

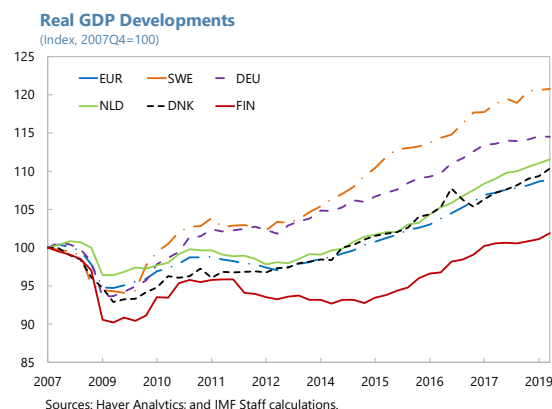
BACKGROUND

1. Finland's economic performance in recent years has been solid, following a long recession.

Growth picked up to an average of 2½ percent y/y each year from 2016 to 2018, but GDP only surpassed its 2008 level in 2017. Employment has continued to increase, and unemployment is now close to historical lows. However, labor productivity growth has been disappointing.

2. A new coalition government has produced an ambitious social and economic agenda.

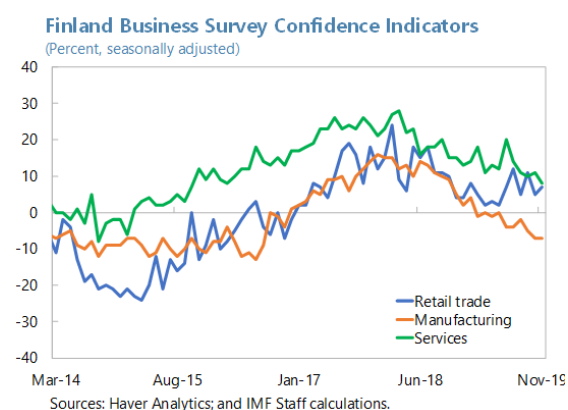
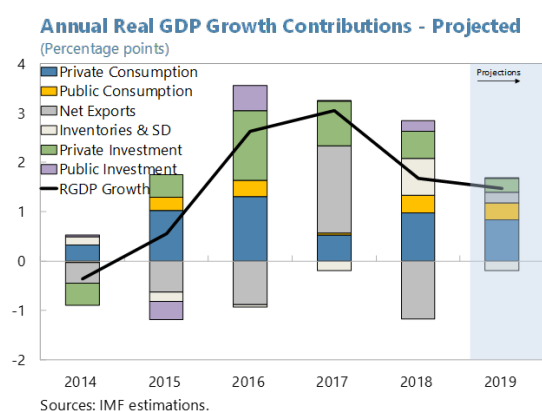
The previous government ended in April 2019 because of failure to reach an agreement on rationalization and delivery of health and social services, which was its central policy to achieve budget savings. The new government has committed to spending more, including on education, employment, and climate policies.

