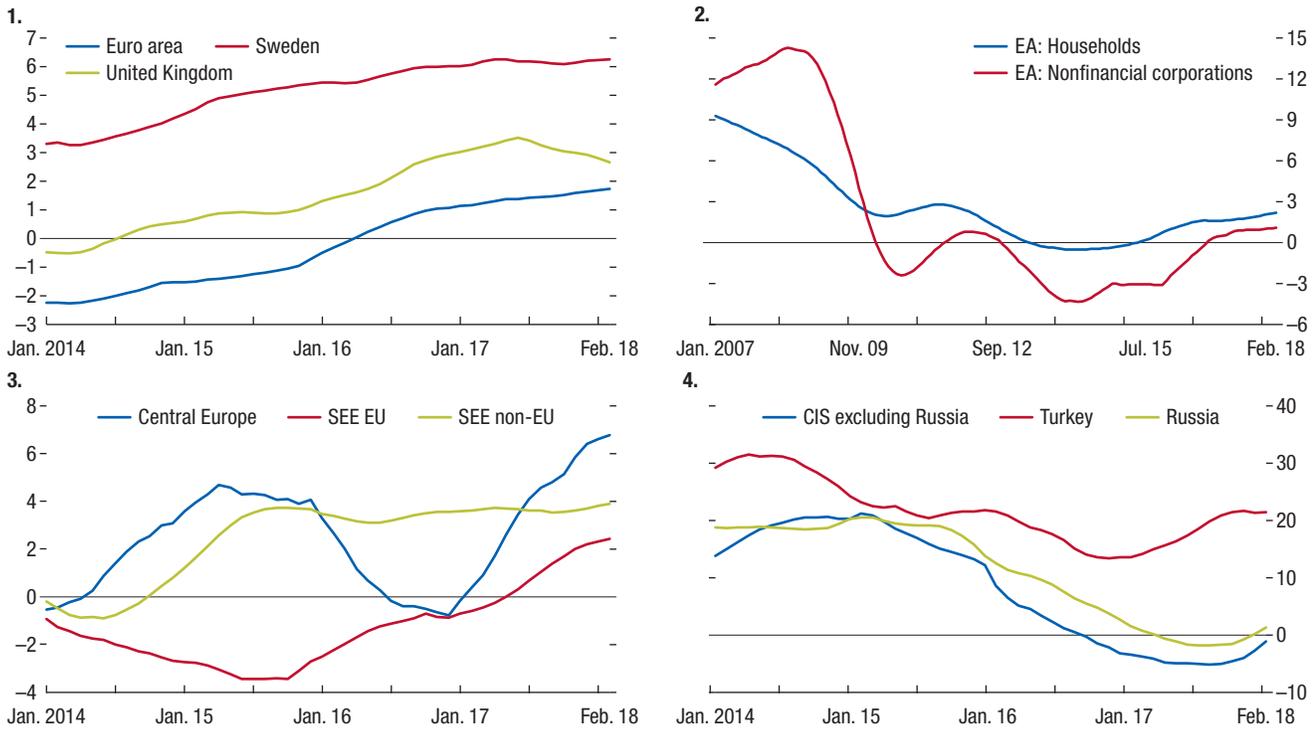
¹Corporate profit share is the four-quarter average of seasonally unadjusted data.

²Selected advanced EU countries comprise the Baltics, the Czech Republic, the Slovak Republic, and Slovenia.

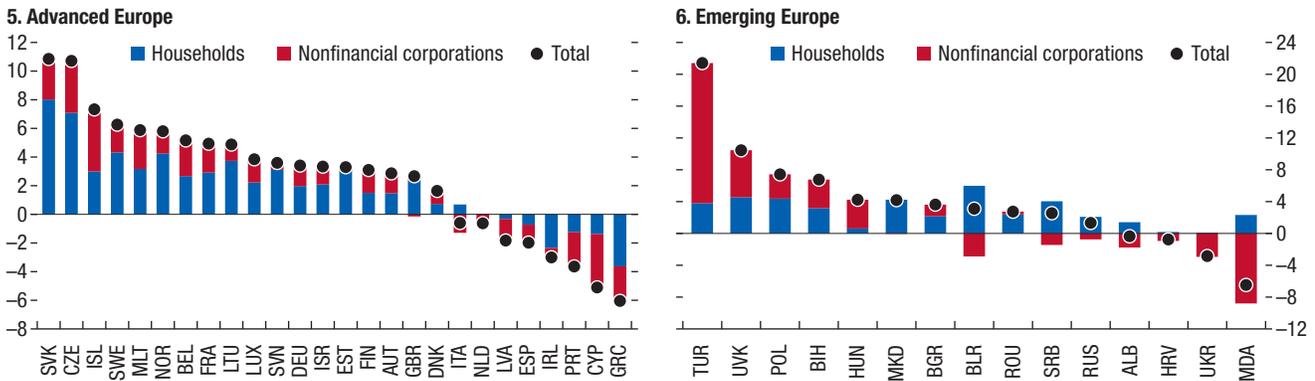
- In *emerging Europe*, outside the *CIS*, credit growth to both nonfinancial corporations and households is increasing, particularly in *Central Europe* and the *SEE-EU* region, in line with continuing strong real GDP and investment growth (Figure 1.9, panel 3). On a transactional basis, credit growth may be even higher in countries where the cleanup of loan portfolios has lowered credit stocks (for example in *Albania*, *Croatia*, and *Hungary*). In *Russia*, the decline in credit seems to have stabilized as the economy has exited the recession (Figure 1.9, panel 3). In the rest of the *CIS*, credit has continued to contract, albeit at a slower pace. In *Turkey*, credit growth initially slowed in 2016 in the aftermath of the failed coup attempt, but by way of various stimulus measures, notably a credit guarantee program for lending to businesses, it has since rebounded strongly to about 20 percent year over year in early 2018 (Figure 1.9, panel 4).

NPL levels have declined, but still weigh on bank profitability and credit supply in several countries (Figure 1.10). In *advanced Europe*, NPLs in the *euro area* have been substantially reduced since their peak in 2014, but the stock remains high in some countries. In *Ireland*, *Italy*, and *Spain*, the reduction of NPLs and the recent pickup in NPL sales is encouraging. However, for a sizable part of the banking system, the return on equity is persistently below the cost of equity (IMF 2017). The economic recovery may not be enough to boost returns to meet investor expectations or resolve the structural challenges faced by the least profitable banks; further consolidation and restructuring will be needed. NPL levels have been declining across *emerging Europe* but remain higher than 10 percent in half of the countries. While disentangling demand and supply factors is difficult, high NPL levels are weighing on profitability and credit growth. More actions are needed to repair bank balance sheets and facilitate the underlying corporate restructuring.

Figure 1.9. Private Sector Credit Growth¹
(Year-over-year percent change; 12-month moving average)



Contributions to Private Sector Credit Growth, February 2018 or Latest Available
(Percentage points for contributions; year-over-year percent change for growth)



Sources: Eurostat; Haver Analytics; IMF, *International Financial Statistics* (IFS); and IMF staff calculations.

Note: Data labels in the figure use International Organization for Standardization (ISO) country codes. CIS = Commonwealth of Independent States; EA = euro area; SEE = Southeastern Europe.

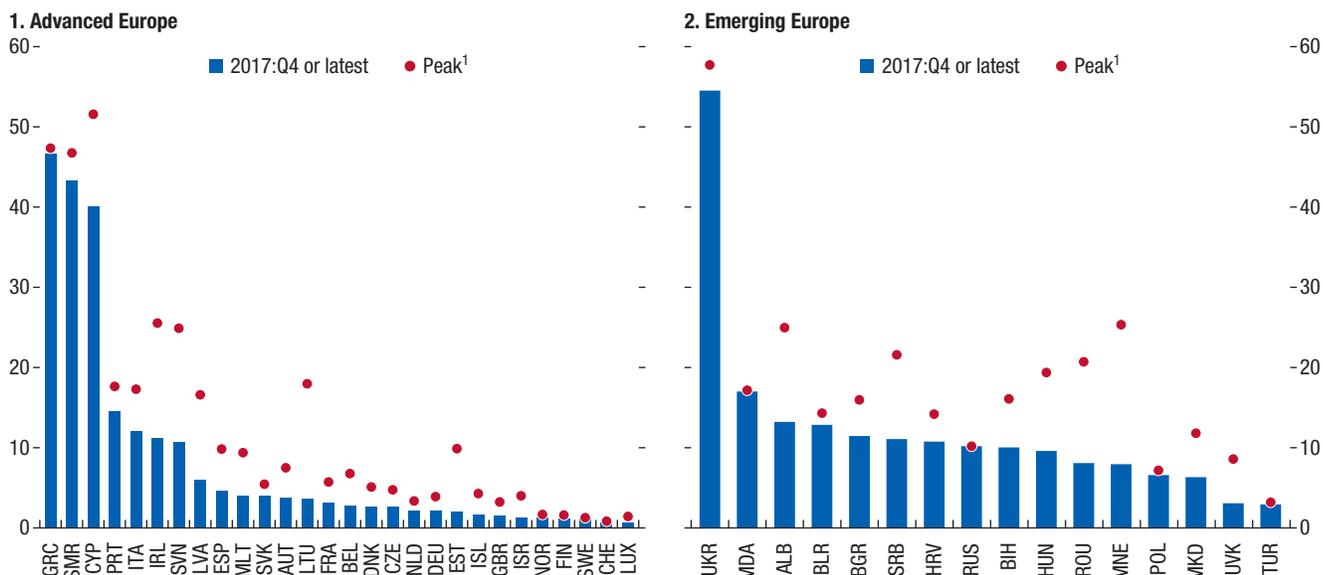
¹The source of data on private sector credit for euro area countries is Eurostat. The series are adjusted for sales and securitization.

External Positions Have Strengthened Relative to before the Crisis

Stronger fundamentals have been accompanied by appreciation of the real effective exchange rate of the euro and some other European currencies. Since the beginning of 2017, the euro has

appreciated by 7 percent in real effective terms (Figure 1.11) mainly driven by improved euro area prospects, as shown in the November 2017 *Regional Economic Outlook: Europe*. The Czech koruna appreciated about 10 percent, following the lifting of the Koruna-euro floor in early 2017, and on the back of a more recent increase

Figure 1.10. Nonperforming Loans
(Percent of total gross loans)



Sources: European Central Bank, *Consolidated Banking Statistics*; IMF, *Financial Soundness Indicators*; World Bank, *World Development Indicators*; and national authorities.

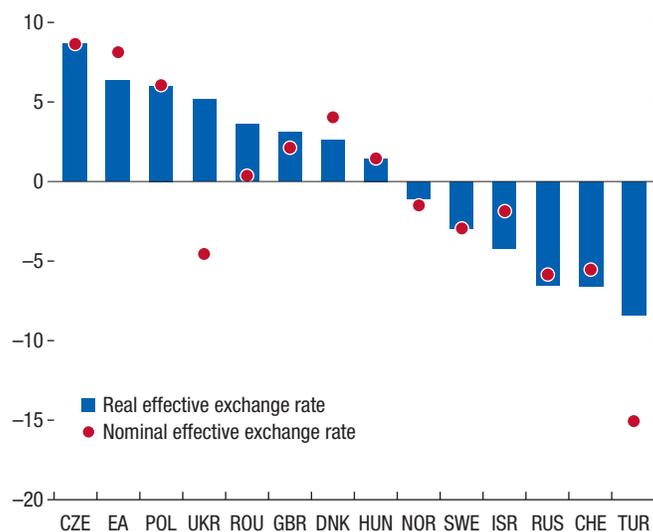
Note: Data labels in the figure use International Organization for Standardization (ISO) country codes.

¹Peak is defined as the highest value during the first quarter of 2011 (or earliest available) to the fourth quarter of 2017 (or latest available). Data for Serbia and Switzerland are based on annual numbers.

in the policy interest rate and strong growth performance. The Polish zloty and Hungarian forint also experienced some appreciation due to strong growth and subdued inflation. The depreciation of the Turkish lira in 2017 by about 6 percent follows a depreciation of a similar size after the coup in the second half of 2016, amid above-target inflation and a widening current account. The Russian ruble has depreciated by 6 percent since February 2017, following the 2014–16 depreciation and recovery. The British pound has also moved broadly sideways since the depreciation in 2016. Meanwhile, the Swiss franc has depreciated since early 2017, given the negative interest rate differential with the euro.

Thus far, current account balances remain noticeably stronger than before the global financial crisis in most countries. Net external debtor countries that had persistent and large current account deficits prior to the crisis have seen sizable current account adjustments (Figure 1.12), driven by both a permanent reduction in the

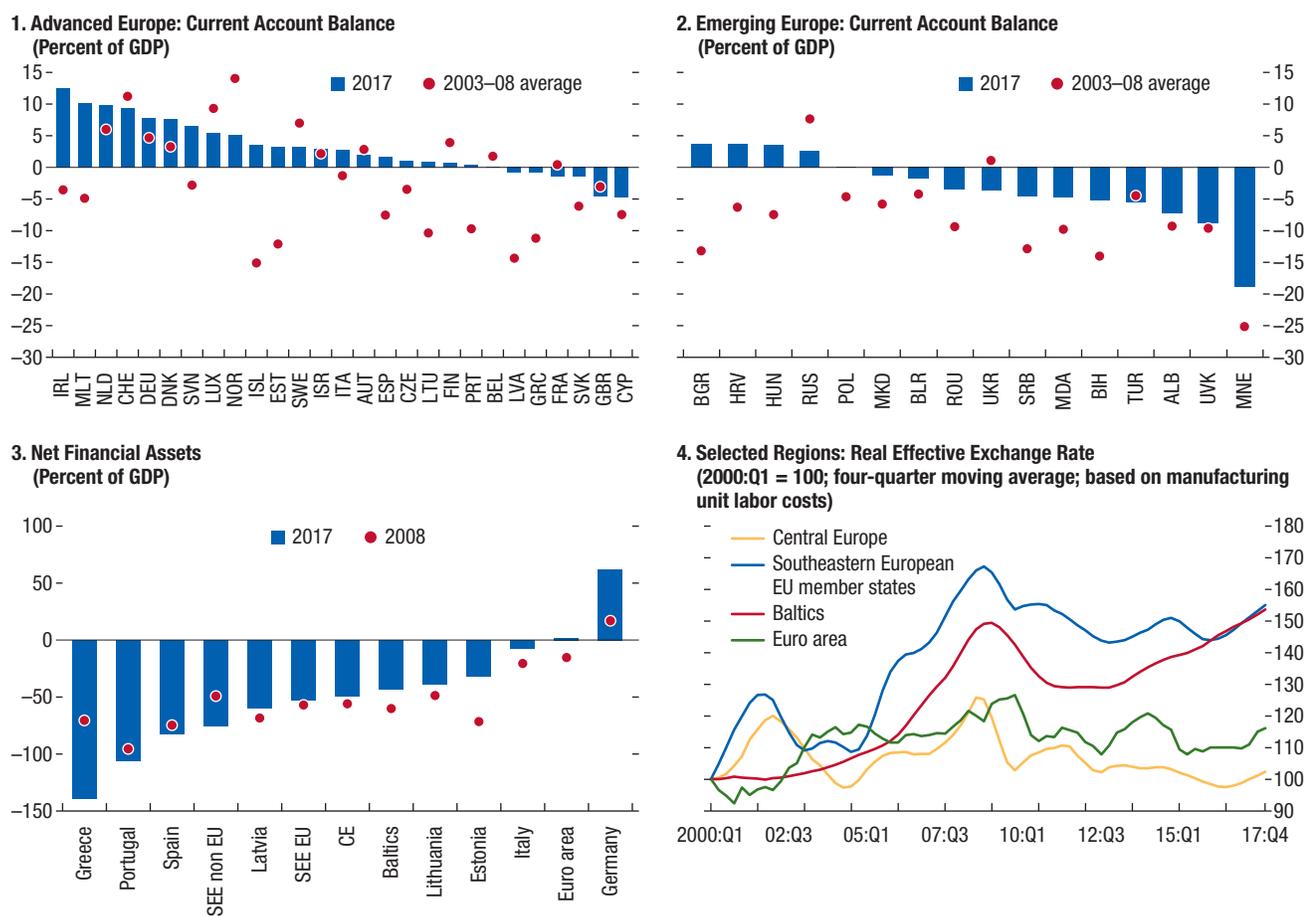
Figure 1.11. Exchange Rate Movements
(Percent; depreciation (-)/appreciation (+); March 2017–March 2018)



Sources: IMF, *Information Notice System*; and IMF staff calculations.

Note: Data labels in the figure use International Organization for Standardization (ISO) country codes.

Figure 1.12. External Sector Developments



Sources: Eurostat; Haver Analytics; IMF, *World Economic Outlook*; and IMF staff calculations.
 Note: Data labels in the figure use International Organization for Standardization (ISO) country codes. CE = Central Europe; EU = European Union; SEE = Southeastern Europe.

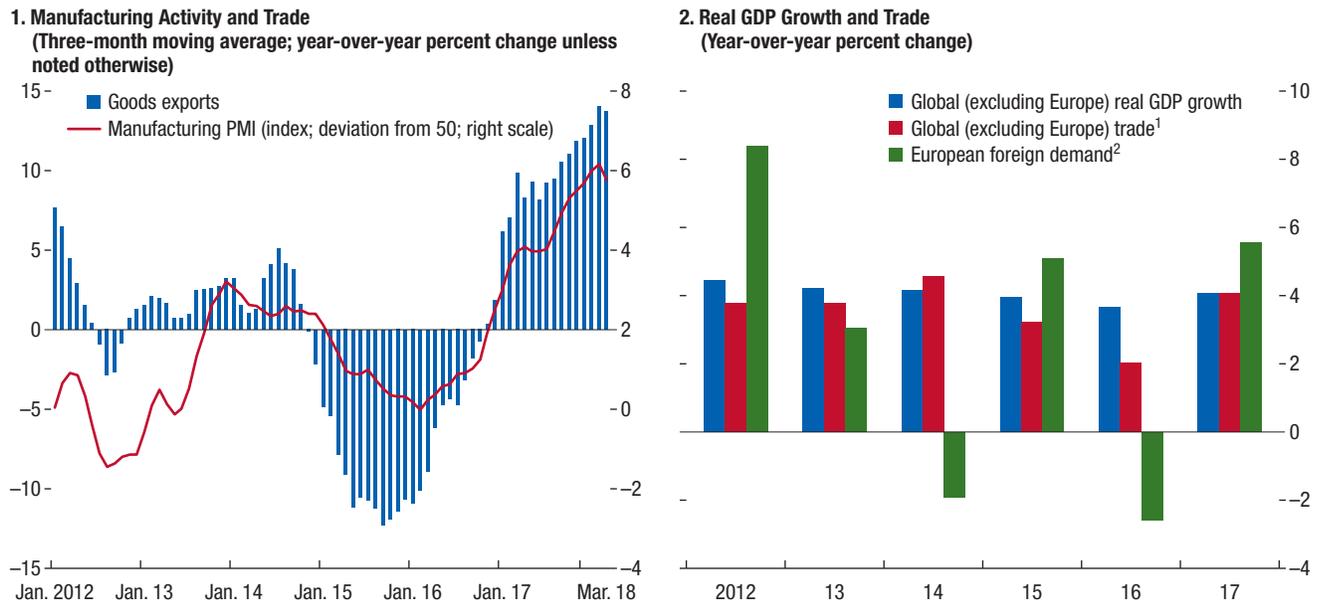
level of demand and some labor cost reductions. Meanwhile excess external surpluses have persisted.

- In *advanced Europe*, the euro area members that had current account deficits prior to the crisis have achieved surpluses (*Estonia, Portugal, Spain*) or reduced their deficits appreciably (*Greece, Latvia, Lithuania*) over the past several years (Figure 1.12, panels 1 and 2), partly driven by adjustments in unit labor costs. However, negative net foreign asset positions remain elevated in many of these countries (Figure 1.12, panel 3). Recent indicators of competitiveness, while not conclusive, suggest some erosion of competitiveness in the *Baltics*, where real

effective exchange rate appreciation, fast wage growth, and modest productivity gains have led to a notable increase in unit labor costs, bringing them close to the precrisis peak (Figure 1.12, panel 4). Excess current account surpluses have persisted in *Germany* and the *Netherlands*, and in *Germany* remained stronger than implied by medium-term fundamentals and desirable policy setting, indicating that adjustment mechanisms are weak, partly reflecting currency arrangements but also likely structural features (see the IMF 2017 *External Sector Report*).

- In *emerging Europe*, many economies managed to adjust from large current account deficits

Figure 1.13. Global Activity



Sources: European Commission; Haver Analytics; IMF, *World Economic Outlook*; and IMF staff calculations.

Note: PMI = purchasing managers' index.

¹Measured by volume of goods and services imports.

²Proxied by extra-EU exports of goods.

to small surpluses, but here too the net external liability positions remain elevated (Figure 1.12, panels 2 and 3). In *Central Europe* and the *SEE-EU* region, real effective exchange rates have edged up somewhat as wages outstripped productivity in the last two years (Figure 1.12, panel 4). The level of economy-wide profit shares in these economies is higher than the EU average (Figure 1.8), which suggests that companies have some room to absorb the higher labor costs. However, the impact of high wage growth on competitiveness needs to be monitored closely.

- In *Turkey*, the current account deficit has stayed around 5 percent of GDP. Although exports have performed well, higher fuel prices and strong domestic demand have led to a wider current account deficit.

Key Forces Shaping the Outlook: Favorable External Conditions and Still-Accommodative Macroeconomic Policies

The external environment and macroeconomic policy setting remain supportive for Europe's near-term outlook. The synchronized global expansion remains on track, with global growth projected to edge up from 3.8 percent in 2017 to 3.9 percent in 2018 and 2019, partly reflecting spillover effects of expansionary fiscal policy in the *United States* (see Chapter 1 of the April 2018 *World Economic Outlook*). The continued recovery in global investment has spurred stronger manufacturing activity and an upturn in global trade (Figure 1.13, panel 1). Global PMIs for early 2018 indicate that the global growth momentum will continue into the first half of 2018, and Europe is enjoying significant goods trade momentum and upbeat foreign demand (Figure 1.13, panel 2). The recent agreement between the *United Kingdom* and the European

Union for a 21-month Brexit transition period mitigates the risk of a disorderly UK exit from the European Union and reduces the uncertainty facing firms and households.