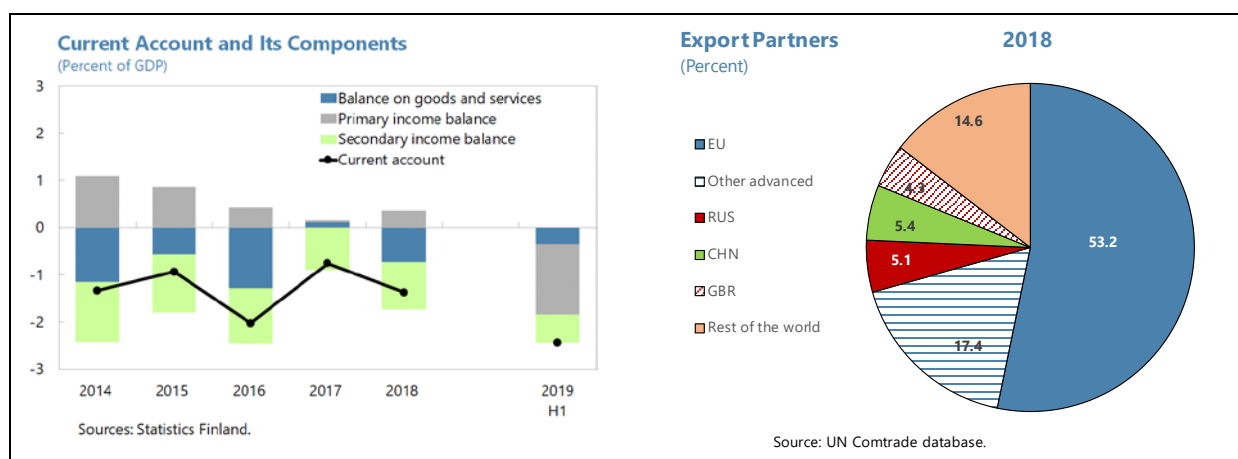


RECENT DEVELOPMENTS

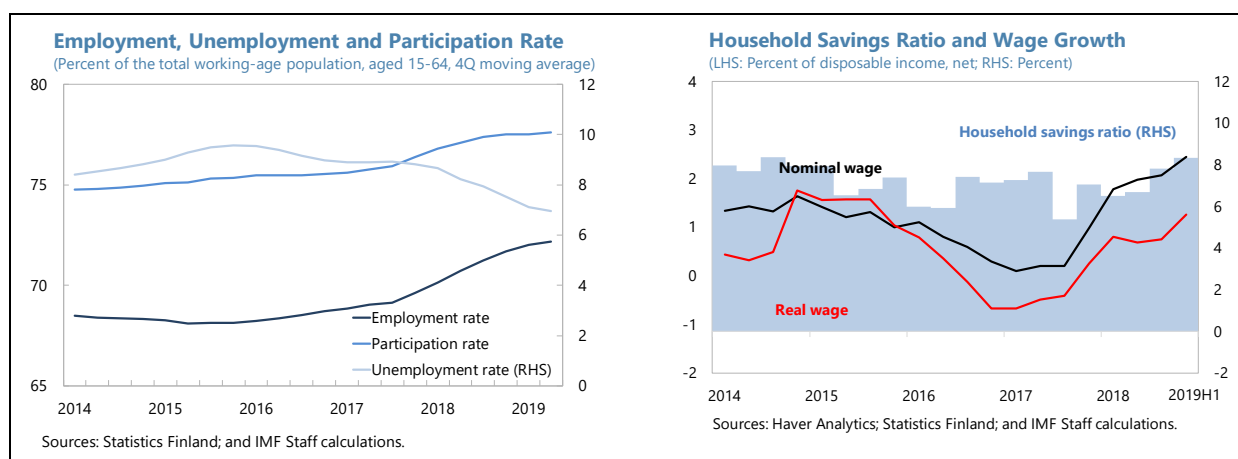
3. The economy has slowed. Growth for 2018 was revised down, to 1.7 percent, and has averaged 1.4 percent y/y in the first three quarters of 2019. The slowdown has been driven mainly by capital investment and private consumption, while confidence in the manufacturing and retail sectors has ebbed (Figure 1).

- The significant weakness in private capital investment in the first half of 2019 comes after three years of substantial gains, particularly in residential construction, which has slowed markedly.
- Net exports were revised down materially for 2018, reflecting strong imports and weak exports. The deficit in the secondary income balance remained, and consequently the CA deficit widened slightly, to 1.4 percent. The current account deficit in the first half of 2019 was 2.4 percent. Over half of Finnish exports go to the EU, and the share to China has increased appreciably over the last decade ([2017 Selected Issues Paper](#)), making trade highly exposed to current uncertainties.



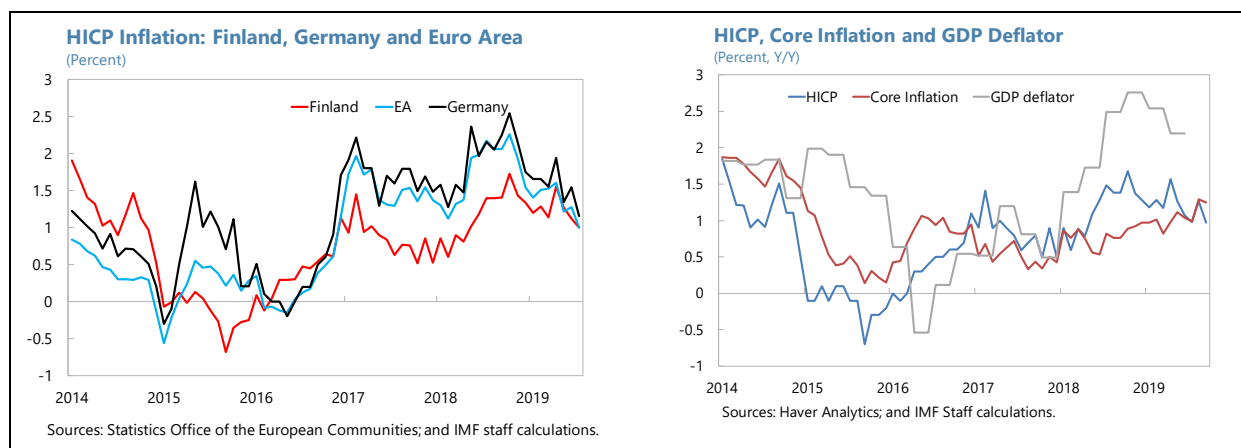


- Household consumption has been supported by strong employment, a pick-up in wages, and low interest rates. The trend employment rate reached 72.6 percent in Q3:2019, its highest level since 2008,¹ while the participation rate reached 67 percent, closing the gap with most Nordic peers (Figure 2). The trend unemployment rate declined to 6.7 percent. After a protracted period of wage moderation, earnings rebounded in 2018 and 2019. However, the household savings ratio has edged up in 2019, consistent with lower consumer confidence.