Commodity prices started the year on a bullish note. Oil prices, boosted by healthy global growth prospects and expectations for continued oil production curbs by the Organization of the Petroleum Exporting Countries and *Russia*, increased to above \$65 a barrel (about 30 percent above the projection in the October 2017 *World Economic Outlook*). Higher oil prices will aid the cyclical recovery in *Russia* and could put some upward pressure on headline inflation elsewhere. Futures markets point to some oil price declines over the next few years from current levels.

Despite recent equity market turbulence, financial conditions remain supportive of growth, although signs of tightening conditions are gradually appearing in some markets (see Chapter 1 of the April 2018 *Global Financial Stability Report*). Financial stress indices tightened modestly in late 2017 (Figure 1.14, panel 1). Sovereign bond yields edged up in many *euro area economies*, in response to better-than-expected growth outcomes and an expectation of earlier monetary policy normalization, and in the *Czech Republic* and *Romania*, which began normalizing their monetary policy (Figure 1.14, panel 2). However, yields actually declined in about a quarter of European economies, most notably in *Greece*, *Portugal*, and *Ukraine*. In the *euro area*, still-easy financial conditions are underpinned by large asset holdings by the ECB. Despite the lower purchase schedule, net purchases are expected to remain substantial at least through September 2018 relative to the projected net issuance of government debt (Figure 1.14, panel 3).

The recent stock market corrections have thus far left no lasting scars. Market volatility rose substantially for European equities in early February 2018, but since then has declined to the average level observed in 2016–17 (Figure 1.14, panel 4). Portfolio flows to *emerging Europe* remained robust through January 2018, especially bond flows (Figure 1.14, panel 5). Weekly data

indicate that portfolio flows reversed slightly amid the global equity market correction in the first half of February, but have recovered since. The correction was mild compared with outflows during the “taper tantrum” of 2013 (Figure 1.14, panel 6). However, volatility is still a concern, given the recent stock movements and ongoing trade tensions.

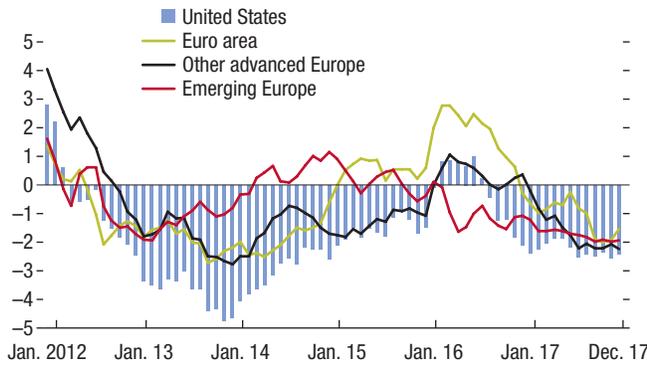
Continued accommodative macroeconomic policies will further support activity, with almost all central banks in the region maintaining negative real policy rates (Figure 1.15, panel 2).

- Monetary policy normalization in the large advanced economies is expected to be gradual and predictable (Figure 1.15, panel 1). In the United Kingdom, monetary policy remains accommodative but the Bank of England has started to consider the case for the normalization process. It raised the policy rate for the first time in 10 years, to 0.5 from 0.25 of a percent. Central banks in the rest of advanced Europe are signaling a tightening bias. In the *Czech Republic*, the Czech National Bank has raised rates three times since August 2017, after almost five years of a supportive stance, and is expected to continue gradually normalizing monetary conditions.
- In *emerging Europe*, markets expect modest tightening of policy rates in almost all countries, although some central banks are maintaining a very accommodative monetary stance (*Hungary*, *Poland*). In *Romania*, the policy rate was raised twice in 2018 by a cumulative 50 basis points. In *Turkey*, the increase of the effective interest rate by almost 5 percentage points in 2017 has not been enough to contain inflation and prevent inflation expectations from increasing, prompting markets to expect further tightening of monetary policy in 2018. In contrast, *Russia's* central bank has cut policy rates by a cumulative 275 basis points since March 2017 as inflation stabilized below its 4 percent target. *Russia* and *Turkey* remain the

Figure 1.14. Financial Conditions

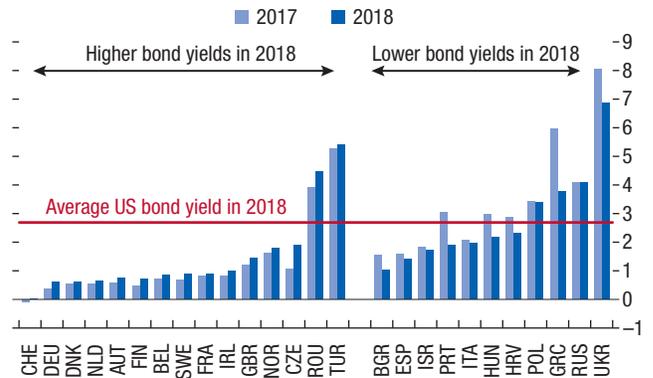
1. Financial Stress Indices¹

(Three-month moving average; higher values indicate financial strain)



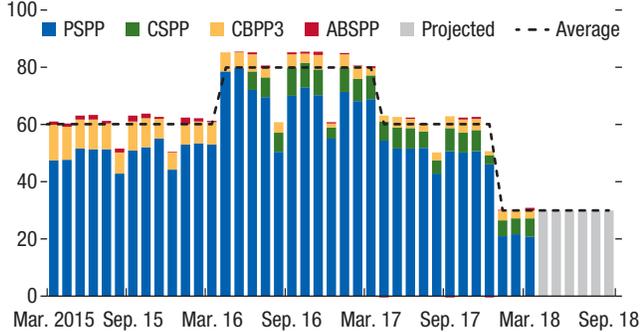
2. Sovereign Bond Yields

(Percent; average of daily data for generic 10-year government bond yields)



3. ECB's Asset Purchase Programs²

(Billions of euros; net monthly purchases by program)



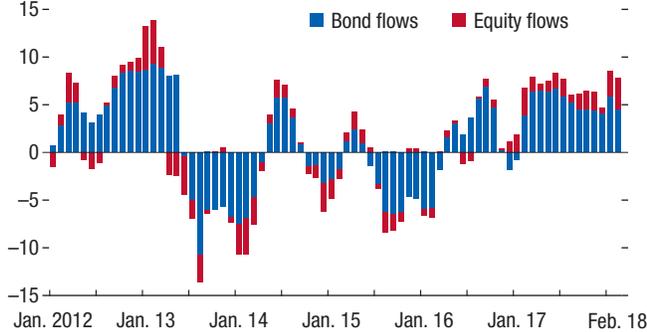
4. Market Volatility

(Index; March 1, 2016 = 100)



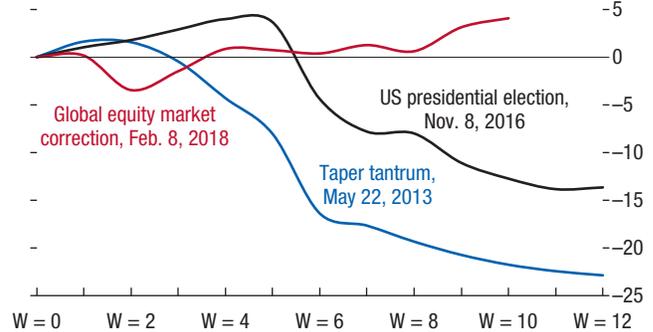
5. Portfolio Equity and Debt Flows to Emerging Europe

(Billions of US dollars, three-month rolling sum)



6. Portfolio Equity and Debt Flows to Emerging Europe

(Billions of US dollars; cumulative flows; W = 1 is first week of outflows)

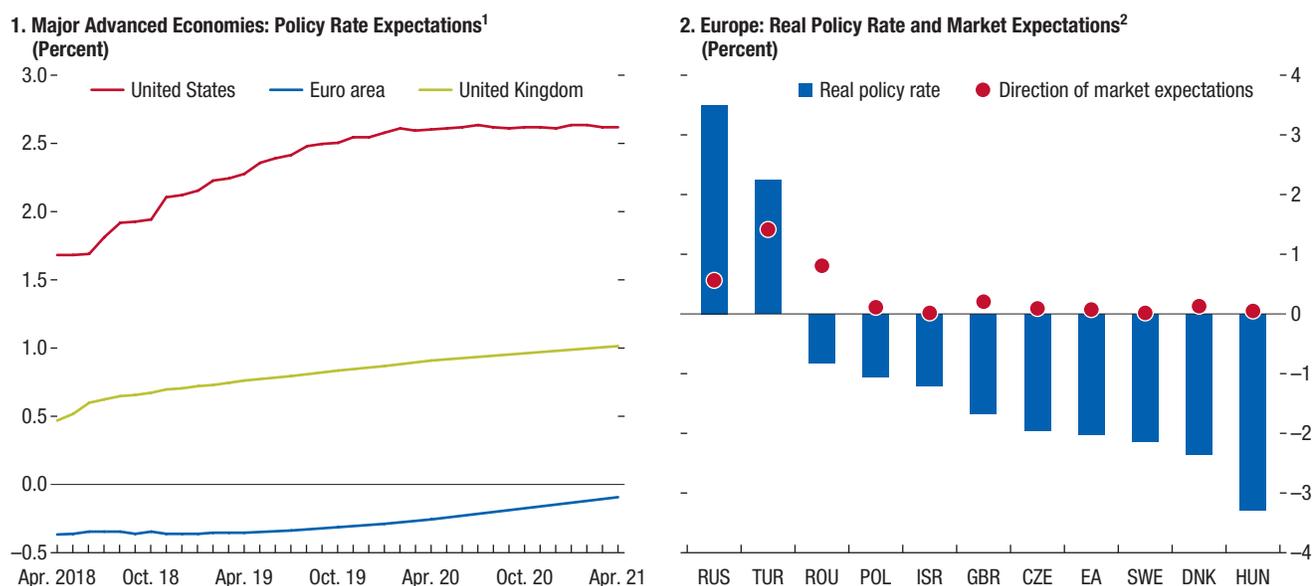


Sources: Bloomberg Finance L.P.; European Central Bank; Haver Analytics; and IMF staff calculations.

Note: Data labels in the figure use International Organization for Standardization (ISO) country codes. ECB = European Central Bank; V2X = Euro Stoxx 50 Volatility Index; VIX = Chicago Board Options Exchange Volatility Index.

¹The indices capture markets movements relative to averages or trends to proxy for the presence of strains in financial markets (banking, securities markets, and exchange markets). For details see IMF (2009) and Balakrishnan and others (2009).

²ABSPP = asset-backed securities purchase program; CBPP3 = covered bond purchase program 3; CSPP = corporate sector purchase program; PSPP = public sector purchase program.

Figure 1.15. Monetary Policy Conditions and Expectations

Sources: Bloomberg Finance L.P.; Haver Analytics; IMF, *World Economic Outlook*; and IMF staff calculations.

Note: Data labels in the figure use International Organization for Standardization (ISO) country codes. EA = euro area.

¹Based on monthly average of federal funds rate futures for the United States; overnight interbank swap rates calculated using the overnight unsecured lending between banks (SONIA) for the United Kingdom; and the euro interbank offered forward rate (EONIA) for the euro area; updated April 19, 2018.

²Real policy rate is calculated as the difference between nominal policy rate and one-year-ahead inflation forecast (for example, IMF *World Economic Outlook* forecast for 2019; average of period). Market expectation of interest rate is calculated as the difference between one-year-ahead interest rate swap rate and three-month interbank rate. Positive values indicate expectations of monetary tightening.

only large European economies with positive real policy rates.

Fiscal policy is also projected to continue supporting economic activity, despite closed output gaps in most economies—procyclicality has been a feature of fiscal policy during the recovery. The fiscal stance is expected to be neutral or expansionary in the region in 2018, except in *Iceland, Italy, Russia, the Slovak Republic, and the United Kingdom* (Figure 1.16, panel 1). The aggregate fiscal stance in the *euro area* is forecast to remain broadly neutral in 2018–19 and to tighten only gradually in 2020 (Figure 1.16, panel 2). Procyclical loosening is projected in *Southeastern Europe* and *Turkey*.

Favorable Outlook Expected to Continue

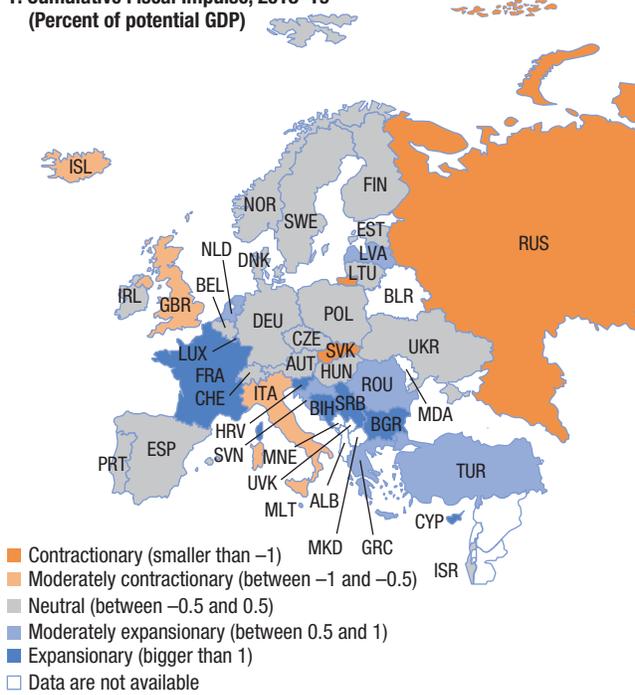
Against this backdrop, growth is expected to further improve in the short term, but slow

gradually over the medium term. Europe's growth forecasts for 2018 and 2019 have been revised up relative to the forecast in the November 2017 *Regional Economic Outlook: Europe* (Table 1.2). The upward growth revisions reflect largely stronger domestic demand, with investment accounting for almost half of the revision in both *advanced* and *emerging Europe* (Figure 1.1, panel 4). While more dynamic investment growth has resulted in upward revisions of potential GDP, most of the growth revisions are attributed to cyclical factors (Figure 1.17).

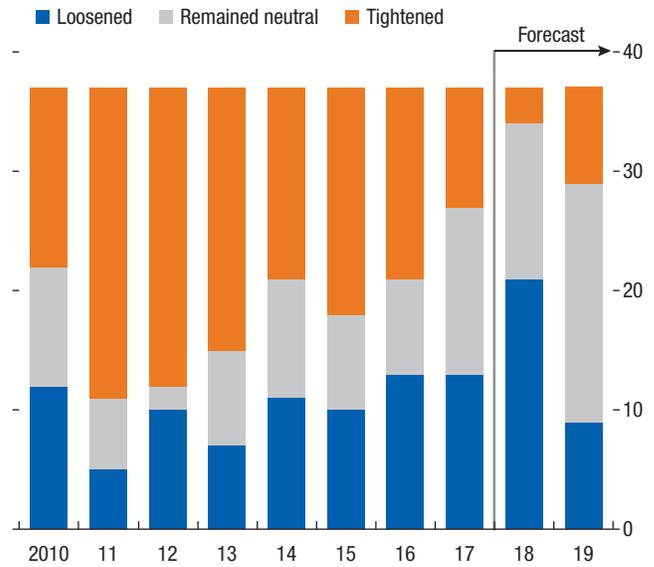
In *advanced Europe*, growth for the *euro area* has been revised up by 0.4 and 0.3 percentage point for 2018 and 2019, respectively, with growth now forecast to reach 2.3 percent in 2018 and 2 percent in 2019. This reflects stronger-than-anticipated momentum from late 2017 to early 2018 and better prospects for external demand. The revision to *Germany's* growth is particularly large, reaching about $\frac{3}{4}$ percentage point for 2018.

Figure 1.16. Fiscal Policy Conditions

1. Cumulative Fiscal Impulse, 2018–19
(Percent of potential GDP)



2. Fiscal Stance, 2010–19¹
(Number of countries in which the fiscal stance was tightened, loosened, or remained neutral)



Sources: IMF, *World Economic Outlook*; and IMF staff calculations.

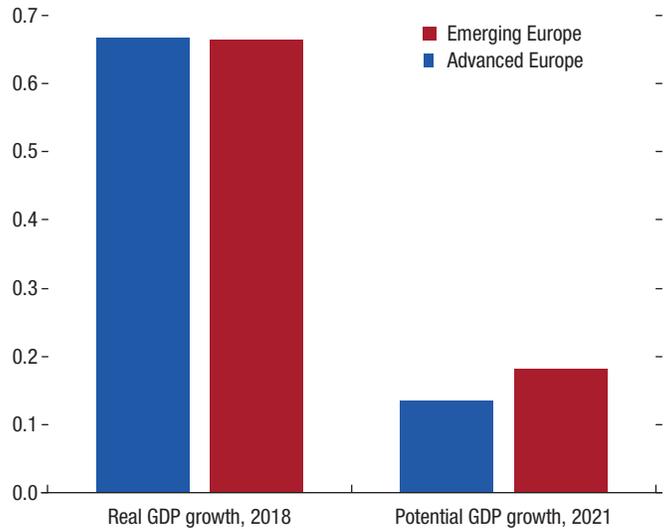
Note: Data labels in the figure use International Organization for Standardization (ISO) country codes.

¹The fiscal stance is considered to have tightened if the ratio of the structural primary balance to potential GDP improves by at least 0.25 percent a year, to have loosened if that ratio deteriorates by at least 0.25 percent a year, and to have remained neutral otherwise. General government non-oil primary structural balance is used for Russia, and structural non-oil balance in percent of mainland trend GDP is used for Norway. No data for ALB, BLR, MDA, MKD, MNE, SMR, and UVK.

In most *emerging European economies*, domestic demand (including investment) appears stronger than initially projected. Growth for *Central Europe* has been revised up by 0.7 and 0.5 percentage point for 2018 and 2019, respectively, while for *SEE-EU* it has been revised up by about 0.6 percentage point for 2018. Growth for *Russia* for 2018 has been revised slightly upward on account of higher oil prices. For *Turkey*, growth has been revised up by 0.9 and 0.5 percentage point for 2018 and 2019, respectively, as demand has again surprised on the upside due to supportive policies.

While the output growth trajectory of European economies has been raised, the inflation trajectory is broadly similar to that of the November 2017 forecast. Inflation is expected to remain subdued in *advanced Europe* and moderate in most of *emerging Europe* (Table 1.3). Reflecting higher oil prices and upward effects from energy and

Figure 1.17. WEO Forecast Revisions: April 2018 versus April 2017
(Percentage points)



Sources: IMF, *World Economic Outlook* (WEO); and IMF staff calculations.

Table 1.2. Real GDP Projections
(Year-over-year percent change)

	2016	April 2018 WEO				Difference from October 2017 WEO ¹		
		2017	2018	2019	2017	2018	2019	
Europe	1.8	2.8	2.6	2.2	0.4	0.4	0.3	
Advanced European Economies	1.9	2.4	2.3	2.0	0.3	0.4	0.3	
Euro Area	1.8	2.3	2.4	2.0	0.2	0.5	0.3	
France	1.2	1.8	2.1	2.0	0.3	0.3	0.1	
Germany	1.9	2.5	2.5	2.0	0.5	0.7	0.6	
Italy	0.9	1.5	1.5	1.1	0.0	0.4	0.2	
Spain	3.3	3.1	2.8	2.2	0.0	0.2	0.2	
Nordic Economies	2.3	2.2	2.3	2.1	-0.1	0.3	0.2	
Other European Advanced Economies	2.1	2.0	2.0	1.9	0.2	0.3	0.1	
United Kingdom	1.9	1.8	1.6	1.5	0.1	0.1	0.0	
Emerging European Economies	1.6	3.7	3.1	2.7	0.6	0.5	0.2	
Central Europe	2.7	4.4	4.0	3.4	0.7	0.7	0.5	
Poland	2.9	4.6	4.1	3.5	0.7	0.7	0.5	
Southeastern European EU Member States	4.4	5.7	4.5	3.3	1.0	0.6	-0.1	
Southeastern European Non-EU Member States	3.1	2.3	3.4	3.5	-0.6	0.1	0.1	
Commonwealth of Independent States	-0.1	1.7	1.9	1.7	-0.1	0.2	0.0	
Russia	-0.2	1.5	1.7	1.5	-0.2	0.1	0.0	
Turkey	3.2	7.0	4.4	4.0	1.9	0.9	0.5	
Memorandum								
European Union	2.0	2.7	2.5	2.1	0.3	0.4	0.3	

Sources: IMF, *World Economic Outlook* (WEO); and IMF staff calculations.¹Pink shading indicates a downward revision.

tobacco taxes, inflation in the *euro area* has been revised up by 0.1 percentage point to 1.5 percent in 2018, and down 0.1 percentage point in 2019 to 1.6 percent, still below the ECB target. Inflation in the *Nordic economies* has been revised marginally downward relative to the forecast in October 2017. In the *United Kingdom*, inflation is expected to decline gradually toward the target over the next two years as import price pressures dissipate. However, that decline is expected to be offset by some recovery in wage growth, given a tighter labor market.

In *Central and SEE countries*, inflation has been revised slightly upward for 2018, reflecting the impact of higher energy prices. In *Poland*, inflation has also been revised up by 0.3 percentage point to 2.5 percent in 2018 due largely to higher energy prices. In *Romania*, inflation has been revised up more sizably by 1.3 percentage points to 4.7 percent (above the upper end of the central bank target) for 2018, reflecting strong wage growth and demand pressure. In *Russia*, inflation has been revised significantly downward to below 3 percent in 2018, reflecting faster-than-expected deceleration in 2017, and to about 3¾ percent

in 2019. For *Turkey*, inflation is revised significantly upward, reflecting the pass-through from the exchange rate depreciation and higher energy prices.