4. Inflation remains low, as in other euro area economies. HICP inflation about 1 percent y/y in the third quarter of 2019, reflecting low energy and import prices, and low core inflation. Wage settlements in 2018 ranged from 2 to 3 percent, but firms' wage bills rose by almost 4½ percent, given increases in employment and hours (which increased by 2½ percent) and bonuses. Higher labor costs are passing through to services inflation—the rate of change of the more domestically-oriented GDP deflator is above 2 percent—but only gradually to headline inflation.

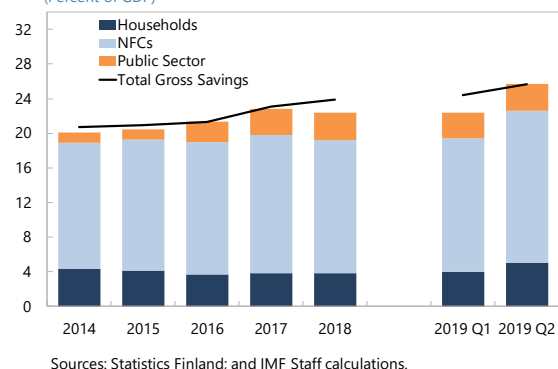
¹ Trend employment and unemployment rates are computed by Statistics Finland to control for large seasonal swings.



5. No significant fiscal or external imbalances have opened up, although the external position remains moderately weaker than implied by fundamentals.

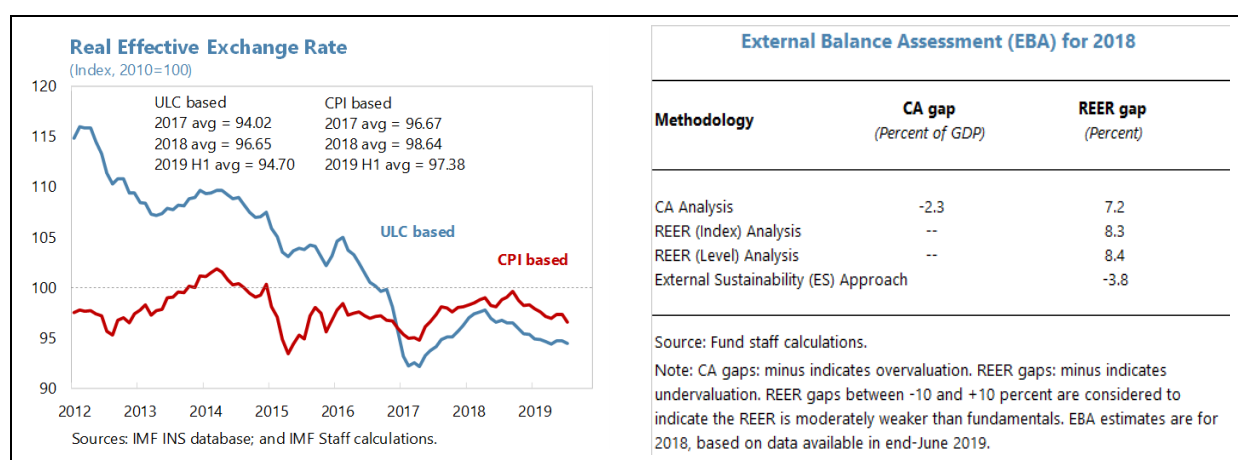
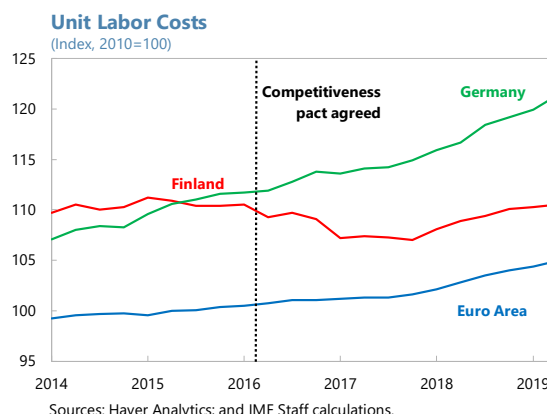
- Fiscal balances have improved steadily over the past four years, with gross debt edging below the Maastricht 60 percent criterion in 2018.² Staff projects the deficit to reach 0.8 percent of GDP in 2019, the same level as in 2018; the change in the structural balance implies that the fiscal stance in 2019 has been mildly expansionary.
- The current account balance has averaged -1¼ percent over the past four years. National savings has increased since 2016, mainly because of improved public sector balances and, more recently, a slight increase in household savings. But national investment has also picked up, resulting in a slight deterioration in the current account balance through 2018.
- Unit labor costs have fallen considerably in recent years, and more recently have been increasing broadly in line with those in the euro area. However, the External Balance Assessment (EBA) current account model assesses the current account balance in 2018 (-1.4 percent of GDP) to have been below the level consistent with underlying macroeconomic fundamentals (estimated to be +0.7 percent of GDP), assuming all policy variables are set at their medium-term desirable levels. Assuming a trade elasticity of 0.3, this estimated current account gap (-2.3 percent of GDP) would imply a real exchange rate overvaluation that falls in the range of 5 to 10 percent. The EBA real exchange rate models yield comparable results (Annex III). Medium term fiscal restraint would contribute to keeping domestic demand in check, and therefore improving the current account, while structural policies that boosted productivity could also improve balances. Preliminary results from the

Savings Ratio by Sector, Gross
(Percent of GDP)



² Note, however, that public debt increased by over 20 percentage points during the recession.

current account models applied to the projected current account balance for 2019 indicate that the external position would remain moderately weaker than implied by fundamentals and desirable policy settings, assuming a modest narrowing of the trade and income deficits. Specifically, the current account gap for 2019 would be just over -1½ percent, implying a real exchange rate overvaluation of about 5 percent. That said, the data are volatile and have been subject to large revisions, making these assessments imprecise.