Risks Are Balanced in the Near Term, but Remain Tilted to the Downside in the Medium Term

Risks to the short-term outlook are broadly balanced:

- On the *upside*, there is still the potential for growth surprises. Business and consumer confidence indicators are robust, boosted by the strong cyclical upswing. High-frequency indicators, while somewhat softened, suggest solid growth in the months ahead, as market sentiment is buoyant and external conditions supportive (see the April 2018 *World Economic Outlook*). In addition, potential growth may be stronger and economic slack could be larger than currently assessed, thus the upswing may continue for longer before generating wage and price pressures.

Table 1.3. Inflation Projections
(Year-over-year percent change)

	April 2018 WEO				Difference from October 2017 WEO ¹		
	2016	2017	2018	2019	2017	2018	2019
Europe	2.0	2.9	2.8	2.8	0.0	0.1	0.1
Advanced European Economies	0.4	1.7	1.7	1.7	0.1	0.1	-0.1
Euro Area	0.2	1.5	1.5	1.6	0.1	0.1	-0.1
France	0.3	1.2	1.5	1.6	0.0	0.2	0.0
Germany	0.4	1.7	1.6	1.7	0.2	0.1	-0.3
Italy	-0.1	1.3	1.1	1.3	-0.1	-0.1	-0.1
Spain	-0.2	2.0	1.7	1.6	0.0	0.3	-0.1
Nordic Economies	1.7	1.7	1.6	1.8	0.1	-0.1	-0.1
Other European Advanced Economies	0.4	2.2	2.3	1.9	0.1	0.2	0.0
United Kingdom	0.7	2.7	2.7	2.2	0.1	0.1	-0.1
Emerging European Economies	5.6	5.5	5.3	5.3	-0.1	0.1	0.4
Central Europe	-0.4	2.1	2.6	2.7	0.0	0.1	0.1
Poland	-0.6	2.0	2.5	2.5	0.1	0.3	0.0
Southeastern European EU Member States	-1.4	1.3	3.7	2.7	0.2	1.0	0.0
Southeastern European Non-EU Member States	0.4	2.2	2.2	2.4	-0.1	-0.3	0.0
Commonwealth of Independent States	7.8	4.6	3.6	4.2	-0.4	-1.0	-0.2
Russia	7.1	3.7	2.8	3.7	-0.6	-1.2	-0.2
Turkey	7.8	11.1	11.4	10.5	0.3	2.0	1.7
Memorandum							
European Union	0.2	1.7	1.9	1.8	0.1	0.2	-0.1

Sources: IMF, *World Economic Outlook* (WEO); and IMF staff calculations.

¹Pink shading indicates a downward revision.

- On the *downside*, increasingly overstretched asset valuations and compressed term premiums at the global level (see the April 2018 *Global Financial Stability Report*) raise the possibility of a financial market correction and a rapid tightening of global financial conditions, which could dampen growth and confidence in both the short term and potentially the medium term (see Box 1.3 for a quantification exercise). A possible trigger could be a faster-than-expected increase in inflation in the advanced economies. A worsening of trade tensions and imposition of trade barriers could also weaken confidence and take a toll on economic activity.
- Beyond the near term, risks are clearly tilted to the downside. External downside risks facing the entire region stem from a mix of financial vulnerabilities, possible inward-looking policies globally, and a range of noneconomic factors.
- With financial conditions set to remain easy despite the onset of monetary policy normalization, financial vulnerabilities that

have accumulated over the years could give way to a rapid tightening in global financial conditions, with repercussions for growth (see the April 2018 *World Economic Outlook* and April 2018 *Global Financial Stability Report*). Inward-looking policies and rising protectionism could affect European countries as well as the rest of the world through trade, financial, and investment channels. Support for globalization has weakened in the *United States* and parts of Europe, as reflected in the renegotiations of free trade agreements such as the North American Free Trade Agreement and arrangements between the *United Kingdom* and the European Union. Retreat from cross-border integration and increases in tariffs and nontariff barriers in the context of these negotiations or elsewhere (as seen recently with the proposed US tariffs) could sour market sentiment, disrupt supply chains, slow the spread of technologies, and reduce global productivity and investment. A host of other risks, such as a significant slowdown in *China*, geopolitical tensions, and cyberattacks could cause financial instability and disrupt

growth. Domestic risks vary within the region and are tilted to the downside as well.

- With the reduction of monetary accommodation, highly indebted *euro area countries* could face challenges in coping with the higher financing costs in the absence of fiscal adjustments to rebuild buffers and structural reforms to improve productivity. Despite progress on bank cleanups, remaining vulnerabilities in parts of the *euro area* banking system could reignite financial distress. A tail of weaker internationally active banks that have lower levels of capital and provisions could face funding challenges in the case of a sudden bout of market turmoil or an unexpected downturn (see the April 2018 *Global Financial Stability Report*).
- Dissatisfaction with the slow pace of convergence after the crisis, and high unemployment rates in parts of the *euro area*, could challenge the cohesion of the Economic and Monetary Union and affect the reform efforts of existing members as well as non-EU countries that aspire to join the European Union.
- Protracted policy and economic uncertainty could weigh on growth. This includes uncertainties surrounding the negotiations of the post-Brexit arrangements between the European Union and the *United Kingdom*. A long list of tasks in those negotiations remains to be accomplished. Notably, a large and complex financial system exposes the *United Kingdom* and the global economy to risks associated with the transition to a new state of play. There are also policy uncertainties related to newly elected governments in major European countries.

Policy Priorities

With economic prospects continuing to improve in the short term, but medium-term downside risks persisting, policymakers should seize the moment to rebuild room for fiscal policy

maneuver and push forward with reforms to boost growth potential. In countries where inflation is still subdued, monetary policy should continue to be supportive to ensure a durable increase in inflation to targets. In countries where inflation is hitting targets, monetary policy should gradually normalize.

Monetary Policy

For the *euro area* and most of *advanced Europe*, monetary policy should remain strongly accommodative until inflation has durably converged to the central bank target. The commitment to raising inflation and inflation expectations remains key to generating durably higher inflation and lifting sluggish wages (Chapter 2). The ECB's recent decision to drop an explicit reference to possible future increases in the monthly pace of net asset purchases reflects an improving balance of risks. The ECB's net asset purchases were downsized in January 2018. The well-communicated recalibration of asset purchases, coupled with forward guidance on keeping policy rates at their extraordinarily low levels well past the horizon of net asset purchases, will continue to support favorable financing conditions. In the *United Kingdom*, following the rate increase in November 2017, future policy rate increases should be guided by evolving inflation conditions and the need to deal with uncertainties posed by Brexit. Similarly, in the *Czech Republic*, the central bank's steady approach toward normalization has been appropriate, and future policy decisions should continue to be data driven.

In *emerging Europe*, for *Central European economies*, given the more advanced stage of the recovery and strong wage growth, inflation pressure should be monitored carefully, and monetary policy should stand ready to adjust if inflation reaches or exceeds targets. In *Hungary*, monetary policy can remain supportive in the immediate term, but should be prepared to remove some stimulus if underlying inflation pressure picks up. In *Poland*, policy decisions should be data dependent, but should take into account the

fiscal stance and monetary transmission lags to avoid inflation overshooting its target. In *Russia*, there is room for further policy easing given declining inflation, while in *Turkey*, monetary policy should tighten further beyond what would be needed to keep pace with the US Federal Reserve's rate hikes to lower inflation meaningfully and reanchor expectations. Credible monetary tightening would also help underpin the currency and rebuild official reserves.

Fiscal Policy

For most countries across the region (in both *advanced* and *emerging Europe*), the economic expansion has buoyed revenues and allowed the headline fiscal balance to improve (Annex Table 1.9). However, only about a third of these countries have seen improvement in cyclically adjusted balances, and policies need to ensure more progress on this front. The trade-off between protecting growth and fiscal consolidation is now tilted more favorably toward consolidation to rebuild room to cope with future shocks. In the *euro area*, countries with limited fiscal space should consolidate in a growth-friendly way before monetary accommodation ends in order to avoid a sharper adjustment later or during a new downturn. Countries with ample fiscal space can and should use it to promote higher potential growth through more public investment, which can also help their external rebalancing (see the IMF 2017 *External Sector Report*). For the *Nordic economies*, a mildly contractionary fiscal stance is appropriate given the cyclical positions of the economies. For the *United Kingdom*, the fiscal framework needs to strike a balance between preserving sufficient flexibility to respond to shocks and committing to fiscal discipline and to rebuilding fiscal buffers. Going forward, steady fiscal consolidation remains critical to rebuild room for policy maneuver.

Regarding *emerging Europe*, buoyant tax revenues, thanks in part to past tax administration reforms in *Central Europe* and consolidation efforts in *Southeastern Europe*, have helped rein in fiscal

deficits. With a strong and well-entrenched cyclical recovery, the priority should be to continue to reduce structural fiscal deficits toward medium-term “close-to-balance” targets and to lower still-high debt levels. In *Russia*, the planned deficit reduction in 2018–20, underpinned by the new fiscal rule, is warranted due to permanently lower oil prices and the need to increase oil fund savings. The adjustment can be helped by measures to improve tax collection and the return on state assets—including dividend payouts and more permanent and better-targeted spending, such as parametric reform to the pension system, shifts to means testing of social assistance programs, and reductions in subsidies and tax expenditures. In *Turkey*, front-loaded fiscal consolidation—above the authorities' medium-term program targets and backed by well-defined and comprehensive revenue and spending measures—would support internal and external rebalancing and buoy investor sentiment.

Financial Policy

For many countries in the region, progress has been made on cleaning up bank balance sheets, but more remains to be done. For European Union member countries, the recent proposals from the EU and the ECB targeting NPLs are steps in the right direction. In addition, for the *euro area*, the authorities should focus on reducing impediments to NPL resolution caused by the fragmentation across the 19 jurisdictions' legal and regulatory frameworks, including by establishing minimum standards for valuation of loan collateral, consistent definitions of NPLs, and minimum standards for insolvency and creditor rights. The Single Supervisory Mechanism should continue to follow up on its NPL guidance—including by evaluating and monitoring bank-specific targets for NPL reduction—backed by its Pillar 2 powers. Equally, the European Banking Authority should press forward with its NPL sales platform. For the *Nordic economies*, macroprudential policy can help reduce vulnerabilities related to the housing sector. In the *Czech Republic*, the central bank should

be given binding powers over loan-to-value, debt-to-income, and debt-servicing-to-income ratios. Risks related to housing prices should also be carefully monitored in *Hungary*. Continued reduction of NPLs should be a priority for some *Eastern European economies*, where the economic recovery provides better prospects for asset sales. In *Turkey*, policies should aim at strengthening oversight and governance of the banking sector, where progress has been limited so far in implementing recommendations from the IMF's Financial Sector Assessment Program. Macroprudential policies should be revisited in areas where vulnerabilities are highest, particularly the highly leveraged corporate sector.

Structural Policy

In *advanced Europe*, countries should seize the moment to push forward structural reforms that boost competitiveness and potential growth and enhance resilience to shocks, while making sure that the gains from growth are shared widely. These include ambitious labor and product market reforms to close competitiveness gaps at the national level. Quality education and training that are well tailored to labor market needs will help improve labor productivity. Shifting taxes away from labor, better apprenticeship programs, and other active labor market policies will also help reduce high youth employment. As noted in the November 2017 *Regional Economic Outlook: Europe*, at the EU level, incentives for structural reforms in the form of targeted support from EU structural funds and outcome-based benchmarks could be combined with stricter enforcement of the Macroeconomic Imbalance Procedure.

In *emerging Europe*, structural reforms should focus on enhancing institutions (see Chapter 2 of the November 2017 *Regional Economic Outlook: Europe*) and on improving public sector efficiency (see the November 2016 *Regional Economic Issues: Central, Eastern, and Southeastern Europe*). For some countries, especially *SEE non-EU* and some *CIS countries*, priorities should also include improving the investment environment, boosting

labor participation rates of women and older workers (see Box 1.4 for a discussion of policy options), and reducing high youth unemployment rates. In the *Western Balkan economies*, strengthening institutions should help the renewed effort for EU engagement.

In *Russia*, institutional improvements are prerequisites to realizing dividends from investment in innovation and other reforms. In *Turkey*, the reforms should focus on increasing labor market flexibility and improving the business environment.

European Economic and Monetary Union (EMU) Architecture

The recovery provides an opportunity to move faster to deepen the Economic and Monetary Union (see the IMF 2017 Article IV Staff Report for the Euro Area). First, more actions are needed to complete the banking union. Instituting a backstop from the European Stability Mechanism to the Single Resolution Fund and setting up a European deposit insurance scheme with a fiscal backstop would mark an important step toward greater risk sharing. Second, with the *United Kingdom* leaving the single market, there is a more urgent need to upgrade supervisory capacity to oversee a slew of migrating financial intermediation with Brexit and increased market-based activities from advancing the Capital Markets Union (CMU). The CMU aims to widen financing choices of small and medium-size enterprises by increasing the investor base, promoting harmonization of insolvency regimes, and protecting cross-border investor rights. Third, there is a strong case for setting up central fiscal capacity for macroeconomic stabilization. It will take time to build support for such capacity, and it will likely require making access to central funds conditional on compliance with the fiscal rules and having mechanisms to prevent permanent transfers across countries. The central fiscal capacity (CFC) could prevent permanent transfers between countries through several mechanisms (Arnold and others 2018). First, the CFC could

employ something known as a “usage premium,” through which a country pays a premium in good times based on transfers it got in bad times. Second, the CFC could place a cap on the amount countries must contribute to prevent some

countries from becoming large net contributors. Finally, it could limit how much a country can receive, so that transfers do not substitute for necessary policy adjustment.

Box 1.1. The Capital Expenditure Recovery Cycle: Insights from the European Investment Bank Survey

How strong is the recovery in investment likely to be? Are businesses expanding or replacing their capacity? Could the current recovery in investment translate into more jobs, higher productivity and growth, and thus a more durable recovery? This box sheds light on these questions using a rich survey of a large number of firms across the European Union conducted by the European Investment Bank (EIB). The EIB Investment Survey (www.eib.org/eibis) provides information about firms' investment purposes, areas, and obstacles. It finds that the current investment recovery, accompanied by upgrading of the quality of capital and moving to new products, bodes well for productivity and employment, though some challenges, notably skill shortages, could be limiting.

The 2017 EIB survey of EU firms reveals that the replacement of existing capacity continues to dominate firms' investment activities. About half of firms' investment undertaken in 2017 was for replacement purposes. Investment in capacity expansion accounted for slightly more than a quarter of total investment, while the remaining 17 percent was for innovation purposes (Figure 1.1.1, panel 1).

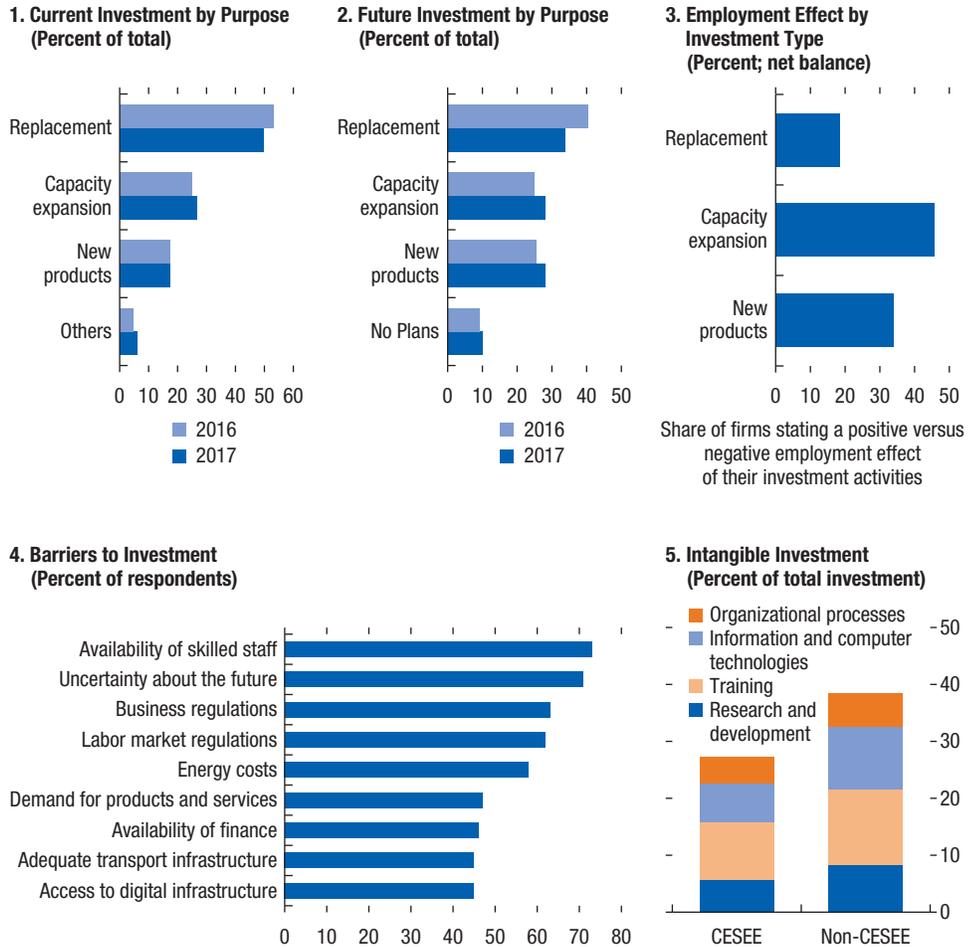
Looking ahead, investment in capacity expansion and new products is expected to account for more than half of the investment, boding well for productivity and employment. Compared with 2016, when asked about future plans, firms are increasingly prioritizing capacity expansion and investment in new activities (Figure 1.1.1, panel 2). The shift in investment focus is good news from a productivity angle as well as from an employment perspective. Investment for expanding capacity and innovation purposes, rather than for replacement purposes, tends to support more employment (Figure 1.1.1, panel 3).

Despite improvements in investment activity, challenges remain. Going forward, lack of staff with the right skills is considered by many firms as the most important factor limiting investment, closely followed by uncertainty about the future (Figure 1.1.1, panel 4). Skill constraints are particularly acute for newer member states, where emigration of skilled labor has been a long-standing issue (see Atoyán and others 2016) and is also reflected in indicators of labor shortages (see Chapter 2). In addition, investment in intangible assets, such as research and development, training, information and communication technology capital, and improvement of organizational processes, is weaker in *Central, Eastern, and Southeastern Europe* than in the rest of the European Union (Figure 1.1.1, panel 5). Investment in intangibles is likely an important factor in the convergence and catch-up process as firms move up the value chain (WIPO 2017). Here, too, lack of skilled staff could pose a challenge, since investment in intangibles is likely more skill-intensive. Another obstacle for investment in intangibles across Europe could be Europe's largely bank-based financial sector, which poses difficulties for using intangibles as collateral (EIB 2017).

This box was prepared by Phillip-Bastian Brutscher and Miroslav Kollar (European Investment Bank) and Raju Huidrom and Faezeh Raei (IMF).

Box 1.1 (continued)

Figure 1.1.1. Investment by Purpose, Types of Assets, and Barriers to Investment



Sources: European Investment Bank Survey; and IMF staff calculations.

Note: This box was prepared by Phillip-Bastian Brutscher and Miroslav Kollar (European Investment Bank) and Raju Huidrom and Faezeh Raei (IMF).

Box 1.2. How Different Is the Current Recovery in Europe Compared with Previous Ones?

Europe's recovery from the Great Recession has been long and uneven. It took about 10 years after the crisis for all countries in Europe to grow again in 2017. The years in the aftermath of the global financial crisis have been characterized by weak investment, lackluster credit growth, large output gaps, and stubbornly low inflation. The recent strengthening of the recovery in Europe on the back of still generally subdued inflation raises the question of how this recovery is different from previous recoveries from recessions, both for *advanced* and *emerging Europe*. Specifically, can one expect a more moderately paced but potentially longer recovery than after previous recessions?

To answer these questions, the dynamics of a set of economic and financial variables since the global financial crisis are compared with the recovery from the 1991 global recession. Among the global recessions in the past 50 years (1975, 1982, 1991, and 2009, as identified in the April 2012 *World Economic Outlook*), the 1991 crisis was chosen based on data availability and similarities, though for *emerging Europe*, the transition to a market economy makes comparability more difficult. First, both recoveries were preceded by a boom and bust in credit and stock markets in advanced economies. Second, the initial years of recovery involved challenges that complicated the recovery, notably, the 1992–93 Exchange Rate Mechanism crisis and the euro area debt crisis in 2011–13. The main obvious difference is the monetary union.

The current recovery differs from the past one in important ways. In the *advanced economies*, output growth has been much weaker, credit stagnant, and inflation very low. The same holds for the *emerging economies of Eastern Europe*, except for output. Regarding unemployment rates, in *emerging Europe* developments in the current cycle are notably better, reflecting in part stronger macroeconomic frameworks. In *advanced Europe*, despite the larger shock in the current episode, the recoveries are broadly similar in the early years due to more flexibility in labor markets in some of these countries. A comparison of the developments in real and financial variables between the two recoveries reveals the following (Figure 1.2.1).

Real GDP: In *advanced Europe*, growth gained momentum only five years after the global financial crisis as opposed to three years after 1991. The recent crisis was sharper and more globally synchronized than the 1991 recession. Also, the euro area debt crisis (2011–13) slowed the pace of recovery. The enduring legacy of the global financial crisis and the drawn-out process of balance sheet repair in corporate and household sectors led to a stubbornly slow recovery. In *emerging Europe excluding the CIS and Turkey*, the recovery has been stronger than in *advanced Europe*, and on average similar to that following the 1991 episode.

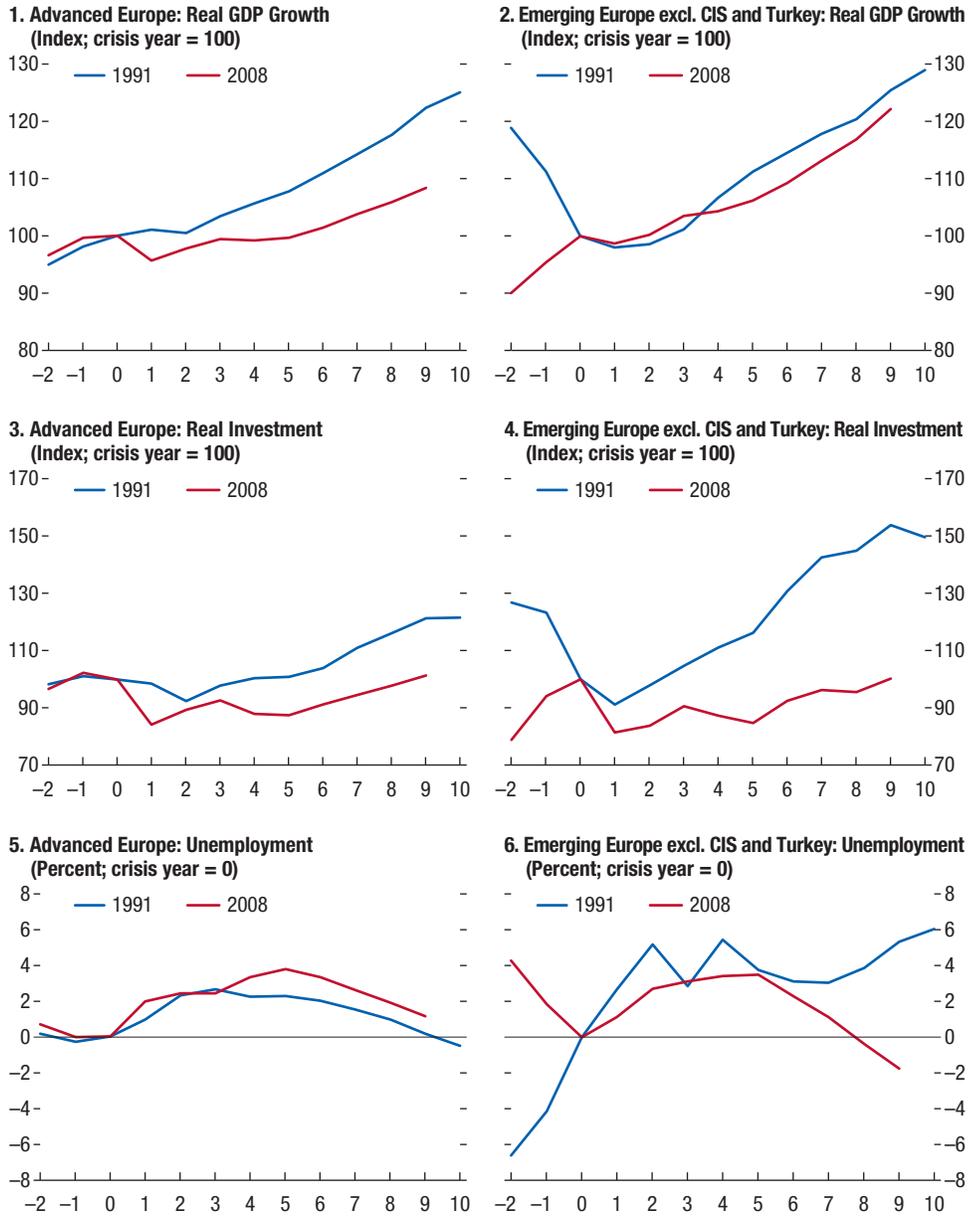
Investment: A feature of the aftermath of the global financial crisis has been the sustained weakness in investment in both *advanced* and *emerging Europe*. This deterioration can be traced to weaknesses in housing and credit markets and could, in some countries, reflect the need for a housing market correction.

Unemployment: Both recovery episodes are marked by higher unemployment rates. However, despite a much sharper contraction of output in 2009, there was a broadly similar rise in the unemployment rate in the first three years in *advanced Europe*. This may reflect more flexible labor markets and greater labor hoarding. Nonetheless following the double dip of 2011–13, the unemployment rate remains somewhat more elevated than in the previous crisis and has not yet returned to precrisis levels. In *emerging Europe*, the trajectory of the unemployment rate has been more favorable than following the 1991 recession, likely reflecting stronger macroeconomic frameworks and fundamentals in the current episode, but also the structural rise of unemployment in the early 1990s as these countries transitioned to market economies.

This box was prepared by Faezeh Raei.

Box 1.2 (continued)

Figure 1.2.1. Main Indicators after Crises
(T = 0 is the crisis year)

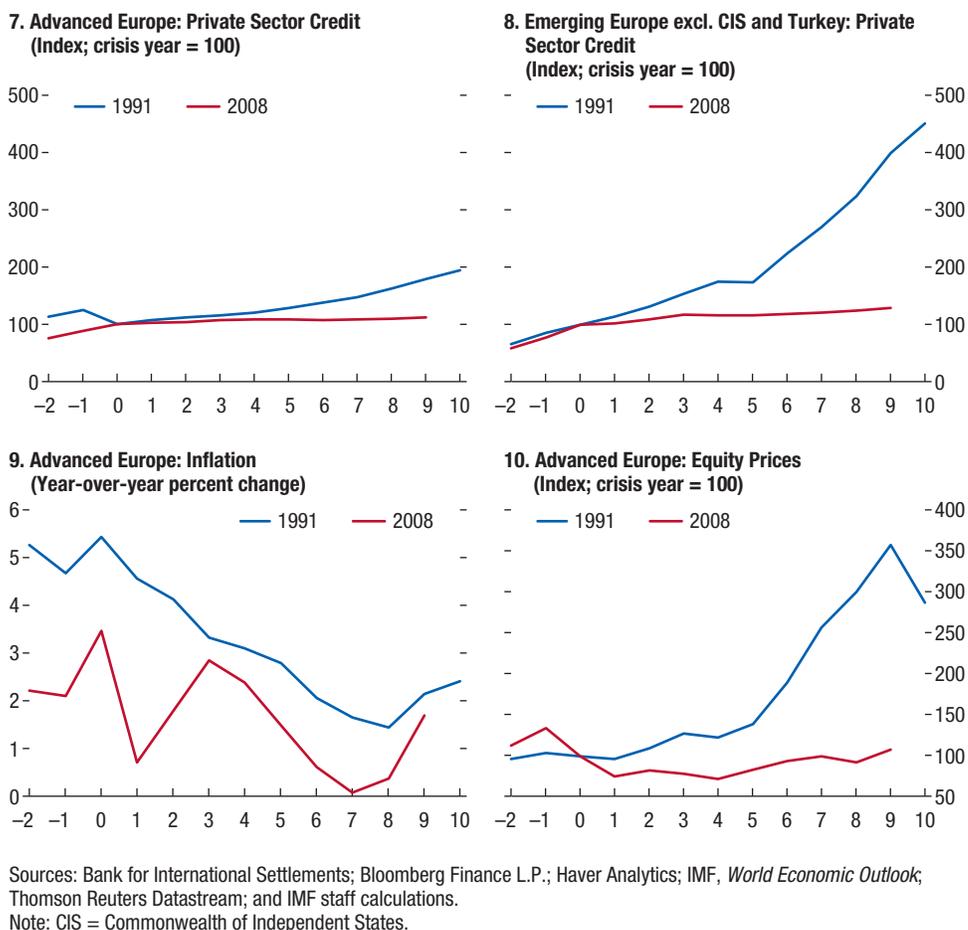


Sources: IMF *World Economic Outlook*; and IMF staff calculations.
Note: CIS = Commonwealth of Independent States.

Box 1.2 (continued)

Figure 1.2.1. Main Indicators after Crises (continued)

(T = 0 is the crisis year)



Inflation: Both recovery episodes are marked by declines in the inflation rate in the aftermath of crises. The initial drop in inflation after the global financial crisis was sharper. After seven years, average inflation has been lower by about 3 percentage points compared with the precrisis year. A salient difference is that initial inflation levels in the two episodes were different. In *advanced Europe*, average inflation hovered around 5 percent in 1991 and 3 percent in 2009. After the global financial crisis, this entailed below-target inflation rates for an extended period of time. For *emerging Europe*, higher inflation after 1991 was due to price liberalization on the way to market economies. But, like the advanced economies, most of the emerging market economies have now seen a prolonged period of very low inflation.

Equity prices: In *advanced Europe*, equity prices have been weaker in the current episode compared with the 1991 case. This is in line with developments in real GDP, as equity prices embody information about actual and expected output growth and the major weight of banks in the indices.

Credit growth: The current recovery in both *advanced* and *emerging Europe* has been creditless compared with the 1991 episode. For *advanced Europe*, the creditless nature of the current recovery is much more

Box 1.2 (*continued*)

pronounced, as even a decade after the initial shock credit has remained flat, compared with five years after the 1991 recession. This again highlights the depth of balance sheet challenges and the likely slow policy response to clean them up, which perpetuated the vicious circle of low credit and depressed demand. For *emerging Europe*, the current creditless recovery is in sharp contrast to the 1991 episode, when credit growth was strong as credit deepened during the transition to market economies.

What does this mean for growth going forward? Perhaps the main insight is that there are few compelling reasons to believe that the recovery in the *emerging economies of Eastern Europe* would go on for longer than the post-1991 recovery. While real GDP displays a broadly similar dynamic, investment has been much weaker, and this may increasingly constrain potential growth. In the *advanced economies*, the issue appears less clear, although there too the weakness of investment does not portend well for the future. This seems consistent with large markdowns in projected growth rates for potential output after the global financial crisis for all countries.

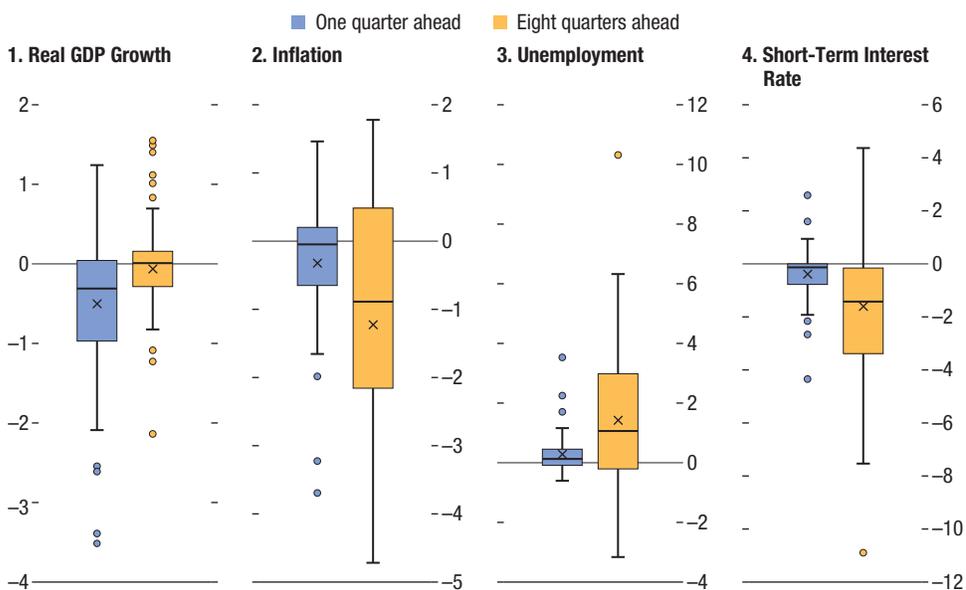
Box 1.3. What Do Large Stock Price Drops Mean for an Economy?

The financial market turbulence in early February 2018 was a reminder that asset prices can correct rapidly and trigger disruptive portfolio adjustments and increased volatility, with the potential to hamper growth. Indeed, there is extensive empirical evidence that asset price changes, particularly stock prices, have predictive power for growth in industrial economies (Fama 1990; Mauro 2000; Bluedorn, Decressin, and Terrones 2013). Asset prices incorporate information about expected growth and affect growth through wealth effects, the cost of capital, and confidence.

To gauge the implications of asset price declines for activity and policy responses, this box examines short- and medium-term developments in growth, inflation, unemployment, and short-term interest rates during past episodes of large asset price corrections in a sample of *G7 countries, Spain, and Sweden* from 1980 to 2017.

While there are notable differences across countries, it appears that in the aftermath of sharp asset price corrections—defined as asset price drops within the fifth percentile of the distribution of quarterly changes—GDP growth on average declines by 0.5 percentage point (quarter over quarter) in the first quarter. Growth recovers somewhat over the subsequent few quarters, but remains lower by 0.1 percentage point after eight quarters (Figure 1.3.1). Changes in inflation and unemployment are slower. Annual inflation tends to be

Figure 1.3.1. Changes in Main Indicators after a Large Stock Price Decline¹
(Quarter-over-quarter percent change)



Sources: Haver Analytics; Thomson Reuters Datastream; IMF, *International Financial Statistics*; and IMF staff calculations.
¹Whisker boxes represent the 25th and 75th percentile of the distribution of the respective variables. Within each box, the line and cross represent the average and median. The bars represent 10th and 90th percentiles.

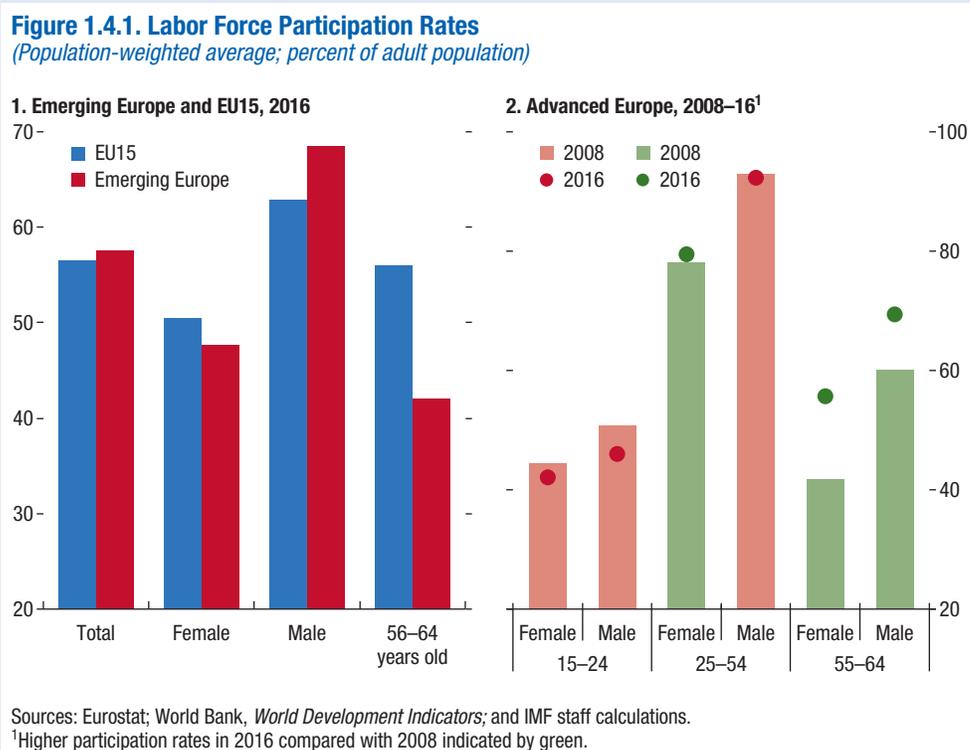
This box was prepared by Faezeh Raei.

Box 1.3 *(continued)*

lower by 0.3 percentage point in the quarter after a sharp asset price drop and by 1.2 percentage points after eight quarters. The decline in inflation seems more pronounced in the recent crisis than in the early 2000s. Given the low starting level of inflation, another step down in inflation would be problematic for many inflation-targeting central banks. After eight quarters of sharp asset price drops, unemployment is higher by 1 percentage point on average. Appreciable asset price declines also trigger monetary policy responses that are generally limited in the first quarter (–0.5 percentage point reduction in short-term rates) but followed by larger responses over the medium term (eight quarters later). The scope for large responses is much more limited today.

Box 1.4. Policies to Get People to Work: The European Experience

Emerging European countries are confronting some of the worst demographic trends in the region. The working-age population has been declining due to aging, persistent outward migration, and relatively low life expectancy (see the May 2016 *Regional Economic Issues: Central, Eastern, and Southeastern Europe*). At the same time, labor force participation among certain demographic groups—women and older workers—is low compared with advanced Europe (Figure 1.4.1, panel 1). Thus, getting more working-age people to actually work could mitigate some of these adverse trends.



This box complements Chapter 2 of the April 2018 *World Economic Outlook*, on labor force participation in advanced economies, by drawing on the European experience with policies that encourage labor force participation in various demographic groups (prime-age women, older workers, the young, and newly arrived migrants).¹

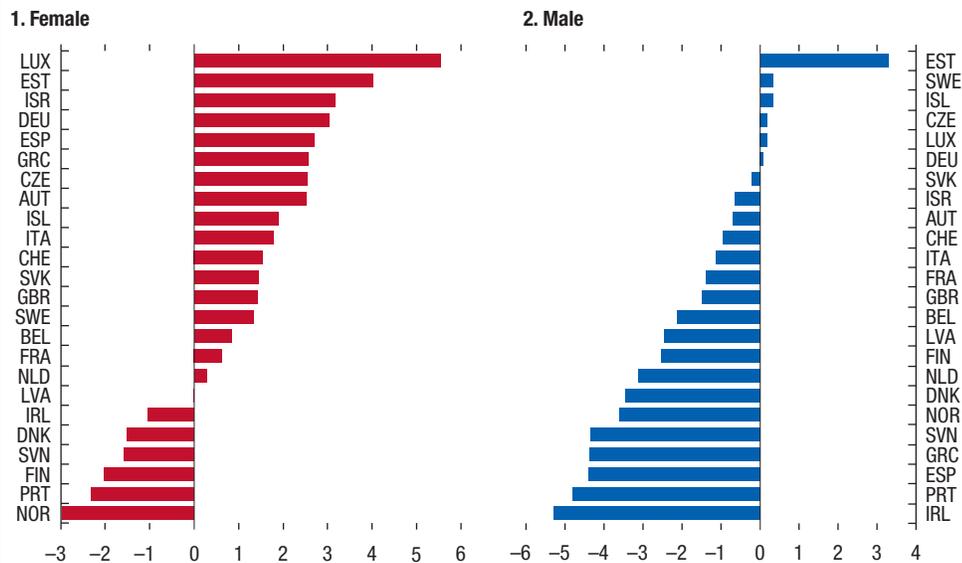
In line with global trends, overall labor force participation has fallen in many *advanced European economies* in the last decade (see Chapter 2 of the April 2018 *World Economic Outlook*). Workforce participation rates of men declined in most countries (Figure 1.4.2, panel 2), reflecting lower attachment rates of young and prime-age men (Figure 1.4.1, panel 2). Population aging and the prolonged impact of the global financial crisis have contributed to the recent decline in male workforce attachment, with technological progress

This box was prepared by Sylwia Nowak.

¹The labor force participation rate is the fraction of the adult population (age 15 and older) either working or looking for work. Labor force participation and workforce attachment are used interchangeably.

Box 1.4 (continued)

Figure 1.4.2. Change in Labor Force Participation Rates, 2008–16
(Percentage points)



Sources: Eurostat; and IMF staff calculations.

Note: Data labels in the figure use International Organization for Standardization (ISO) country codes.

further weighing on low-skilled male workers. In contrast, female labor force participation rose in about three-quarters of advanced European economies, thanks to increased workforce attachment of prime-age and older women, as more women obtained secondary and tertiary education. Across different age groups, labor force attachment has markedly increased among older workers, yet declined slightly among youth (Figure 1.4.1, panel 2).

Labor force participation is a function of personal choices, demographics, economic trends, and labor market policies and institutions. Tax benefit systems, retirement benefits, family-friendly policies, and active labor market policies matter, and they are particularly important in getting more women and older workers to participate in the workforce. Drawing on the European experience, specific policies include those addressing:

- Prime-age women:** Women's decisions to participate in the labor force are often affected by potential work flexibility, childcare and preschool availability and affordability, parental leave policies, and tax policy (Atoyán and Rahman 2017). In *Sweden*, policies such as parental leave, subsidized childcare, and scope for shorter working hours for parents with young children have made it easier for women to enter the workforce and return following childbirth. Also, the Swedish tax system does not discourage second earners (often women) from taking up work, as incomes are taxed individually. In *Germany*, a comprehensive set of labor market reforms introduced during 2003–05 (known as the “Hartz reforms”) increased opportunities to work part-time, which has enabled millions of German women to work. In addition, the 2007 reform of maternity leave benefits encouraged faster return to work after childbirth. In *Spain*, the 2012 labor market reforms also promoted part-time work. In *Israel*, the 2003 reform of untargeted child allowances encouraged women to work by reducing benefits and gradually eliminating the progressivity of benefits linked to the number of children.