6. But household debt and productivity weaknesses persist:

- *Household debt* has been steadily increasing. It remains below that in other Nordic countries, but is now slightly above the euro area average (in terms of net disposable income). Relatively risky loans, such as housing company loans, have been growing strongly—by 60 percent over four years in the case of housing company loans, and by nearly 20 percent in the case of consumer loans (Section C).
- *Productivity growth*: Labor productivity has averaged around 1 percent y/y since 2010, and within the past year has been negative (Figure 2). The poor post-crisis performance is partly explained by an increase in the share of services (with lower productivity growth) in production. In addition, manufacturing productivity growth and innovation appear not to have been as strong as before the crisis. There are two underlying factors at work: the Finnish economy has been reallocating resources in reaction to major macroeconomic shocks,³ and labor market matching appears problematic ([Finland: 2018 Article IV Staff Report](#))—for example, the

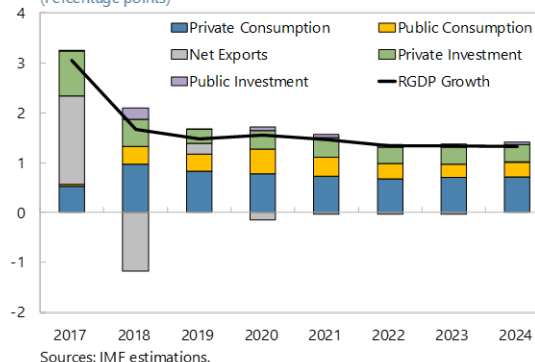
³ Recent shocks include the financial crisis, the downturn of Nokia, substantial terms of trade shocks, and reorientation of trade away from Russia (following sanctions); see Finland: 2017 AIV Staff Report.

Beveridge curve, which relates unemployment rates to vacancies, remains appreciably out from where it was before the crisis. The more recent downturn in labor productivity is mechanically explained by an increase in employment (driven by rising participation, principally of older cohorts, associated with reforms to pensions; Annex VI).

OUTLOOK AND RISKS

7. Growth is expected to remain lower than in recent years. It is projected to be only about 1½ percent in 2019 and 2020, before reverting to a trend growth rate of about 1¼ percent (19). Household consumption is expected to grow steadily across the forecast horizon, but private investment is projected to slow appreciably. Public consumption is expected to contribute to growth, especially in 2020 and 2021. Because of muted external demand and weaker domestic absorption, net trade is expected to revert to making no contribution to growth from 2020.⁴

Annual Real GDP Growth Contributions - Projected
(Percentage points)



8. Inflation is projected to climb slowly, as spare capacity disappears gradually, and faster wage gains in services progressively pass through consumer prices, counterbalancing muted imported goods inflation. Consequently, HICP inflation only begins to approach 2 percent towards 2024.

9. The long-run potential growth rate is a crucial assumption for the outlook.

- *Labor productivity:* Assumed trend labor productivity growth of around 1 percent balances upside and downside arguments but is highly uncertain. Factors that have recently held back labor productivity, including the adjustment to shocks discussed in the previous section, could be argued to have largely passed. However, there are also persistent factors, such as the tail of weakly-performing firms and labor mismatches.
- *Labor supply:* Labor supply is projected to grow at around ¼ percent. This assumes increasing labor participation more than offsets a shrinking working age population, based on expected momentum from recent and planned labor reforms (Annex VI).

10. Risks are mainly to the downside (Annex I). The two main risks are domestic, concerning potential growth and fiscal balances.

- *Potential growth:* The assumptions for labor productivity and supply are notably uncertain. Labor supply paths will have a crucial bearing not only on output but fiscal balances (section B).

⁴ Monetary conditions are supportive, although the ECB's recent easing is not expected to boost growth significantly—lending surveys indicate that SMEs are not being held back by tight lending conditions.

Participation rates have improved considerably in recent years but could prove to be predominantly cyclical—if they were to revert to an historical mean, labor supply could shrink each year by between $\frac{1}{4}$ and $\frac{1}{2}$ percent over the next decade, rather than continue to increase (19, 20). Likewise, additional reversals of structural reforms could impede further improvements in employment.

- *Fiscal balances:* The government's fiscal plan delays consolidation compared to previous budgets. In addition to planned spending increases of 0.4 percent of GDP, the government has indicated the possibility of a further significant increase in expenditures amounting to 0.7 percent of GDP (section B). Were these one-off spending items to become permanent, medium-term fiscal sustainability could be compromised.