Box 1.4 (continued)

- **Older workers:** The participation decisions of older workers are influenced by the statutory retirement age, the generosity of pension schemes, and the generosity of disability insurance. In *Germany*, the 2007 pension reform gradually increases the statutory retirement age to 67 from 65 by 2030. The pension system also became less generous, as the replacement rates were reduced. More recently, *Germany* introduced financial incentives to encourage work past the mandatory retirement age coupled with more flexible work schedules, while lowering the retirement age for certain workers. In *Sweden*, an earned income tax credit reform was introduced in 2007 to encourage an increased labor supply; the size of the tax credit was larger for workers older than 65. In addition, the payroll tax rate was more than halved for these workers. These reforms were combined with stricter eligibility criteria in the disability insurance program (Laun and Palme 2017).
- **The young:** High labor costs (both the tax wedge and minimum wages) affect employment opportunities for entry-level workers, who require on-the-job training (Banerji and others 2014). In *Germany*, about 50 percent of all high school graduates receive dual vocational training to acquire skills and enhance job readiness. This training is a combination of company-based apprenticeships and theoretical classes at vocational colleges. Apprentices are exempted from minimum wage regulations and instead receive a “training allowance” of about 50 percent of the national minimum wage. The lower wages early in their careers pay for their training but result in higher productivity and better lifetime incomes.
- **Immigrants:** Policies that encourage labor market integration of migrants are associated with higher participation of prime-age workers. In *Sweden*, immigrants are integrated into the labor market mainly through general measures for the unemployed among the entire population, regardless of country of birth. These general measures are supplemented by targeted support for newly arrived refugees. Since 2008, newly arrived refugees and their relatives have been eligible for up to two years of personalized language training; employment assistance (for example, validation of education and prior work experience); and personal counseling. Participation in this introductory program is voluntary, but the available financial benefits and housing support are conditional on full-time participation. In *Germany*, intensive vocational language training was also used to help integrate more than 1 million refugees into the labor market.

In addition to specific policies, active labor market policies have centered on maintaining the motivation of jobseekers to actively seek employment, while improving their employability and helping them find appropriate jobs. In *Germany*, the Hartz reforms focused on improving job-search efficiency, modernizing public employment services, increasing employment flexibility, and activating the unemployed by making unemployment benefits conditional on tighter rules for job search and acceptance. The reforms introduced measures directly supporting integration into regular employment, such as wage subsidies paid to employers for hiring hard-to-place workers and start-up subsidies. Also, labor market institutions were deregulated to allow temporary and fixed-term contract work. In the *United Kingdom*, the 2008 reform of the welfare program for low-income single parents (“Lone Parent Obligations”) provided out-of-work single parents with financial incentives to look for paid employment, alongside support for finding jobs.

Annex Table 1.1. GDP Growth
(Year-over-year percent change)

	2016	April 2018 WEO			October 2017 WEO			Difference		
		2017	2018	2019	2017	2018	2019	2017	2018	2019
Europe	1.8	2.8	2.6	2.2	2.4	2.1	2.0	0.4	0.4	0.3
Advanced European Economies	1.9	2.4	2.3	2.0	2.1	1.9	1.7	0.3	0.4	0.3
Euro Area	1.8	2.3	2.4	2.0	2.1	1.9	1.7	0.2	0.5	0.3
Austria	1.5	2.9	2.6	1.9	2.3	1.9	1.5	0.6	0.8	0.5
Belgium	1.5	1.7	1.9	1.7	1.6	1.6	1.5	0.1	0.2	0.2
Cyprus	3.0	3.9	3.6	3.0	3.4	2.6	2.4	0.5	1.0	0.6
Estonia	2.1	4.9	3.9	3.2	4.0	3.7	3.0	0.9	0.2	0.2
Finland	2.1	3.0	2.6	2.0	2.8	2.3	1.8	0.2	0.2	0.1
France	1.2	1.8	2.1	2.0	1.6	1.8	1.9	0.3	0.3	0.1
Germany	1.9	2.5	2.5	2.0	2.0	1.8	1.5	0.5	0.7	0.6
Greece	-0.2	1.4	2.0	1.8	1.8	2.6	1.9	-0.4	-0.6	-0.1
Ireland	5.1	7.8	4.5	4.0	4.1	3.4	3.0	3.7	1.1	1.0
Italy	0.9	1.5	1.5	1.1	1.5	1.1	0.9	0.0	0.4	0.2
Latvia	2.2	4.5	4.0	3.5	3.8	3.9	3.5	0.7	0.1	0.0
Lithuania	2.3	3.8	3.2	3.0	3.5	3.5	3.4	0.3	-0.3	-0.4
Luxembourg	3.1	3.5	4.3	3.7	3.9	3.6	3.3	-0.3	0.7	0.5
Malta	5.5	6.6	5.7	4.6	5.1	4.4	3.8	1.4	1.3	0.8
Netherlands	2.2	3.1	3.2	2.4	3.1	2.6	1.9	0.0	0.6	0.5
Portugal	1.6	2.7	2.4	1.8	2.5	2.0	1.7	0.2	0.4	0.1
Slovak Republic	3.3	3.4	4.0	4.2	3.3	3.7	3.9	0.1	0.3	0.3
Slovenia	3.1	5.0	4.0	3.2	4.0	2.5	2.1	1.0	1.5	1.1
Spain	3.3	3.1	2.8	2.2	3.1	2.5	2.0	0.0	0.2	0.2
Nordic Economies	2.3	2.2	2.3	2.1	2.3	2.0	2.0	-0.1	0.3	0.2
Denmark	2.0	2.1	2.0	1.9	1.9	1.8	1.8	0.2	0.2	0.1
Iceland	7.5	3.6	3.2	3.0	5.5	3.3	3.1	-1.9	0.0	-0.1
Norway	1.1	1.8	2.1	2.1	1.4	1.6	1.9	0.5	0.5	0.2
Sweden	3.2	2.4	2.6	2.2	3.1	2.4	2.1	-0.7	0.2	0.2
Other European Advanced Economies	2.1	2.0	2.0	1.9	1.9	1.7	1.8	0.2	0.3	0.1
Czech Republic	2.6	4.3	3.5	3.0	3.5	2.6	2.3	0.8	0.9	0.8
Israel	4.0	3.3	3.3	3.5	3.1	3.4	3.0	0.2	-0.1	0.5
San Marino	2.2	1.5	1.3	1.3	1.2	1.3	1.3	0.3	0.0	0.0
Switzerland	1.4	1.1	2.3	2.0	1.0	1.3	1.6	0.1	1.0	0.4
United Kingdom	1.9	1.8	1.6	1.5	1.7	1.5	1.6	0.1	0.1	0.0
Emerging European Economies	1.6	3.7	3.1	2.7	3.1	2.6	2.5	0.6	0.5	0.2
Central Europe	2.7	4.4	4.0	3.4	3.7	3.4	3.0	0.7	0.7	0.5
Hungary	2.2	4.0	3.8	3.0	3.2	3.4	2.8	0.8	0.4	0.2
Poland	2.9	4.6	4.1	3.5	3.8	3.3	3.0	0.7	0.7	0.5
Southeastern European EU Member States	4.4	5.7	4.5	3.3	4.7	3.9	3.4	1.0	0.6	-0.1
Bulgaria	3.9	3.6	3.8	3.1	3.6	3.2	2.9	0.0	0.6	0.2
Croatia	3.2	2.8	2.8	2.6	2.9	2.7	2.5	-0.2	0.1	0.1
Romania	4.8	7.0	5.1	3.5	5.5	4.4	3.8	1.5	0.7	-0.3
Southeastern European Non-EU Member States	3.1	2.3	3.4	3.5	3.0	3.3	3.4	-0.6	0.1	0.1
Albania	3.4	3.9	3.7	3.8	3.7	3.7	3.8	0.2	0.0	0.0
Bosnia and Herzegovina	3.2	2.7	3.2	3.5	2.5	2.6	2.7	0.2	0.6	0.8
Kosovo	4.1	4.1	4.0	4.0	3.5	3.5	3.6	0.6	0.5	0.4
Macedonia, FYR	2.9	1.9	2.8	3.0	2.5	3.2	3.4	-0.6	-0.4	-0.4
Montenegro	2.9	4.2	3.1	2.4	3.0	2.8	2.7	1.2	0.3	-0.3
Serbia	2.8	1.8	3.5	3.5	3.0	3.5	3.5	-1.2	0.0	0.0
Commonwealth of Independent States	-0.1	1.7	1.9	1.7	1.8	1.7	1.7	-0.1	0.2	0.0
Belarus	-2.5	2.4	2.8	2.4	0.7	0.7	0.9	1.6	2.2	1.5
Moldova	4.3	4.0	3.5	3.8	4.0	3.7	3.8	0.0	-0.2	0.0
Russia	-0.2	1.5	1.7	1.5	1.8	1.6	1.5	-0.2	0.1	0.0
Ukraine	2.4	2.5	3.2	3.3	2.0	3.2	3.5	0.5	0.0	-0.3
Turkey	3.2	7.0	4.4	4.0	5.1	3.5	3.5	1.9	0.9	0.5
Memorandum										
World	3.2	3.8	3.9	3.9	3.6	3.7	3.7	0.1	0.2	0.2
Advanced Economies	1.7	2.3	2.5	2.2	2.2	2.0	1.8	0.2	0.4	0.4
Emerging Market and Developing Economies	4.4	4.8	4.9	5.1	4.6	4.9	5.0	0.1	0.1	0.1
European Union	2.0	2.7	2.5	2.1	2.3	2.1	1.8	0.3	0.4	0.3
United States	1.5	2.3	2.9	2.7	2.2	2.3	1.9	0.1	0.6	0.8
China	6.7	6.9	6.6	6.4	6.8	6.5	6.3	0.1	0.1	0.1
Japan	0.9	1.7	1.2	0.9	1.5	0.7	0.8	0.2	0.6	0.1

Sources: IMF, *World Economic Outlook* (WEO); and IMF staff calculations.

Annex Table 1.2. GDP Growth: Comparison between WEO and Consensus Forecast*(Year-over-year percent change)*

	April 2018 WEO			Consensus Forecast		Difference	
	2017	2018	2019	2018	2019	2018	2019
Europe	2.8	2.6	2.2	...	...	...	...
Advanced European Economies	2.4	2.3	2.0	...	...	...	...
Euro Area	2.3	2.4	2.0	2.4	1.9	0.0	0.1
Austria	2.9	2.6	2.0	2.7	2.1	-0.1	-0.2
Belgium	1.7	1.9	1.7	1.8	1.6	0.1	0.1
Cyprus	3.9	3.6	3.0	3.3	2.9	0.3	0.1
Estonia	4.9	3.9	3.2	3.5	3.1	0.4	0.1
Finland	3.0	2.6	2.0	2.5	2.0	0.1	0.0
France	1.8	2.1	2.0	2.1	1.8	0.0	0.2
Germany	2.5	2.5	2.0	2.4	1.9	0.1	0.1
Greece	1.4	2.0	1.8	1.9	2.2	0.1	-0.4
Ireland	7.8	4.5	4.0	4.4	3.4	0.1	0.6
Italy	1.5	1.5	1.1	1.5	1.2	0.1	-0.1
Latvia	4.5	4.0	3.5	3.9	3.2	0.1	0.3
Lithuania	3.8	3.2	3.0	3.2	2.8	0.0	0.3
Luxembourg	3.5	4.3	3.7	...	...	...	...
Malta	6.6	5.7	4.6	...	...	...	...
Netherlands	3.1	3.2	2.4	2.8	2.3	0.4	0.1
Portugal	2.7	2.4	1.8	2.3	2.0	0.1	-0.2
Slovak Republic	3.4	4.0	4.2	3.8	3.7	0.2	0.5
Slovenia	5.0	4.0	3.2	4.1	3.3	-0.1	-0.1
Spain	3.1	2.8	2.2	2.7	2.3	0.0	-0.1
Nordic Economies	2.2	2.3	2.1	...	...	...	...
Denmark	2.1	2.0	1.9	1.9	1.9	0.1	0.1
Iceland	3.6	3.2	3.0	...	...	...	...
Norway	1.8	2.1	2.1	2.1	2.1	0.0	0.0
Sweden	2.4	2.6	2.2	2.7	2.1	-0.1	0.1
Other European Advanced Economies	2.0	2.0	1.9	...	...	...	...
Czech Republic	4.3	3.5	3.0	3.5	3.0	0.1	0.1
Israel	3.3	3.3	3.5	3.3	3.2	0.0	0.3
San Marino	1.5	1.3	1.3	...	...	...	...
Switzerland	1.1	2.3	2.0	2.1	1.7	0.3	0.3
United Kingdom	1.8	1.6	1.5	1.6	1.5	0.1	0.0
Emerging European Economies	3.7	3.1	2.7	...	...	...	...
Central Europe	4.4	4.0	3.4	4.0	3.3	0.0	0.1
Hungary	4.0	3.8	3.0	3.7	2.9	0.1	0.1
Poland	4.6	4.1	3.5	4.0	3.4	0.0	0.2
Southeastern European EU Member States	5.7	4.5	3.3	4.2	3.4	0.3	-0.1
Bulgaria	3.6	3.8	3.1	3.7	3.4	0.1	-0.3
Croatia	2.8	2.8	2.6	2.8	2.7	0.0	-0.1
Romania	7.0	5.1	3.5	4.7	3.6	0.4	-0.1
Southeastern European Non-EU Member States	2.3	3.4	3.5	...	...	...	...
Albania	3.9	3.7	3.8	3.9	3.9	-0.2	-0.1
Bosnia and Herzegovina	2.7	3.2	3.5	3.0	3.1	0.2	0.4
Kosovo	4.1	4.0	4.0	...	...	...	...
Macedonia, FYR	0.0	2.8	3.0	2.9	3.2	-0.1	-0.2
Montenegro	4.2	3.1	2.4	...	...	...	...
Serbia	1.8	3.5	3.5	3.1	3.2	0.4	0.3
Commonwealth of Independent States	1.7	1.9	1.7	2.0	1.9	-0.1	-0.3
Belarus	2.4	2.8	2.4	2.3	1.9	0.5	0.5
Moldova	4.0	3.5	3.8	4.5	4.6	-1.0	-0.8
Russia	1.5	1.7	1.5	1.9	1.8	-0.2	-0.3
Ukraine	2.5	3.2	3.3	2.9	3.1	0.3	0.1
Turkey	7.0	4.4	4.0	4.1	3.9	0.3	0.1
Memorandum							
World	3.8	3.9	3.9	...	...	...	...
Advanced Economies	2.3	2.5	2.2	...	...	...	...
Emerging Market and Developing Economies	4.8	4.9	5.1	...	...	...	...
European Union	2.7	2.5	2.1	...	...	...	...
United States	2.3	2.9	2.7	2.8	2.6	0.1	0.1
China	6.9	6.6	6.4	6.5	6.3	0.0	0.1
Japan	1.7	1.2	0.9	1.4	1.1	-0.2	-0.2

Sources: Consensus Forecast (March 2018); IMF, *World Economic Outlook* (WEO); and IMF staff calculations.

Annex Table 1.3. Growth Rate of GDP per Capita*(Year-over-year percent change; in 2011 international dollars at purchasing power parity)*

		April 2018 WEO					
	2016	2017	2018	2019	2020	2021	2022
Europe	1.4	2.5	2.3	2.0	1.8	1.7	1.7
Advanced European Economies	1.4	2.0	2.0	1.7	1.4	1.4	1.3
Euro Area	1.5	2.3	2.2	1.9	1.6	1.5	1.4
Austria	0.2	2.0	1.8	1.2	0.8	0.9	0.9
Belgium	0.8	1.3	1.4	1.2	0.9	1.0	1.0
Cyprus	2.9	3.3	2.9	2.3	2.0	1.9	1.8
Estonia	2.2	5.1	4.2	3.5	3.3	3.3	3.2
Finland	1.8	2.7	2.2	1.6	1.2	0.9	0.9
France	0.8	1.5	1.6	1.6	1.3	1.2	1.2
Germany	1.0	2.1	2.4	1.9	1.5	1.4	1.4
Greece	0.4	1.5	2.4	2.2	2.2	2.2	1.6
Ireland	4.1	7.2	3.5	3.0	2.5	2.0	1.8
Italy	1.1	1.6	1.3	1.2	0.9	0.8	0.9
Latvia	3.1	5.6	4.3	3.8	3.5	3.4	3.3
Lithuania	3.7	5.4	4.7	4.6	4.3	4.3	4.1
Luxembourg	0.7	1.2	1.9	1.4	0.9	0.8	0.7
Malta	3.0	4.3	4.1	3.4	3.2	2.9	2.8
Netherlands	1.7	2.8	2.9	2.1	1.8	1.7	1.6
Portugal	1.9	2.9	2.8	2.1	1.8	1.5	1.5
Slovak Republic	3.2	3.3	3.9	4.1	3.7	3.6	3.4
Slovenia	3.1	4.9	3.9	3.1	2.6	2.5	2.2
Spain	3.3	3.2	2.9	2.3	2.0	1.8	1.8
Nordic Economies	1.1	1.2	0.9	1.1	1.0	1.0	0.9
Denmark	1.1	1.4	1.2	1.2	1.1	1.0	1.0
Iceland	6.3	2.5	2.1	1.8	1.6	1.6	1.5
Norway	0.2	1.1	0.8	1.0	0.8	0.7	0.8
Sweden	1.7	1.1	0.8	1.2	1.0	1.0	0.9
Other European Advanced Economies	1.2	1.3	1.2	1.2	1.1	1.1	1.2
Czech Republic	2.4	4.0	3.4	2.9	2.4	2.4	2.4
Israel	1.9	1.4	1.4	1.6	1.1	1.1	1.1
San Marino	1.4	0.8	0.6	0.5	0.6	0.6	0.6
Switzerland	0.3	0.0	0.9	0.8	0.7	0.4	0.4
United Kingdom	1.1	1.2	1.0	0.9	1.0	1.1	1.2
Emerging European Economies	1.3	3.5	2.9	2.5	2.4	2.4	2.4
Central Europe	2.9	4.5	4.1	3.5	3.0	2.8	2.8
Hungary	2.5	4.3	4.1	3.3	2.9	2.7	2.5
Poland	3.0	4.5	4.1	3.6	3.0	2.8	2.9
Southeastern European EU Member States	5.1	6.3	5.1	3.9	3.6	3.5	3.5
Bulgaria	4.7	4.2	4.4	3.7	3.4	3.4	3.4
Croatia	4.0	3.3	3.3	3.1	3.0	2.8	2.7
Romania	5.4	7.6	5.7	4.1	3.7	3.7	3.8
Southeastern European Non-EU Member States	3.4	2.4	3.4	3.5	3.8	3.9	4.0
Albania	3.5	3.9	3.8	3.9	4.0	4.1	4.1
Bosnia and Herzegovina	3.8	3.0	3.3	3.6	3.8	4.1	4.2
Kosovo	4.0	2.6	2.5	2.5	2.5	2.5	2.5
Macedonia, FYR	2.8	-0.1	2.7	2.9	3.1	3.3	3.4
Montenegro	2.9	4.1	3.0	2.3	3.0	3.0	3.2
Serbia	3.3	2.2	3.9	3.9	4.4	4.4	4.4
Commonwealth of Independent States	0.0	1.7	2.0	1.8	1.8	1.9	1.9
Belarus	-2.7	2.9	3.3	3.0	2.5	2.5	2.5
Moldova	4.3	4.1	3.6	3.9	3.9	4.0	4.0
Russia	-0.3	1.5	1.7	1.5	1.6	1.6	1.6
Ukraine	2.9	2.7	3.4	3.5	3.7	3.9	4.2
Turkey	1.8	5.7	3.1	2.7	2.4	2.3	2.4
Memorandum							
World	1.9	2.4	2.7	2.7	2.5	2.5	2.5
Advanced Economies	1.1	1.9	2.0	1.8	1.3	1.3	1.1
Emerging Market and Developing Economies	2.8	3.3	3.6	3.7	3.7	3.7	3.7
European Union	1.7	2.4	2.3	2.0	1.7	1.6	1.6
United States	0.7	1.5	2.1	1.8	1.1	0.9	0.7
China	6.1	6.3	6.0	5.9	5.8	5.6	5.3
Japan	1.0	1.9	1.4	1.2	0.7	1.1	0.9

Sources: IMF, *World Economic Outlook* (WEO); and IMF staff calculations.

Annex Table 1.4. Domestic Demand
(Year-over-year percent change)

	2016	April 2018 WEO				October 2017 WEO			Difference		
		2017	2018	2018	2019	2017	2018	2019	2017	2018	2019
Europe	2.0	2.8	2.5	2.2	2.4	2.2	1.9	0.4	0.4	0.2	
Advanced European Economies	2.4	2.0	2.2	1.9	2.1	1.9	1.7	-0.2	0.3	0.2	
Euro Area	2.4	2.0	2.2	1.9	2.1	1.9	1.7	-0.1	0.4	0.3	
Austria	2.1	2.6	2.1	1.9	2.2	1.5	1.6	0.4	0.7	0.3	
Belgium	2.1	1.4	1.8	1.7	1.7	1.7	1.5	-0.3	0.1	0.2	
Cyprus	4.8	1.7	5.1	4.2	1.9	2.1	2.7	-0.2	3.0	1.6	
Estonia	3.2	4.2	5.5	5.2	3.7	4.8	4.1	0.5	0.8	1.1	
Finland	2.7	2.0	1.8	1.6	2.3	2.2	1.8	-0.2	-0.3	-0.2	
France	1.9	2.3	1.9	1.8	1.9	1.7	1.8	0.4	0.2	0.0	
Germany	2.4	2.4	2.3	2.0	2.1	2.0	1.7	0.3	0.3	0.3	
Greece	0.6	1.2	1.7	1.7	0.6	2.4	1.9	0.6	-0.7	-0.2	
Ireland	21.2	-7.8	5.7	4.3	5.0	3.7	3.2	-12.8	2.0	1.1	
Italy	1.1	1.4	1.6	1.1	1.6	1.1	0.8	-0.3	0.5	0.4	
Latvia	2.5	7.5	6.1	4.2	4.9	5.4	3.8	2.6	0.7	0.3	
Lithuania	2.5	3.4	4.1	4.0	4.4	3.6	3.7	-1.0	0.4	0.3	
Luxembourg	1.6	2.7	3.9	3.1	3.9	3.1	2.5	-1.2	0.8	0.6	
Malta	1.3	1.0	3.8	4.0	2.8	2.8	2.7	-1.9	1.1	1.3	
Netherlands	1.8	2.4	3.0	2.7	2.4	2.2	1.9	0.0	0.8	0.8	
Portugal	1.6	2.8	2.7	1.9	2.6	2.1	1.8	0.2	0.6	0.1	
Slovak Republic	0.9	3.2	3.5	3.6	3.1	3.4	3.1	0.1	0.1	0.5	
Slovenia	2.9	4.1	4.6	3.8	4.4	2.7	2.8	-0.3	1.9	1.0	
Spain	2.6	2.9	2.6	2.1	2.6	2.2	1.9	0.3	0.3	0.2	
Nordic Economies	3.0	2.5	2.4	2.3	2.6	2.3	2.2	-0.1	0.1	0.0	
Denmark	2.4	1.7	2.1	2.1	2.2	2.1	2.0	-0.5	0.0	0.1	
Iceland	8.5	6.4	4.8	3.8	6.3	3.0	4.2	0.1	1.8	-0.4	
Norway	2.7	2.3	2.4	2.2	2.1	2.0	2.1	0.3	0.3	0.2	
Sweden	3.3	2.9	2.6	2.3	3.1	2.5	2.4	-0.2	0.0	-0.1	
Other European Advanced Economies	2.2	1.6	1.8	1.7	1.8	1.5	1.6	-0.2	0.2	0.1	
Czech Republic	1.5	3.6	3.5	3.4	3.5	3.0	2.7	0.1	0.5	0.6	
Israel	6.0	3.5	3.4	3.5	2.8	4.3	2.7	0.8	-0.9	0.9	
San Marino	4.0	1.1	4.7	2.8	1.0	1.5	1.6	0.0	3.2	1.2	
Switzerland	0.4	0.3	1.5	1.5	0.8	0.8	1.5	-0.5	0.7	-0.1	
United Kingdom	2.2	1.4	1.4	1.3	1.6	1.2	1.4	-0.2	0.2	-0.1	
Emerging European Economies	1.1	4.7	3.2	2.6	3.1	2.8	2.5	1.6	0.4	0.2	
Central Europe	2.1	5.2	4.1	3.8	3.6	3.7	3.2	1.6	0.4	0.6	
Hungary	1.6	6.0	2.6	3.7	1.4	3.5	2.7	4.5	-0.8	1.1	
Poland	2.3	5.0	4.5	3.8	4.1	3.8	3.3	0.8	0.7	0.5	
Southeastern European EU Member States	4.3	6.7	5.8	3.5	5.4	4.8	3.7	1.3	1.0	-0.2	
Bulgaria	1.7	5.7	4.7	4.1	4.7	3.8	3.0	0.9	0.9	1.0	
Croatia	3.4	3.3	3.2	3.0	3.7	3.2	2.9	-0.4	0.0	0.1	
Romania	5.3	7.7	6.8	3.4	6.0	5.5	4.0	1.8	1.3	-0.6	
Southeastern European Non-EU Member States	3.1	2.1	3.1	3.2	2.5	2.8	2.9	-0.4	0.4	0.4	
Albania	1.3	1.3	2.4	3.0	3.7	1.4	2.1	-2.4	1.1	1.0	
Bosnia and Herzegovina	3.2	2.9	4.0	4.0	2.8	3.0	3.2	0.2	1.0	0.9	
Kosovo	...	...	...	...	...	...	...	...	...	...
Macedonia, FYR	5.7	0.1	2.7	2.5	1.6	2.6	2.7	-1.5	0.1	-0.2	
Montenegro	8.2	6.0	3.5	1.5	3.8	4.2	1.5	2.2	-0.7	0.1	
Serbia	2.3	2.1	3.1	3.3	2.2	3.0	3.2	0.0	0.0	0.2	
Commonwealth of Independent States	-1.4	3.7	2.1	1.6	2.4	1.9	1.5	1.3	0.2	0.1	
Belarus	-5.4	2.2	3.3	2.7	0.2	0.4	0.4	2.0	2.9	2.3	
Moldova	2.4	2.5	1.2	4.6	-0.9	6.8	4.0	3.4	-5.6	0.6	
Russia	-1.9	3.6	1.8	1.3	2.3	1.7	1.3	1.2	0.1	0.0	
Ukraine	6.0	5.3	5.0	4.3	4.1	4.0	4.2	1.2	1.0	0.1	
Turkey	4.4	6.2	3.9	3.7	3.6	3.5	3.5	2.6	0.4	0.2	
Memorandum											
World	3.0	3.9	4.1	4.0	3.9	4.1	4.0	3.9	4.1	4.0	
Advanced Economies	1.8	2.3	2.7	2.4	2.3	2.7	2.4	2.3	2.7	2.4	
Emerging Market and Developing Economies	3.9	5.0	5.1	5.1	5.0	5.1	5.1	5.0	5.1	5.1	
European Union	2.5	2.4	2.5	2.1	2.4	2.1	1.9	0.0	0.4	0.2	
United States	1.7	2.4	3.5	3.2	2.3	2.5	2.0	0.1	1.0	1.2	
China	7.6	6.4	6.7	6.6	6.9	6.9	6.7	-0.5	-0.2	-0.1	
Japan	0.4	1.2	1.1	1.0	1.1	0.7	1.0	0.1	0.3	0.0	

Sources: IMF, *World Economic Outlook* (WEO); and IMF staff calculations.

Annex Table 1.5. Gross Investment
(Percent of GDP)

	April 2018 WEO				October 2017 WEO			Difference		
	2016	2017	2018	2019	2017	2018	2019	2017	2018	2019
Europe	21.4	21.9	22.0	22.2	21.6	21.9	22.1	0.2	0.1	0.2
Advanced European Economies	20.3	20.5	20.7	20.9	20.5	20.6	20.8	0.0	0.1	0.1
Euro Area	20.4	20.9	21.1	21.3	20.6	20.8	21.0	0.2	0.3	0.2
Austria	24.1	25.0	25.1	25.0	24.1	24.0	24.1	0.8	1.0	0.9
Belgium	23.9	23.8	24.1	24.5	23.5	23.9	24.1	0.2	0.2	0.4
Cyprus	16.3	15.2	17.3	18.8	15.7	15.7	16.3	-0.5	1.6	2.5
Estonia	24.2	25.4	27.3	29.3	25.3	27.2	28.5	0.0	0.1	0.8
Finland	21.9	22.7	22.9	22.9	22.3	22.9	23.0	0.4	-0.1	-0.1
France	23.0	23.4	23.2	23.1	23.3	23.0	23.0	0.1	0.2	0.1
Germany	19.2	19.7	19.7	20.0	19.4	19.6	19.8	0.2	0.1	0.2
Greece	10.6	11.7	12.7	13.8	10.8	11.8	13.1	0.9	0.8	0.8
Ireland	32.4	24.2	25.9	26.8	33.7	34.1	34.4	-9.6	-8.2	-7.6
Italy	17.1	17.5	17.7	17.9	16.9	17.3	17.5	0.7	0.4	0.3
Latvia	19.6	21.5	23.1	23.5	21.2	22.6	22.9	0.3	0.5	0.5
Lithuania	17.2	17.5	18.2	18.8	17.6	17.6	17.7	-0.1	0.6	1.0
Luxembourg	17.9	17.8	17.7	17.4	18.5	18.3	18.3	-0.7	-0.6	-0.9
Malta	25.2	22.5	21.8	22.0	22.1	21.3	20.9	0.4	0.5	1.2
Netherlands	20.1	20.3	20.7	21.1	20.6	21.1	21.7	-0.3	-0.4	-0.6
Portugal	15.5	16.3	17.1	17.9	16.5	17.4	18.0	-0.2	-0.2	-0.1
Slovak Republic	22.6	22.9	23.8	24.1	22.5	23.0	23.6	0.5	0.8	0.5
Slovenia	18.7	19.3	20.1	20.6	19.5	19.9	20.3	-0.2	0.2	0.3
Spain	20.5	21.1	21.5	21.7	20.6	20.8	20.8	0.5	0.7	0.9
Nordic Economies	25.2	25.5	25.9	26.2	25.5	25.8	26.0	0.0	0.1	0.2
Denmark	21.0	21.0	21.4	21.7	20.6	20.9	21.1	0.4	0.5	0.6
Iceland	21.5	22.2	22.2	22.6	21.9	20.7	21.6	0.3	1.5	1.0
Norway	29.3	28.9	28.9	29.1	28.8	29.1	29.3	0.1	-0.2	-0.1
Sweden	24.7	25.7	26.4	26.8	26.0	26.4	26.6	-0.3	0.0	0.2
Other European Advanced Economies	18.8	18.9	19.0	19.1	18.9	18.9	19.0	0.0	0.1	0.1
Czech Republic	26.3	26.3	26.5	26.4	26.6	26.5	26.6	-0.3	0.0	-0.2
Israel	20.5	20.7	20.9	21.3	20.1	20.9	20.7	0.7	0.0	0.7
San Marino	21.0	19.7	22.3	23.4	18.2	18.4	18.5	1.5	3.9	4.8
Switzerland	23.1	23.7	23.6	23.6	23.7	23.6	23.6	0.0	0.0	0.0
United Kingdom	16.9	16.9	17.0	17.1	17.0	16.8	17.0	-0.1	0.2	0.1
Emerging European Economies	23.9	25.0	24.9	25.2	24.3	24.8	24.9	0.7	0.0	0.3
Central Europe	19.6	20.5	21.7	22.0	19.9	20.3	20.7	0.6	1.3	1.3
Hungary	19.7	22.4	24.0	23.8	19.6	20.3	20.9	2.8	3.7	2.9
Poland	19.6	20.0	21.1	21.6	20.0	20.3	20.7	0.0	0.7	0.9
Southeastern European EU Member States	22.4	23.3	22.9	22.7	22.9	23.0	23.1	0.4	-0.1	-0.4
Bulgaria	19.1	20.9	21.5	21.2	20.1	19.7	19.4	0.8	1.8	1.9
Croatia	20.2	19.4	19.9	20.6	20.6	21.0	21.2	-1.1	-1.1	-0.7
Romania	24.0	24.9	23.9	23.6	24.4	24.5	24.7	0.6	-0.6	-1.1
Southeastern European Non-EU Member States	19.6	19.6	19.9	19.8	19.9	20.0	20.1	-0.3	-0.1	-0.3
Albania	23.5	23.9	23.7	24.2	24.8	24.5	24.4	-0.9	-0.8	-0.2
Bosnia and Herzegovina	16.0	16.3	17.7	19.0	17.2	17.2	17.7	-1.0	0.5	1.4
Kosovo	...	...	...	...	...	...	...	...	...	...
Macedonia, FYR	...	...	...	...	...	...	...	...	...	...
Montenegro	26.1	28.3	28.7	26.4	27.9	31.1	29.9	0.4	-2.4	-3.5
Serbia	19.1	18.7	18.6	17.9	18.5	18.5	18.7	0.1	0.0	-0.7
Commonwealth of Independent States	23.7	24.1	23.3	23.9	23.6	24.3	24.3	0.5	-1.0	-0.4
Belarus	26.5	25.2	25.6	25.9	24.7	24.5	24.2	0.5	1.1	1.7
Moldova	22.1	21.7	20.0	21.2	22.7	22.6	22.6	-1.1	-2.6	-1.4
Russia	23.8	24.3	23.3	23.8	23.8	24.4	24.2	0.6	-1.1	-0.5
Ukraine	21.5	20.8	22.2	24.0	21.0	23.2	25.1	-0.1	-1.0	-1.1
Turkey	28.2	30.9	31.3	31.1	29.6	30.0	29.8	1.3	1.3	1.3
Memorandum										
World	...	...	...	...	...	...	...	...	...	...
Advanced Economies	...	...	...	...	...	...	...	...	...	...
Emerging Market and Developing Economies	...	...	...	...	...	...	...	...	...	...
European Union	20.0	20.4	20.6	20.8	20.3	20.5	20.7	0.1	0.2	0.2
United States	19.7	19.8	20.2	20.8	19.8	20.0	20.0	0.0	0.2	0.7
China	44.1	44.4	44.2	43.7	44.0	43.3	42.8	0.4	0.9	0.9
Japan	23.6	24.0	24.6	24.7	23.4	23.5	23.7	0.6	1.1	1.0

Sources: IMF, *World Economic Outlook* (WEO); and IMF staff calculations.

Annex Table 1.6. Inflation*(Year-over-year percent change; period average)*

	April 2018 WEO				October 2017 WEO			Difference		
	2016	2017	2018	2019	2017	2018	2019	2017	2018	2019
Europe	2.0	2.9	2.8	2.8	2.9	2.7	2.8	0.0	0.1	0.1
Advanced European Economies	0.4	1.7	1.7	1.7	1.6	1.6	1.8	0.1	0.1	-0.1
Euro Area	0.2	1.5	1.5	1.6	1.5	1.4	1.7	0.1	0.1	-0.1
Austria	1.0	2.2	2.2	2.2	1.6	1.8	2.1	0.6	0.3	0.1
Belgium	1.8	2.2	1.6	1.8	2.2	1.5	1.8	0.0	0.1	0.0
Cyprus	-1.2	0.7	0.4	1.6	0.8	0.7	1.1	-0.1	-0.3	0.5
Estonia	0.9	3.7	3.0	2.5	3.8	3.4	2.5	-0.1	-0.4	0.0
Finland	0.4	0.8	1.2	1.7	0.8	1.2	1.7	0.0	0.1	0.0
France	0.3	1.2	1.5	1.6	1.2	1.3	1.6	0.0	0.2	0.0
Germany	0.4	1.7	1.6	1.7	1.6	1.5	2.0	0.2	0.1	-0.3
Greece	0.0	1.1	0.7	1.1	1.2	1.3	1.4	-0.1	-0.6	-0.2
Ireland	-0.2	0.3	0.9	1.3	0.4	1.5	1.7	-0.2	-0.5	-0.3
Italy	-0.1	1.3	1.1	1.3	1.4	1.2	1.4	-0.1	-0.1	-0.1
Latvia	0.1	2.9	3.0	2.5	3.0	3.0	2.5	-0.1	0.0	0.0
Lithuania	0.7	3.7	2.2	2.2	3.5	2.0	2.1	0.2	0.2	0.0
Luxembourg	0.0	2.1	1.4	1.8	1.2	1.3	1.7	0.8	0.1	0.1
Malta	0.9	1.3	1.6	1.8	1.3	1.6	1.8	0.0	0.0	0.0
Netherlands	0.1	1.3	2.0	2.2	1.3	1.4	1.5	0.0	0.6	0.7
Portugal	0.6	1.6	1.6	1.6	1.6	2.0	2.1	0.0	-0.4	-0.5
Slovak Republic	-0.5	1.3	1.9	1.9	1.2	1.4	1.7	0.1	0.6	0.2
Slovenia	-0.1	1.4	1.7	2.0	1.6	1.8	2.0	-0.2	-0.2	0.0
Spain	-0.2	2.0	1.7	1.6	2.0	1.5	1.7	0.0	0.3	-0.1
Nordic Economies	1.7	1.7	1.6	1.8	1.6	1.7	1.9	0.1	-0.1	-0.1
Denmark	0.2	1.1	1.4	1.7	1.0	1.4	1.8	0.1	0.0	-0.1
Iceland	1.7	1.8	2.4	2.3	1.8	2.6	2.8	-0.1	-0.2	-0.5
Norway	3.6	1.9	1.9	2.0	2.1	2.0	2.2	-0.2	-0.1	-0.2
Sweden	1.1	1.9	1.5	1.6	1.6	1.6	1.7	0.3	-0.1	-0.1
Other European Advanced Economies	0.4	2.2	2.3	1.9	2.1	2.1	2.0	0.1	0.2	0.0
Czech Republic	0.7	2.4	2.3	2.0	2.3	1.8	2.0	0.1	0.5	0.0
Israel	-0.5	0.2	0.7	1.3	0.2	0.5	1.4	0.1	0.2	-0.1
San Marino	0.6	0.9	1.0	1.1	0.9	1.0	1.1	0.0	0.0	0.0
Switzerland	-0.4	0.5	0.7	1.0	0.5	0.6	0.9	0.1	0.1	0.1
United Kingdom	0.7	2.7	2.7	2.2	2.6	2.6	2.2	0.1	0.1	-0.1
Emerging European Economies	5.6	5.5	5.3	5.3	5.6	5.2	5.0	-0.1	0.1	0.4
Central Europe	-0.4	2.1	2.6	2.7	2.0	2.5	2.6	0.0	0.1	0.1
Hungary	0.4	2.4	2.7	3.3	2.5	3.2	3.0	-0.1	-0.5	0.3
Poland	-0.6	2.0	2.5	2.5	1.9	2.3	2.5	0.1	0.3	0.0
Southeastern European EU Member States	-1.4	1.3	3.7	2.7	1.1	2.6	2.7	0.2	1.0	0.0
Bulgaria	-1.3	1.2	2.0	2.1	1.1	1.4	1.7	0.1	0.5	0.4
Croatia	-1.1	1.1	1.5	1.5	1.1	1.2	1.5	0.0	0.3	0.0
Romania	-1.5	1.3	4.7	3.1	1.1	3.3	3.2	0.2	1.3	-0.1
Southeastern European Non-EU Member States	0.4	2.2	2.2	2.4	2.3	2.5	2.5	-0.1	-0.3	0.0
Albania	1.3	2.0	2.5	2.8	2.1	2.8	3.0	-0.1	-0.4	-0.2
Bosnia and Herzegovina	-1.1	1.3	1.5	1.6	1.8	1.2	1.6	-0.5	0.4	0.0
Kosovo	0.3	1.5	1.0	1.9	1.4	1.4	1.9	0.1	-0.4	0.0
Macedonia, FYR	-0.2	1.4	1.8	1.9	0.3	2.6	1.9	1.1	-0.8	0.0
Montenegro	-0.3	2.4	2.8	1.8	2.1	2.6	1.8	0.3	0.2	0.0
Serbia	1.1	3.1	2.7	3.0	3.4	3.0	3.0	-0.2	-0.3	0.0
Commonwealth of Independent States	7.8	4.6	3.6	4.2	5.1	4.5	4.4	-0.4	-1.0	-0.2
Belarus	11.8	6.0	6.0	6.0	8.0	7.5	7.2	-1.9	-1.5	-1.2
Moldova	6.4	6.6	4.7	5.1	6.5	5.3	5.1	0.1	-0.6	0.0
Russia	7.1	3.7	2.8	3.7	4.2	3.9	4.0	-0.6	-1.2	-0.2
Ukraine	13.9	14.4	11.0	8.0	12.8	10.0	7.0	1.7	1.1	1.0
Turkey	7.8	11.1	11.4	10.5	10.9	9.3	8.8	0.3	2.0	1.7
Memorandum										
World	2.8	3.0	3.5	3.4	3.1	3.3	3.3	-0.1	0.2	0.1
Advanced Economies	0.8	1.7	2.0	1.9	1.7	1.7	2.0	0.0	0.3	-0.1
Emerging Market and Developing Economies	4.3	4.0	4.6	4.3	4.2	4.4	4.1	-0.2	0.1	0.2
European Union	0.2	1.7	1.9	1.8	1.7	1.7	1.9	0.1	0.2	-0.1
United States	1.3	2.1	2.5	2.4	2.1	2.1	2.6	0.0	0.4	-0.2
China	2.0	1.6	2.5	2.6	1.8	2.4	2.5	-0.2	0.1	0.1
Japan	-0.1	0.5	1.1	1.1	0.4	0.5	1.1	0.1	0.6	0.0

Sources: IMF, *World Economic Outlook* (WEO); and IMF staff calculations.