Other risks are external:

- *Trade:* The economy is exposed to further deterioration in external demand, such as from intensification of trade disputes. The "Competitiveness Pact" agreed between employers and unions in mid-2016 held down wage growth and brought unit labor costs closer to those of European peers. But unit costs have been increasing over the last year, and further disappointing productivity growth could put pressure on the terms of trade.
- *Financial:* The banking sector has significant and complex cross-border exposures, making the system vulnerable to disruption in external wholesale funding and, indirectly, to corrections in real estate markets in the rest of the Nordic region ([2016 FSSA](#) and [2018 Selected Issues Paper](#)).

Authorities' Views

11. The authorities broadly shared the staff's assessment of the outlook and risks. The authorities agreed that future growth was likely to be lower than in previous years. They expect GDP growth to approach 1½ percent in 2019, falling from there to a potential growth rate of around 1 percent. Inflation would remain low and increase gradually, in line with moderate labor cost inflation. Because the government's policies to boost employment are not yet fully articulated, they project the employment rate to reach just over 73 percent by 2023. Risks to the outlook were perceived as stemming predominantly from a further escalation of trade tensions and a deterioration in the public finances. The authorities anticipate the current account balance to remain negative, and concurred that the external position is somewhat weaker than what fundamentals suggest.

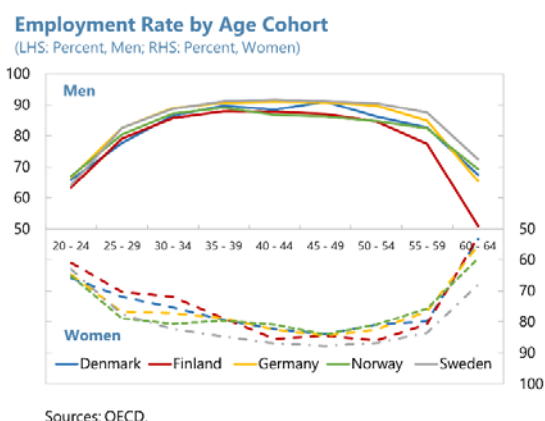
POLICY DISCUSSIONS

12. The Finnish social model depends on high levels of employment and growth to sustain a generous welfare system. A key challenge will therefore be to increase employment rates (section A) and to balance the government's plan to increase spending with the need to maintain fiscal buffers (section B). Managing financial risks, especially those to borrowers, remains important (section C).

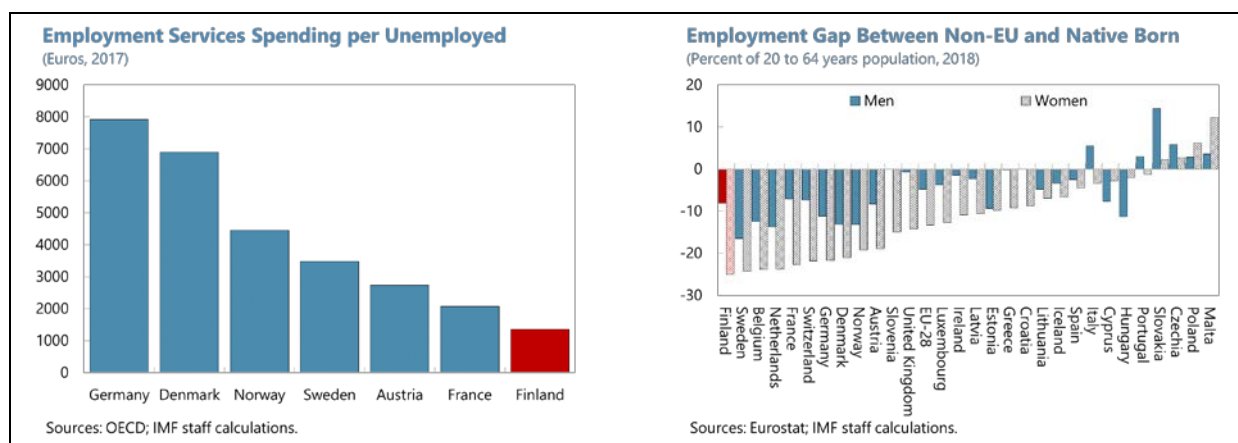
A. Structural Policies

13. High employment is important for the sustainability of the social model, but it is not clear how much more can be achieved by active labor market policies. A cornerstone of the government's economic program is for the employment rate to reach 75 percent by 2023, from 72.6 percent currently—an additional 60,000 jobs.

- Higher employment rates are possible, as shown in Sweden. Some age cohorts look ripe for improvement. Many Finnish women stay out of the workforce for long periods while raising children—not only lowering aggregate employment but earnings over women's lifetimes—which warrants a careful examination of the incentives generated by leave and homecare benefits. Still more could be done to increase participation and employment of older workers, such as by further limiting early labor market exit schemes.
- The government should closely consider work incentives from taxes and benefits. Current schedules mean that some—especially low-wage and part-time workers—pay a financial penalty to work. Increasing reliance on in-work benefits to low-income and part-time workers and a reduction in marginal tax rates at higher incomes could promote employment (Selected Issues Paper). Although it is difficult to disentangle the effects of recent reforms from the economic cycle, there is some evidence that the so-called “activation model”, designed to encourage the unemployed to look for work, was successful in encouraging job search ([VATT 2019](#)). Rather than scrap the activation model completely, better differentiation could be made between those with strong labor market attachment and those with more limited job prospects, or benefits could vary over time for recipients of earnings-related unemployment insurance while keeping unemployment assistance constant for individuals with weaker labor market attachment.
- The government indicates it favors wage subsidies and more spending on assistance for job search. Spending on employment services is relatively low, so more resources for case workers who assist those seeking jobs could help. Measures focusing on integrating migrants, especially

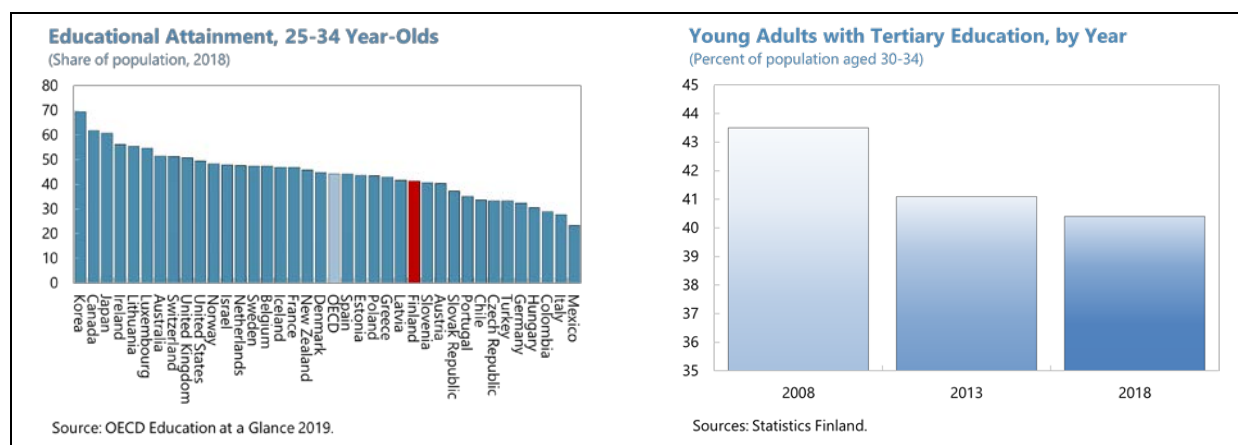


migrant women, could also yield gains as Finland lags other European countries.⁵ But proposals that rely on job subsidies, which are expensive and have had mixed effects in other countries (Card and others, 2018), seem likely to disappoint.



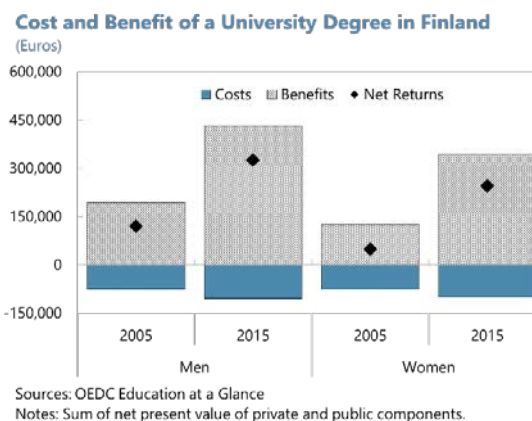
14. Proposed spending increases on education could address labor market mismatches.

Finland's share of university graduates is below the OECD average, and tertiary educational attainment of cohorts of the same age has been declining over the past decade. To boost labor productivity, the government is targeting an increase in graduation rates and plans to reverse spending freezes that have seen expenditure per student decrease by 9 percent since 2010.



⁵ For example, bringing the migrant employment rate to the European average would increase employment by 10,000, a useful contribution to the government's goal of 60,000.

- Attention should be given to Finland's selective university admission system. Net financial returns from tertiary education are high—around 12 percent, compared to 8 percent in the OECD on average—and are estimated to have increased by 235 percent between 2004 and 2015, according to OECD calculations. But around two-thirds of applicants are rejected, the highest proportion among countries with available data (OECD 2019), and repeated applications are common. This can defer entry into the labor market or lead to underemployment for many young adults, delaying human capital accumulation and lifetime earnings.



- To mitigate stresses on the public finances (section B), universities could charge moderate tuition fees to increase resources (and therefore help increase enrollment), combined with expanded grants or income-contingent loans for at-risk students (Määttä and Vihriälä 2017). Visa procedures for foreign students should be streamlined and information on career and recruitment services should be provided more actively to improve retention after studies are completed (Finnish National Agency for Education 2018).