Annex Table 1.7. Inflation: Comparison between WEO and Consensus Forecast
(Year-over-year percent change; period average)

	April 2018 WEO			Consensus Forecast		Difference	
	2017	2018	2019	2018	2019	2018	2019
Europe	2.9	2.8	2.8	...	...	...	...
Advanced European Economies	1.7	1.7	1.7	...	...	...	...
Euro Area	1.5	1.5	1.6	1.5	1.5	0.0	0.1
Austria	2.2	2.2	2.2	2.0	1.9	0.2	0.3
Belgium	2.2	1.6	1.8	1.8	1.7	-0.2	0.1
Cyprus	0.7	0.4	1.6	1.2	1.6	-0.8	0.0
Estonia	3.7	3.0	2.5	3.2	2.7	-0.2	-0.2
Finland	0.8	1.2	1.7	1.2	1.5	0.0	0.2
France	1.2	1.5	1.6	1.4	1.5	0.1	0.1
Germany	1.7	1.6	1.7	1.7	1.8	-0.1	-0.1
Greece	1.1	0.7	1.1	0.9	1.2	-0.2	-0.1
Ireland	0.3	0.9	1.3	1.0	1.3	0.0	0.0
Italy	1.3	1.1	1.3	1.1	1.3	-0.1	0.0
Latvia	2.9	3.0	2.5	2.9	2.8	0.1	-0.3
Lithuania	3.7	2.2	2.2	3.0	2.7	-0.8	-0.5
Luxembourg	2.1	1.4	1.8	...	...	...	...
Malta	1.3	1.6	1.8	...	...	...	...
Netherlands	1.3	2.0	2.2	1.6	2.1	0.4	0.1
Portugal	1.6	1.6	1.6	1.4	1.5	0.2	0.1
Slovak Republic	1.3	1.9	1.9	2.0	2.2	-0.1	-0.3
Slovenia	1.4	1.7	2.0	1.7	1.9	-0.1	0.2
Spain	2.0	1.7	1.6	1.5	1.5	0.3	0.1
Nordic Economies	1.7	1.6	1.8	...	...	...	...
Denmark	1.1	1.4	1.7	1.2	1.7	0.2	0.0
Iceland	1.8	2.4	2.3	...	...	...	...
Norway	1.9	1.9	2.0	1.7	1.8	0.2	0.2
Sweden	1.9	1.5	1.6	1.8	2.2	-0.3	-0.6
Other European Advanced Economies	2.2	2.3	1.9	...	...	...	...
Czech Republic	2.4	2.3	2.0	2.2	2.1	0.1	-0.1
Israel	0.2	0.7	1.3	0.8	1.5	-0.1	-0.2
San Marino	0.9	1.0	1.1	...	...	...	...
Switzerland	0.5	0.7	1.0	0.8	1.0	-0.1	0.0
United Kingdom	2.7	2.7	2.2	3.5	3.0	-0.7	-0.8
Emerging European Economies	5.5	5.2	5.3	...	...	...	...
Central Europe	2.1	2.6	2.7	2.2	2.6	0.3	0.1
Hungary	2.4	2.7	3.3	2.6	3.0	0.1	0.3
Poland	2.0	2.5	2.5	2.1	2.5	0.4	0.1
Southeastern European EU Member States	1.3	3.7	2.7	3.4	2.9	0.2	-0.3
Bulgaria	1.2	2.0	2.1	2.4	2.5	-0.4	-0.4
Croatia	1.1	1.5	1.5	1.6	1.8	-0.1	-0.4
Romania	1.3	4.7	3.1	4.1	3.3	0.5	-0.2
Southeastern European Non-EU Member States	2.2	2.2	2.4	...	...	...	...
Albania	2.0	2.5	2.8	2.6	2.9	-0.1	-0.1
Bosnia and Herzegovina	1.3	1.5	1.6	1.8	2.2	-0.3	-0.6
Kosovo	1.5	1.0	1.9	...	...	...	...
Macedonia, FYR	1.4	1.8	1.9	2.1	2.2	-0.3	-0.3
Montenegro	2.4	2.8	1.8	...	...	...	...
Serbia	3.1	2.7	3.0	2.7	3.4	0.0	-0.4
Commonwealth of Independent States	4.6	3.6	4.2	4.5	4.4	-0.9	-0.2
Belarus	6.0	6.0	6.0	6.9	7.1	-0.9	-1.1
Moldova	6.6	4.7	5.1	5.1	4.9	-0.4	0.2
Russia	3.7	2.8	3.7	3.8	4.0	-1.0	-0.2
Ukraine	14.4	11.0	8.0	11.1	8.0	-0.1	0.0
Turkey	11.1	11.4	10.5	10.0	8.6	1.4	1.9
Memorandum							
World	3.0	3.5	3.4	...	...	...	...
Advanced Economies	1.7	2.0	1.9	...	...	...	...
Emerging Market and Developing Economies	4.0	4.6	4.3	...	...	...	...
European Union	1.7	1.9	1.8	...	...	...	...
United States	2.1	2.5	2.4	2.4	2.1	0.2	0.3
China	1.6	2.5	2.6	2.3	2.3	0.2	0.3
Japan	0.5	1.1	1.1	1.0	1.1	0.2	0.0

Sources: Consensus Forecast (March 2018); IMF, *World Economic Outlook* (WEO); and IMF staff calculations.

Annex Table 1.8. Unemployment
(Percent)

	April 2018 WEO				October 2017 WEO			Difference		
	2016	2017	2018	2019	2017	2018	2019	2017	2018	2019
Europe	8.1	7.5	7.2	7.0	7.6	7.3	7.2	-0.1	-0.1	-0.1
Advanced European Economies	8.6	7.8	7.3	7.1	7.9	7.5	7.3	-0.1	-0.2	-0.2
Euro Area	10.0	9.1	8.4	8.1	9.2	8.7	8.3	-0.1	-0.2	-0.3
Austria	6.0	5.5	5.2	5.1	5.4	5.3	5.2	0.2	-0.1	-0.1
Belgium	7.9	7.2	7.0	6.8	7.5	7.3	7.2	-0.4	-0.4	-0.4
Cyprus	13.0	11.3	10.0	9.1	11.8	10.7	9.9	-0.5	-0.7	-0.8
Estonia	6.8	5.8	6.3	6.7	8.4	9.0	9.8	-2.6	-2.7	-3.0
Finland	8.8	8.7	8.0	7.5	8.7	8.1	7.8	0.0	-0.1	-0.3
France	10.0	9.4	8.8	8.4	9.5	9.0	8.7	0.0	-0.3	-0.3
Germany	4.2	3.8	3.6	3.5	3.8	3.7	3.7	0.0	-0.1	-0.1
Greece	23.6	21.5	19.8	18.0	22.3	20.7	19.5	-0.8	-0.9	-1.5
Ireland	8.4	6.7	5.5	5.2	6.4	5.9	5.8	0.3	-0.5	-0.5
Italy	11.7	11.3	10.9	10.6	11.4	11.0	10.6	-0.1	-0.1	0.0
Latvia	9.6	8.7	8.2	8.1	9.0	8.7	8.4	-0.3	-0.5	-0.4
Lithuania	7.9	7.1	6.9	6.8	7.0	6.5	6.0	0.1	0.4	0.8
Luxembourg	6.3	5.8	5.5	5.2	5.9	5.5	5.3	-0.1	0.0	-0.1
Malta	4.7	4.0	4.2	4.4	4.4	4.5	4.7	-0.4	-0.3	-0.3
Netherlands	6.0	5.1	4.9	4.8	5.1	4.9	4.8	0.0	0.0	0.0
Portugal	11.1	8.9	7.3	6.7	9.7	9.0	8.5	-0.8	-1.7	-1.9
Slovak Republic	9.7	8.3	7.5	7.4	8.1	7.5	7.4	0.2	0.0	0.0
Slovenia	8.0	6.8	5.9	5.5	6.8	6.4	6.3	0.0	-0.5	-0.8
Spain	19.6	17.2	15.5	14.8	17.1	15.6	15.0	0.1	-0.1	-0.2
Nordic Economies	6.2	5.8	5.6	5.5	5.7	5.5	5.5	0.2	0.0	0.0
Denmark	6.2	5.8	5.7	5.6	5.8	5.8	5.8	0.0	-0.1	-0.2
Iceland	3.0	2.8	3.1	3.3	2.8	3.2	3.6	0.0	-0.1	-0.3
Norway	4.8	4.2	3.9	3.7	4.0	3.8	3.7	0.2	0.1	0.0
Sweden	7.0	6.7	6.3	6.3	6.6	6.3	6.3	0.1	0.0	0.0
Other European Advanced Economies	4.6	4.1	4.1	4.2	4.1	4.1	4.3	0.0	0.0	-0.1
Czech Republic	3.9	2.9	3.0	3.2	2.8	3.0	3.2	0.1	0.0	0.0
Israel	4.8	4.2	4.2	4.2	4.3	4.5	4.5	-0.1	-0.2	-0.2
San Marino	8.6	8.0	7.4	6.8	8.0	7.4	6.8	0.0	0.0	0.0
Switzerland	3.3	3.2	3.0	3.0	3.0	3.0	3.0	0.2	0.0	0.0
United Kingdom	4.9	4.4	4.4	4.5	4.4	4.4	4.6	0.0	0.0	-0.1
Emerging European Economies	7.4	7.0	7.0	6.9	7.2	7.0	7.0	-0.2	-0.1	-0.1
Central Europe	5.9	4.7	4.0	3.9	4.7	4.1	4.0	0.0	-0.1	-0.1
Hungary	5.1	4.0	3.8	3.5	4.4	4.3	4.3	-0.4	-0.6	-0.7
Poland	6.2	4.9	4.1	4.0	4.8	4.0	3.9	0.1	0.1	0.1
Southeastern European EU Member States	7.4	6.1	5.8	5.7	6.6	6.5	6.7	-0.5	-0.7	-1.1
Bulgaria	7.7	6.2	6.0	5.8	6.6	6.4	6.3	-0.4	-0.4	-0.5
Croatia	14.8	12.2	12.0	11.2	13.9	13.5	13.2	-1.7	-1.5	-2.0
Romania	5.9	5.0	4.6	4.6	5.3	5.2	5.7	-0.3	-0.6	-1.1
Southeastern European Non-EU Member States	18.8	16.8	17.5	17.2	17.8	18.6	18.4	-1.0	-1.1	-1.1
Albania	15.2	13.9	13.7	13.4	14.0	13.8	13.5	-0.1	-0.1	-0.1
Bosnia and Herzegovina	25.4	20.5	25.1	25.0	20.5	25.1	25.0	0.0	0.0	0.0
Kosovo	...	...	...	...	...	...	...	...	...	...
Macedonia, FYR	23.8	22.5	22.3	22.1	23.4	23.2	23.0	-0.8	-0.8	-0.8
Montenegro	...	...	...	...	...	...	...	...	...	...
Serbia	15.9	14.6	14.3	14.0	16.0	15.6	15.3	-1.4	-1.3	-1.2
Commonwealth of Independent States	6.0	5.8	6.0	5.9	6.0	6.0	5.9	-0.2	0.0	0.0
Belarus	1.0	1.0	1.0	1.0	1.0	1.0	1.0	0.0	0.0	0.0
Moldova	4.2	4.2	4.2	4.1	4.3	4.2	4.2	-0.1	0.0	-0.1
Russia	5.5	5.2	5.5	5.5	5.5	5.5	5.5	-0.3	0.0	0.0
Ukraine	9.3	9.4	9.2	8.8	9.5	9.3	8.8	-0.1	-0.1	0.0
Turkey	10.9	11.0	10.7	10.7	11.2	10.7	10.4	-0.2	0.0	0.2
Memorandum										
World	...	...	...	...	...	...	...	...	...	...
Advanced Economies	6.2	5.7	5.3	5.1	5.7	5.4	5.4	0.0	-0.2	-0.3
Emerging Market and Developing Economies	...	...	...	...	...	...	...	...	...	...
European Union	8.6	7.7	7.1	6.9	7.7	7.3	7.2	-0.1	-0.2	-0.3
United States	4.9	4.4	3.9	3.5	4.4	4.1	4.2	0.0	-0.2	-0.6
China	4.0	3.9	4.0	4.0	4.0	4.0	4.0	-0.1	0.0	0.0
Japan	3.1	2.9	2.9	2.9	2.9	2.9	2.9	0.0	0.0	0.0

Sources: IMF, *World Economic Outlook* (WEO); and IMF staff calculations.

Annex Table 1.9. General Government Overall Balance
(Percent of GDP)

	2016	April 2018 WEO				October 2017 WEO			Difference		
		2017	2018	2018	2019	2017	2018	2019	2017	2018	2019
Europe	-1.9	-1.2	-0.9	-0.8	-1.7	-1.4	-1.0	0.5	0.5	0.2	
Advanced European Economies	-1.5	-0.9	-0.7	-0.6	-1.3	-1.0	-0.6	0.4	0.3	0.1	
Euro Area	-1.5	-0.9	-0.6	-0.5	-1.3	-1.0	-0.7	0.3	0.3	0.2	
Austria	-1.5	-0.8	-0.3	-0.2	-0.9	-0.6	-0.4	0.0	0.3	0.2	
Belgium	-2.5	-1.1	-1.3	-1.3	-1.8	-1.8	-1.9	0.7	0.5	0.6	
Cyprus	0.5	1.9	2.0	2.0	0.9	0.3	0.5	1.0	1.7	1.5	
Estonia	-0.3	-0.1	-0.4	-0.2	0.0	-0.7	-0.6	-0.1	0.3	0.4	
Finland	-1.8	-1.4	-1.4	-0.9	-1.5	-1.2	-0.9	0.2	-0.2	0.0	
France	-3.4	-2.6	-2.4	-3.1	-3.0	-3.0	-3.2	0.4	0.6	0.1	
Germany	0.8	1.1	1.5	1.7	0.7	0.8	1.0	0.4	0.7	0.6	
Greece	0.5	0.0	-0.1	0.0	-1.7	-1.1	0.2	1.8	1.0	-0.1	
Ireland	-0.7	-0.4	-0.2	-0.1	-0.5	-0.2	-0.2	0.1	0.1	0.1	
Italy	-2.5	-1.9	-1.6	-0.9	-2.2	-1.3	-0.3	0.3	-0.2	-0.6	
Latvia	-0.4	0.0	-0.5	-0.9	-0.7	0.0	-0.4	0.7	-0.6	-0.4	
Lithuania	0.3	0.6	0.7	0.8	0.1	0.5	0.3	0.5	0.2	0.5	
Luxembourg	1.6	1.4	0.8	0.2	0.3	0.2	0.0	1.1	0.6	0.2	
Malta	1.1	1.9	1.6	1.1	0.5	0.5	0.5	1.3	1.1	0.6	
Netherlands	0.4	0.5	0.6	0.7	0.6	0.9	1.2	-0.1	-0.3	-0.5	
Portugal	-2.0	-1.2	-1.0	-0.9	-1.5	-1.4	-1.5	0.3	0.3	0.6	
Slovak Republic	-2.2	-1.6	-0.9	-0.4	-1.2	-0.7	-0.1	-0.5	-0.2	-0.3	
Slovenia	-1.7	-0.8	0.0	-0.3	-0.9	-0.9	-1.2	0.1	0.9	0.9	
Spain	-4.5	-3.1	-2.5	-2.1	-3.2	-2.5	-2.1	0.1	-0.1	0.0	
Nordic Economies	1.8	2.0	1.5	1.4	1.5	1.8	2.0	0.5	-0.3	-0.6	
Denmark	-0.4	-0.1	-0.8	-0.5	-1.5	-0.6	-0.4	1.4	-0.2	-0.1	
Iceland	12.6	1.6	1.2	1.1	0.9	1.3	1.4	0.8	-0.1	-0.2	
Norway	3.9	4.9	3.7	3.8	4.5	4.6	5.4	0.4	-1.0	-1.6	
Sweden	1.2	1.2	1.1	0.7	1.0	1.0	0.8	0.2	0.1	-0.1	
Other European Advanced Economies	-2.2	-1.7	-1.4	-1.2	-2.2	-1.9	-1.2	0.6	0.5	0.0	
Czech Republic	0.7	1.3	1.1	1.0	0.5	0.6	0.7	0.8	0.5	0.3	
Israel	-2.1	-2.2	-3.2	-3.3	-3.2	-3.7	-3.7	1.0	0.6	0.4	
San Marino	-0.3	-0.3	-0.3	-0.2	-0.3	-0.3	-0.3	0.0	0.0	0.1	
Switzerland	0.1	0.0	0.4	0.4	-0.1	-0.1	0.0	0.1	0.5	0.4	
United Kingdom	-3.0	-2.3	-1.8	-1.5	-2.9	-2.3	-1.4	0.6	0.5	-0.1	
Emerging European Economies	-2.8	-1.7	-1.4	-1.4	-2.6	-2.1	-1.8	0.8	0.7	0.4	
Central Europe	-2.3	-1.8	-1.9	-1.8	-2.7	-2.6	-2.6	0.9	0.7	0.8	
Hungary	-1.8	-2.0	-2.1	-1.9	-2.6	-2.6	-2.3	0.5	0.5	0.4	
Poland	-2.5	-1.7	-1.9	-1.8	-2.7	-2.7	-2.6	1.0	0.8	0.8	
Southeastern European EU Member States	-1.3	-1.6	-2.7	-2.4	-2.2	-3.2	-3.2	0.6	0.5	0.7	
Bulgaria	1.6	0.9	-1.0	-0.5	-0.4	-0.7	-0.3	1.3	-0.3	-0.2	
Croatia	-0.9	0.6	-0.5	-0.3	-1.3	-1.0	-0.7	1.9	0.5	0.4	
Romania	-2.4	-2.8	-3.6	-3.5	-3.0	-4.4	-4.5	0.2	0.8	1.1	
Southeastern European Non-EU Member States	-1.4	-0.1	-0.9	-1.1	-1.6	-1.6	-1.5	1.5	0.6	0.4	
Albania	-1.8	-1.4	-2.1	-1.9	-1.2	-2.0	-2.3	-0.1	-0.1	0.4	
Bosnia and Herzegovina	0.3	1.9	1.3	0.2	-0.4	0.0	0.0	2.3	1.3	0.3	
Kosovo ¹	-1.2	-1.2	-3.1	-3.8	-3.4	-3.7	-3.1	2.2	0.6	-0.7	
Macedonia, FYR	-2.7	-2.7	-3.0	-3.1	-3.5	-3.6	-3.8	0.7	0.6	0.6	
Montenegro	-6.2	-7.1	-2.9	-2.2	-6.4	-5.6	-4.9	-0.6	2.7	2.7	
Serbia	-1.2	1.2	-0.3	-0.2	-1.0	-0.7	-0.6	2.1	0.4	0.4	
Commonwealth of Independent States	-3.5	-1.5	-0.3	-0.2	-2.3	-1.7	-1.2	0.8	1.4	0.9	
Belarus	-3.4	-1.7	-2.4	-3.0	-5.6	-3.8	-2.3	3.9	1.4	-0.7	
Moldova	-2.1	-1.0	-3.2	-3.8	-3.2	-3.0	-3.0	2.2	-0.2	-0.8	
Russia	-3.7	-1.5	0.0	0.1	-2.1	-1.5	-1.0	0.7	1.6	1.1	
Ukraine	-2.2	-2.4	-2.5	-2.7	-2.9	-2.5	-2.3	0.4	0.0	-0.4	
Turkey	-2.3	-2.3	-2.9	-3.2	-3.2	-2.4	-2.3	0.9	-0.5	-0.9	
Memorandum											
World	-3.5	-3.3	-3.2	-3.3	-3.4	-3.0	-2.9	0.1	-0.2	-0.4	
Advanced Economies	-2.6	-2.6	-2.6	-2.8	-2.7	-2.3	-2.1	0.2	-0.4	-0.6	
Emerging Market and Developing Economies	-4.8	-4.4	-4.1	-4.0	-4.4	-4.2	-4.0	0.0	0.1	-0.1	
European Union	-1.7	-1.1	-0.8	-0.7	-1.5	-1.2	-0.8	0.4	0.4	0.1	
United States	-4.2	-4.6	-5.3	-5.9	-4.3	-3.7	-4.0	-0.2	-1.5	-1.9	
China	-3.7	-4.0	-4.1	-4.3	-3.7	-3.7	-3.9	-0.2	-0.4	-0.4	
Japan	-3.7	-4.2	-3.4	-2.8	-4.1	-3.3	-2.9	-0.1	-0.1	0.0	

Sources: IMF, *World Economic Outlook* (WEO); and IMF staff calculations.

¹Includes international financial institutions and privatization-proceeds-financed capital projects, which are not part of the "fiscal rule" definition.

Annex Table 1.10. General Government Gross Debt
(Percent of GDP)