15. The government emphasizes green policies, but more would be needed to reach its goals. The government plans to achieve carbon neutrality by 2035, by reducing emissions and strengthening carbon sinks through increased taxes, subsidies for renewables, and expenditures.⁶ Studies indicate that the planned increases in taxes on energy production will not be sufficient for the government to reach this goal (Koljonen and others 2019). The authorities should consider removing existing tax expenditures and other environmentally-harmful subsidies, which are each year worth 3½ billion euros (about 1¼ percent of GDP). Such an initiative would require political consensus, but globally raising the price of carbon is the single most effective tool for countries to reduce fossil fuel emissions (Fiscal Monitor 2019). Eliminating subsidies would also contribute to closing deficits (section B).⁷ The higher revenues could be used to finance investment in green technologies and to support energy-intensive sectors while they adjust.

⁶ The following measures will be implemented: (i) effective tax rates on energy, transport and heating fuel will be increased; (ii) the energy tax rebate mechanism for energy-intensive industries and tax break on diesel will be abolished; (iii) subsidies to promote investment in renewable energies and promotion of resource efficiency will be increased; (iv) investments will be made in low-emission transport and measures to reduce the emissions from housing; and (v) funding for carbon sinks will increase. The government will also commission the study of an emissions-based consumption tax.

⁷ Examples include lower excise rates for diesel and peat, lower electricity tariffs for industry, refunding the agricultural energy tax, and compensation for compliance costs faced by firms covered by the EU Emissions Trading System.

Authorities' Views

16. The authorities agreed on the need for structural reforms to boost employment and productivity. They saw potential from increasing employment for older workers by further limiting early exit routes from the labor force. The authorities believed that extra spending for case workers could be an alternative to reducing benefits for long-time unemployed. The authorities pointed out that university graduation rates have been declining and that additional spending will be accompanied by policies to increase university admissions, mainly in ICT and technology. They disagreed that raising the price of carbon was the single most effective way of reaching carbon neutrality, citing competitiveness concerns of unilateral measures and arguing that carbon leakage calls for more comprehensive measures.

B. Fiscal Policies

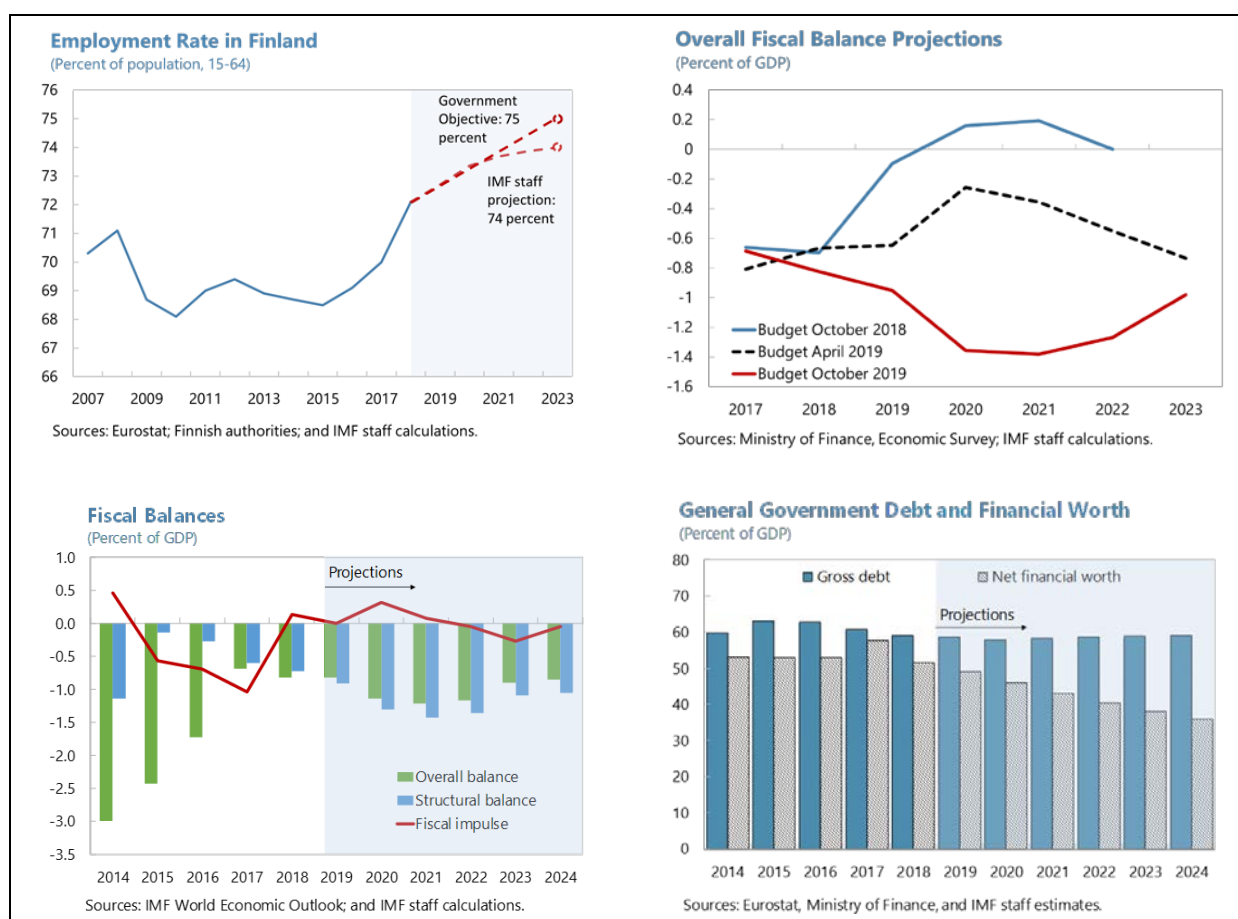
17. The government aims to increase spending and balance the budget. Measures outlined in the government [program](#) include permanent budgetary measures—spending increases, tax measures, and reallocations within the budget—and one-off expenditures on education, innovation, green goals, infrastructure, and employment. A total of 3.1 billion euros (1¼ percent of current GDP) is planned for the latter over the period from 2020 to 2022, of which 1.4 billion euros has been allocated. (Spending the remaining 1.7 billion euros is to be contingent on sufficient employment measures to be identified by the end of 2020.) The increase in permanent spending is to be financed by new backloaded tax measures that will eventually reach 0.8 billion euros (0.3 percent of GDP) by 2023 and through higher employment. Reforms to reach the 75 percent employment rate target by 2023 are still to be decided, but the government expects this will both increase revenues from income taxes and social contributions and decrease spending on social benefits. One-off expenditures are to be financed mainly by drawing down government financial assets. The program targets a broadly stable debt level in the next two years, before returning to a declining path in 2023.