	2016	April 2018 WEO			October 2017 WEO			Difference		
		2017	2018	2019	2017	2018	2019	2017	2018	2019
Europe	68.8	67.3	66.0	64.5	68.2	67.1	65.7	-0.9	-1.2	-1.2
Advanced European Economies	85.4	83.5	81.5	79.4	84.3	82.8	81.0	-0.8	-1.3	-1.6
Euro Area	88.9	86.6	84.2	81.7	87.4	85.6	83.5	-0.8	-1.3	-1.8
Austria	83.7	78.8	75.4	72.0	80.2	77.5	74.8	-1.4	-2.2	-2.9
Belgium	105.7	103.2	101.0	99.1	104.3	102.9	101.5	-1.1	-1.9	-2.4
Cyprus	107.1	99.3	97.0	89.5	105.5	102.0	96.4	-6.3	-5.1	-6.9
Estonia	9.4	8.8	8.5	8.1	8.7	8.8	8.9	0.1	-0.3	-0.8
Finland	63.0	61.4	60.5	59.6	63.3	62.6	61.8	-1.9	-2.0	-2.3
France	96.6	97.0	96.3	96.2	96.8	97.0	97.0	0.1	-0.6	-0.8
Germany	68.2	64.1	59.8	55.7	65.0	61.8	58.7	-0.9	-2.0	-2.9
Greece	183.5	181.9	191.3	181.8	180.2	184.5	177.9	1.7	6.8	3.8
Ireland	72.9	68.5	67.1	64.9	69.3	67.8	66.2	-0.8	-0.7	-1.4
Italy	132.0	131.5	129.7	127.5	133.0	131.4	128.8	-1.6	-1.7	-1.2
Latvia	37.4	34.8	32.9	31.9	35.6	33.2	31.8	-0.7	-0.3	0.1
Lithuania	40.2	36.5	34.2	31.4	37.5	35.0	32.9	-1.0	-0.9	-1.5
Luxembourg	20.8	23.0	22.9	22.8	18.6	17.5	16.6	4.4	5.5	6.2
Malta	56.2	52.6	48.6	45.9	55.9	53.6	50.3	-3.3	-5.0	-4.4
Netherlands	61.8	56.7	53.5	50.9	57.4	54.2	51.2	-0.7	-0.7	-0.3
Portugal	129.9	125.6	121.2	117.5	125.7	122.5	119.8	-0.1	-1.2	-2.3
Slovak Republic	51.8	50.4	49.0	46.6	50.9	49.7	47.8	-0.5	-0.7	-1.2
Slovenia	78.4	75.4	72.1	69.8	75.0	73.9	73.3	0.4	-1.8	-3.5
Spain	99.0	98.4	96.7	95.1	98.7	97.2	95.8	-0.3	-0.5	-0.7
Nordic Economies	39.5	38.5	37.1	35.3	36.8	35.6	34.1	1.7	1.5	1.2
Denmark	37.7	36.4	35.9	35.1	37.8	37.0	35.9	-1.4	-1.1	-0.9
Iceland	52.7	40.9	38.4	34.9	41.2	39.0	35.5	-0.3	-0.6	-0.6
Norway	36.7	36.7	36.7	36.7	33.1	33.1	33.1	3.5	3.5	3.5
Sweden	42.2	40.9	38.0	34.4	38.8	36.5	33.8	2.1	1.5	0.7
Other European Advanced Economies	75.9	74.7	73.9	73.2	76.5	76.3	75.4	-1.8	-2.5	-2.2
Czech Republic	36.8	34.7	32.9	31.3	34.5	32.5	30.4	0.1	0.4	0.9
Israel	62.3	61.0	61.6	61.4	62.7	63.6	64.1	-1.7	-2.0	-2.7
San Marino	22.5	56.6	55.5	54.6	23.2	22.8	22.6	33.4	32.7	32.0
Switzerland	43.3	42.8	41.9	41.1	42.8	41.7	40.7	0.0	0.2	0.4
United Kingdom	88.2	87.0	86.3	85.9	89.5	89.7	88.9	-2.5	-3.4	-3.0
Emerging European Economies	31.9	31.7	32.1	32.3	32.8	32.8	32.7	-1.1	-0.7	-0.4
Central Europe	58.1	55.2	54.2	53.1	58.0	57.4	56.9	-2.8	-3.2	-3.8
Hungary	73.3	69.9	67.4	65.9	72.9	71.3	70.2	-3.0	-3.9	-4.4
Poland	54.1	51.4	50.8	49.8	54.2	53.8	53.5	-2.8	-3.0	-3.7
Southeastern European EU Member States	42.8	39.9	40.0	40.2	41.9	42.2	42.8	-2.0	-2.2	-2.7
Bulgaria	27.4	23.9	23.6	22.9	24.6	24.2	23.4	-0.7	-0.6	-0.5
Croatia	82.7	78.4	75.5	72.6	81.9	79.6	76.9	-3.5	-4.2	-4.4
Romania	39.1	36.9	37.8	39.0	38.9	40.2	42.0	-2.1	-2.3	-3.0
Southeastern European Non-EU Member States	59.1	53.5	52.4	50.5	58.2	56.8	54.8	-4.7	-4.4	-4.3
Albania	73.3	71.2	71.3	68.5	70.8	68.2	65.2	0.4	3.2	3.3
Bosnia and Herzegovina	44.0	41.0	39.3	38.4	42.3	40.9	39.4	-1.3	-1.6	-1.0
Kosovo	19.6	20.9	22.4	24.9	23.5	25.4	25.9	-2.5	-3.0	-1.0
Macedonia, FYR	39.5	39.3	41.2	42.2	39.7	41.6	43.0	-0.4	-0.4	-0.8
Montenegro	66.4	67.5	69.7	66.5	71.6	73.6	74.1	-4.1	-3.9	-7.6
Serbia	73.1	61.5	58.5	55.1	70.9	67.9	64.4	-9.5	-9.4	-9.3
Commonwealth of Independent States	22.5	23.5	24.8	25.6	24.6	24.6	24.7	-1.1	0.2	0.9
Belarus	53.5	51.0	49.5	49.9	58.8	56.8	56.7	-7.8	-7.3	-6.7
Moldova	42.1	37.7	39.8	42.0	41.3	40.5	41.1	-3.6	-0.8	0.9
Russia	15.7	17.4	18.7	19.5	17.4	17.7	18.2	0.1	1.0	1.3
Ukraine	81.2	75.6	78.4	76.9	86.2	83.5	77.9	-10.6	-5.1	-1.0
Turkey	28.3	28.5	27.8	27.9	27.9	28.0	27.5	0.6	-0.2	0.3
Memorandum										
World	83.1	82.4	82.1	81.9	82.8	82.4	81.9	-0.4	-0.3	0.0
Advanced Economies	105.9	104.4	102.9	102.2	105.3	104.2	103.1	-0.9	-1.3	-1.0
Emerging Market and Developing Economies	46.9	49.0	51.0	52.5	48.3	49.9	51.2	0.6	1.2	1.3
European Union	85.5	83.2	81.1	78.9	84.2	82.6	80.7	-1.0	-1.5	-1.8
United States	107.2	107.8	108.0	109.4	108.1	107.8	107.9	-0.4	0.2	1.5
China	44.3	47.8	51.2	54.4	47.6	50.8	53.9	0.2	0.4	0.5
Japan	235.6	236.4	236.0	234.2	240.3	240.0	238.5	-3.9	-4.1	-4.3

Sources: IMF, *World Economic Outlook* (WEO); and IMF staff calculations.

Annex Table 1.11. Current Account
(Percent of GDP)

	April 2018 WEO				October 2017 WEO			Difference		
	2016	2017	2018	2019	2017	2018	2019	2017	2018	2019
Europe	2.0	2.3	2.5	2.4	2.4	2.3	2.3	-0.1	0.1	0.1
Advanced European Economies	2.5	2.9	2.9	2.9	2.9	2.9	2.8	0.0	0.0	0.1
Euro Area	3.4	3.5	3.2	3.2	3.1	3.0	2.9	0.5	0.2	0.3
Austria	2.1	2.1	2.5	2.0	2.1	2.2	2.3	0.0	0.4	-0.3
Belgium	0.1	0.1	0.3	0.2	-0.3	0.0	0.1	0.4	0.3	0.1
Cyprus	-4.9	-4.7	-4.1	-4.6	-3.8	-2.7	-2.8	-0.9	-1.4	-1.8
Estonia	1.9	3.2	2.0	0.7	1.8	1.4	0.5	1.4	0.6	0.1
Finland	-1.4	0.7	1.4	1.9	0.4	0.4	0.5	0.3	1.1	1.4
France	-0.9	-1.4	-1.3	-0.9	-1.1	-0.8	-0.5	-0.3	-0.6	-0.4
Germany	8.5	8.0	8.2	8.2	8.1	7.7	7.5	-0.1	0.5	0.8
Greece	-1.1	-0.8	-0.8	-0.6	-0.2	-0.1	-0.1	-0.6	-0.7	-0.4
Ireland	3.3	12.5	9.8	8.7	3.4	3.5	3.6	9.2	6.3	5.1
Italy	2.7	2.9	2.6	2.2	2.7	2.3	2.0	0.1	0.3	0.2
Latvia	1.4	-0.8	-1.9	-2.2	-0.3	-1.5	-1.6	-0.4	-0.4	-0.6
Lithuania	-1.1	1.0	-0.1	-0.6	-1.6	-1.4	-1.6	2.6	1.3	1.1
Luxembourg	4.8	5.5	5.4	5.3	4.7	4.9	5.2	0.8	0.4	0.1
Malta	6.5	10.2	9.9	9.5	8.9	8.8	8.4	1.2	1.1	1.1
Netherlands	8.4	9.8	9.6	8.9	10.0	10.0	9.6	-0.2	-0.4	-0.8
Portugal	0.6	0.5	0.2	-0.1	0.4	0.3	-0.1	0.0	-0.1	-0.1
Slovak Republic	-1.5	-1.5	-0.3	0.5	0.3	0.2	0.5	-1.8	-0.5	0.0
Slovenia	5.2	6.5	5.7	5.2	5.0	4.9	4.4	1.5	0.8	0.9
Spain	1.9	1.7	1.6	1.7	1.9	2.0	2.0	-0.2	-0.4	-0.3
Nordic Economies	4.9	4.9	5.2	5.1	5.3	5.2	5.0	-0.4	0.0	0.1
Denmark	7.3	7.6	7.6	7.2	7.3	7.0	6.7	0.3	0.6	0.5
Iceland	7.7	3.6	3.3	2.6	6.2	6.1	5.1	-2.6	-2.8	-2.5
Norway	3.8	5.1	6.1	6.5	5.5	5.7	5.9	-0.4	0.4	0.6
Sweden	4.2	3.2	3.1	3.1	3.9	3.7	3.5	-0.8	-0.6	-0.5
Other European Advanced Economies	-2.0	-0.8	-0.6	-0.4	-0.2	-0.2	0.0	-0.6	-0.4	-0.4
Czech Republic	1.1	1.1	0.3	0.4	0.6	0.1	-0.2	0.6	0.2	0.6
Israel	3.5	3.0	2.6	2.7	4.1	3.1	3.3	-1.1	-0.5	-0.6
San Marino	...	...	...	...	...	...	...	...	...	...
Switzerland	9.4	9.3	9.7	9.4	9.9	9.4	9.2	-0.6	0.2	0.2
United Kingdom	-5.8	-4.1	-3.7	-3.4	-3.6	-3.3	-2.9	-0.5	-0.5	-0.5
Emerging European Economies	-0.4	-0.4	0.2	-0.1	-0.3	-0.3	-0.1	-0.1	0.5	0.1
Central Europe	1.1	0.8	-0.2	-0.5	0.2	-0.1	-0.6	0.6	0.0	0.2
Hungary	6.0	3.6	2.5	2.4	4.8	4.2	3.2	-1.2	-1.7	-0.7
Poland	-0.3	0.0	-0.9	-1.2	-1.0	-1.2	-1.6	1.0	0.3	0.4
Southeastern European EU Member States	-0.5	-0.8	-1.5	-1.7	-0.9	-1.1	-1.3	0.0	-0.4	-0.4
Bulgaria	2.3	4.5	3.0	2.3	2.5	1.9	1.5	2.0	1.1	0.8
Croatia	2.5	3.7	3.0	2.1	3.8	3.0	2.0	-0.1	0.0	0.1
Romania	-2.1	-3.5	-3.7	-3.7	-3.0	-2.9	-2.9	-0.5	-0.8	-0.8
Southeastern European Non-EU Member States	-5.2	-5.7	-5.7	-5.6	-5.9	-5.7	-5.6	0.2	0.0	-0.1
Albania	-7.6	-7.2	-6.7	-6.7	-9.2	-8.2	-7.7	2.1	1.6	1.0
Bosnia and Herzegovina	-5.1	-5.2	-5.9	-6.5	-4.3	-4.2	-4.3	-0.9	-1.7	-2.2
Kosovo	-8.9	-8.7	-8.9	-8.6	-11.0	-11.3	-10.9	2.3	2.5	2.3
Macedonia, FYR	-2.7	-1.3	-1.5	-1.8	-2.3	-2.5	-2.8	1.0	1.0	1.0
Montenegro	-18.1	-18.9	-19.0	-17.8	-20.2	-21.2	-19.7	1.2	2.2	1.9
Serbia	-3.1	-4.6	-4.5	-4.1	-4.0	-3.9	-3.8	-0.6	-0.6	-0.3
Commonwealth of Independent States	1.4	2.1	3.7	3.1	2.1	2.5	3.0	-0.1	1.2	0.2
Belarus	-3.5	-1.8	-2.5	-2.7	-5.3	-4.6	-4.0	3.6	2.1	1.4
Moldova	-4.0	-4.7	-3.7	-4.7	-4.0	-4.0	-4.8	-0.7	0.4	0.2
Russia	2.0	2.6	4.5	3.8	2.8	3.2	3.6	-0.2	1.3	0.2
Ukraine	-4.1	-3.7	-3.7	-3.5	-3.3	-3.0	-2.3	-0.4	-0.6	-1.2
Turkey	-3.8	-5.5	-5.4	-4.8	-4.6	-4.6	-4.4	-0.9	-0.8	-0.4
Memorandum										
World	0.3	0.5	0.4	0.2	0.4	0.3	0.2	0.1	0.1	0.1
Advanced Economies	0.7	0.8	0.7	0.5	0.8	0.7	0.7	0.0	-0.1	-0.1
Emerging Market and Developing Economies	-0.3	-0.1	-0.1	-0.2	-0.3	-0.4	-0.5	0.2	0.4	0.3
European Union	2.0	2.4	2.4	2.4	2.4	2.4	2.3	0.0	0.0	0.1
United States	-2.4	-2.4	-3.0	-3.4	-2.4	-2.6	-2.7	0.0	-0.4	-0.7
China	1.8	1.4	1.2	1.2	1.4	1.2	0.9	0.0	0.0	0.2
Japan	3.8	4.0	3.8	3.7	3.6	3.8	3.7	0.4	0.0	0.1

Sources: IMF, *World Economic Outlook* (WEO); and IMF staff calculations.

Annex Table 1.12. Net Financial Assets
(Percent of GDP)

	2016	April 2018 WEO				October 2017 WEO			Difference		
		2017	2018	2019	2017	2018	2019	2017	2018	2019	
Europe											
Advanced European Economies	3.8	5.5	6.4	8.3	7.2	9.1	11.1	-1.8	-2.7	-2.8	
Euro Area	9.2	11.1	11.8	13.8	13.4	15.2	17.3	-2.3	-3.4	-3.5	
Austria	-0.7	2.1	4.7	8.0	-0.5	3.2	6.6	2.6	1.4	1.4	
Belgium	5.4	9.2	10.8	12.3	12.1	13.2	14.9	-2.9	-2.4	-2.7	
Cyprus	49.2	47.4	43.2	42.3	45.5	43.1	42.3	1.9	0.1	0.0	
Estonia	-127.8	-123.8	-121.3	-118.6	-121.3	-118.5	-116.8	-2.6	-2.8	-1.9	
Finland	-35.3	-31.7	-25.3	-22.2	-33.5	-26.9	-23.0	1.8	1.6	0.8	
France	-2.3	-2.9	-1.3	0.7	7.3	7.5	7.8	-10.2	-8.8	-7.2	
Germany	-15.0	-17.7	-17.8	-18.2	-17.6	-17.2	-17.1	-0.1	-0.6	-1.1	
Greece	51.8	62.0	61.2	66.3	54.5	58.3	63.6	7.4	2.9	2.7	
Ireland	-132.7	-138.8	-129.4	-125.8	-140.5	-130.8	-126.8	1.8	1.5	1.0	
Italy	-167.8	-172.0	-148.6	-133.7	-172.0	-154.3	-143.8	0.0	5.8	10.1	
Latvia	-9.4	-7.2	-4.0	-1.6	-12.6	-9.5	-7.1	5.4	5.5	5.6	
Lithuania	-56.1	-59.2	-55.1	-53.2	-55.0	-47.5	-43.1	-4.2	-7.6	-10.1	
Luxembourg	-41.1	-39.1	-34.3	-31.3	-43.1	-39.9	-38.7	4.0	5.7	7.4	
Malta	33.1	40.2	41.5	44.2	25.9	27.6	30.1	14.4	13.9	14.1	
Netherlands	45.3	44.8	44.3	44.0	46.9	46.6	46.2	-2.2	-2.2	-2.2	
Portugal	64.5	72.9	79.8	86.2	73.8	81.3	88.9	-0.9	-1.5	-2.6	
Slovak Republic	-106.1	-105.7	-100.1	-95.5	-98.4	-93.3	-89.2	-7.3	-6.8	-6.3	
Slovenia	-59.5	-66.8	-59.2	-53.6	-55.6	-48.9	-44.2	-11.2	-10.3	-9.5	
Spain	-32.4	-28.8	-17.6	-8.8	-30.7	-23.4	-18.1	1.9	5.8	9.3	
Nordic Economies	-79.9	-82.5	-74.0	-69.3	-83.5	-74.7	-69.5	1.0	0.7	0.2	
Denmark	76.2	88.2	87.2	87.6	84.4	82.4	82.8	3.7	4.8	4.8	
Iceland	52.3	61.3	64.7	70.1	62.9	65.8	70.7	-1.6	-1.1	-0.6	
Norway	4.3	5.5	6.6	8.6	3.9	9.9	14.2	1.6	-3.2	-5.6	
Sweden	199.2	221.6	214.6	210.9	197.5	193.4	190.0	24.1	21.3	20.9	
Other European Advanced Economies	4.7	9.8	10.9	12.1	19.2	19.8	21.2	-9.4	-9.0	-9.1	
Czech Republic	18.6	15.0	10.2	8.4	35.4	32.5	30.8	-20.4	-22.2	-22.4	
Israel	-23.5	-19.8	-15.3	-12.7	-25.8	-21.5	-19.6	6.0	6.2	6.9	
San Marino	34.3	34.7	35.7	37.5	36.0	38.4	41.1	-1.4	-2.7	-3.6	
Switzerland	...	...	...	...	...	...	...	...	...	...
United Kingdom	114.8	123.2	110.6	108.2	112.8	110.0	112.4	10.4	0.6	-4.2	
Emerging European Economies	-4.4	-12.8	-16.2	-19.2	19.7	15.8	12.3	-32.5	-32.0	-31.4	
Central Europe	-24.0	-22.2	-19.8	-19.3	-23.7	-21.3	-19.7	1.6	1.4	0.4	
Hungary	-58.5	-49.8	-42.2	-39.5	-53.5	-46.7	-44.0	3.7	4.5	4.5	
Poland	-62.9	-48.6	-38.0	-30.1	-52.2	-40.3	-32.6	3.6	2.3	2.5	
Southeastern European EU Member States	-57.3	-50.1	-43.3	-41.9	-53.8	-48.3	-46.8	3.7	5.1	4.9	
Bulgaria	-50.0	-53.4	-48.6	-46.2	-55.8	-50.1	-47.2	2.4	1.5	1.0	
Croatia	-44.8	-40.7	-32.0	-26.3	-47.0	-39.5	-34.2	6.3	7.5	8.0	
Romania	-66.5	-85.5	-72.2	-65.7	-86.3	-75.6	-69.2	0.8	3.4	3.5	
Southeastern European Non-EU Member States	-47.0	-48.6	-47.1	-46.6	-50.3	-46.5	-45.2	1.7	-0.6	-1.4	
Albania	-72.3	-75.5	-72.7	-72.6	-74.6	-73.6	-73.4	-0.8	0.8	0.8	
Bosnia and Herzegovina	-57.1	-55.9	-51.9	-52.9	-58.8	-59.6	-61.6	2.8	7.7	8.7	
Kosovo	-57.1	-64.3	-62.0	-63.3	-56.9	-56.2	-57.0	-7.4	-5.8	-6.3	
Macedonia, FYR	0.0	-11.0	-11.7	-14.6	-12.3	-13.2	-17.2	1.3	1.5	2.6	
Montenegro	-49.8	-62.6	-58.7	-57.6	-59.2	-57.6	-57.2	-3.4	-1.1	-0.4	
Serbia	...	...	...	...	...	...	...	...	...	...
Commonwealth of Independent States	-102.8	-101.3	-98.2	-96.9	-102.8	-100.4	-98.2	1.5	2.2	1.4	
Belarus	9.7	13.2	14.7	16.3	11.7	15.5	18.5	1.5	-0.9	-2.2	
Moldova	-85.6	-76.5	-72.8	-72.7	-83.1	-85.8	-86.3	6.6	13.0	13.5	
Russia	-52.4	-45.8	-37.4	-32.8	-73.7	-63.2	-54.0	27.8	25.8	21.3	
Ukraine	17.3	20.4	21.6	23.8	19.2	23.5	27.0	1.2	-1.9	-3.2	
Turkey	-41.4	-38.2	-38.7	-39.9	-39.7	-39.7	-38.9	1.5	0.9	-1.0	
Memorandum	-42.4	-53.4	-55.2	-57.0	-52.6	-53.4	-54.7	-0.8	-1.8	-2.4	
World	...	...	...	...	...	...	...	...	...	...
Advanced Economies	-2.7	-0.9	-0.5	0.1	-0.5	0.4	1.2	-0.3	-0.8	-1.1	
Emerging Market and Developing Economies	...	...	...	...	...	...	...	...	...	...
European Union	-3.4	-2.1	-0.3	2.1	1.0	3.5	5.7	-3.1	-3.8	-3.6	
United States	-44.7	-40.5	-41.4	-42.9	-43.8	-44.6	-45.6	3.4	3.2	2.7	
China	17.4	15.1	14.1	13.9	16.5	16.2	15.9	-1.4	-2.1	-1.9	
Japan	60.9	63.8	64.6	66.8	65.9	68.1	70.8	-2.1	-3.5	-4.0	

Sources: IMF, *World Economic Outlook* (WEO); and IMF staff calculations.

References

- Arnold, Nathaniel G., Bergljot B. Barkbu, H. Elif Ture, Hou Wang, and Jiaxiong Yao. 2018. "A Central Fiscal Stabilization Capacity for the Euro Area." IMF Staff Discussion Note 18/03, International Monetary Fund, Washington, DC.
- Atoyan, Ruben, Lone Christiansen, Allan Dizioli, Christian Ebeke, Nadeem Ilahi, Anna Ilyina, Gil Mehrez, Haonan Qu, Faezeh Raei, Alaina Rhee, and Daria Zakharova. 2016. "Emigration and Its Economic Impact on Eastern Europe." IMF Staff Discussion Note 16/07, International Monetary Fund, Washington, DC.
- Atoyan, Ruben, and Jesmin Rahman. 2017. "Western Balkans: Increasing Women's Role in the Economy." IMF Working Paper 17/194, International Monetary Fund, Washington, DC.
- Balakrishnan, Ravi, Stephan Danninger, Selim Elekdag, and Irinia Tytell. 2009. "The Transmission of Financial Stress from Advanced to Emerging Economies." IMF Working Paper 09/133, International Monetary Fund, Washington, DC.
- Banerji, A., S. Saksonovs, H. Lin, and R. Blavy. 2014. "Youth Unemployment in Advanced Economies in Europe: Searching for Solutions." IMF Staff Discussion Note 14/11, International Monetary Fund, Washington, DC.
- Bluedorn, John, Jorg Decressin, and Marco Terrones. 2013. "Do Asset Price Drops Foreshadow Recessions?" IMF Working Paper 13/203, International Monetary Fund, Washington, DC.
- European Investment Bank (EIB). 2017. "Investment Report 2017/18: From Recovery to Sustainable Growth." Luxembourg.
- Fama, Eugene. 1990. "Stock Returns, Expected Returns, and Real Activity." *Journal of Finance* 45 (4): 1089–108.
- International Monetary Fund (IMF). 2009. *World Economic Outlook*. Washington, DC, October.
- . 2017. "Euro Area Policies: 2017 Article IV Consultation." Washington, DC.
- Laun, Lisa, and Mårten Palme. 2017. "The Recent Rise of Labor Force Participation of Older Workers in Sweden." Working Paper 2017/17, Institute for Evaluation of Labour Market and Education Policy, Stockholm.
- Mauro, Paolo. 2000. "Stock Returns and Output Growth in Emerging and Advanced Economies." IMF Working Paper 00/89, International Monetary Fund, Washington, DC.
- World Intellectual Property Organization (WIPO). 2017. *World Intellectual Property Report 2017: Intangible Capital in Global Value Chains*. Geneva.