18. The extra fiscal stimulus will provide useful near-term support for demand in an otherwise slowing economy. Growth has fallen rapidly, the output gap is still somewhat negative, inflation remains subdued, and there are substantial external risks to the outlook. The stimulus is about 0.4 percent of GDP in 2020, adding about a quarter percentage point to growth in staff's projections.

19. And some of the measures could boost output in the long term. Increased spending on public investment could improve potential growth and regional convergence, as could spending on higher education, if that leads to improved skills (¶14). The proposed revenue increases from higher excises on energy and phasing out of mortgage interest deductibility will improve efficiency and remove distortions.

20. However, the budget is unlikely to be in balance by 2023, even with increased employment. In staff's baseline projection, the employment rate increases further, taking into account continuing policies (Annex VI), but less so than targeted by the government.

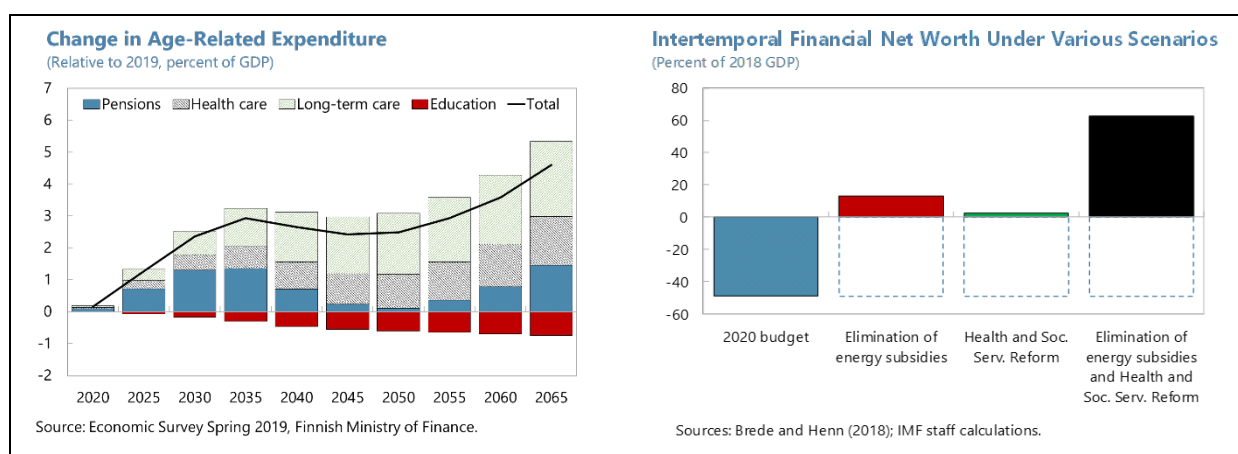
- On this basis, staff projects the headline government balance to decrease to -1.2 percent of GDP over the next two years, before returning to -0.9 percent of GDP in the medium term. (Spending the unallocated 1.7 billion euros of one-off measures would correspondingly increase the deficit further.) This delays previous consolidation plans and would mean missing the government's own medium-term target of a minimum structural balance of -0.5 percent of GDP. As a result, debt would slightly increase, approaching 60 percent of GDP by 2024, from 58.5 percent in 2019 (Annex V: DSA). *Net financial worth* would change more substantially, falling from 52 percent of GDP in 2018 to 37 percent in 2024, a result of the sale of financial assets that will be used to finance the one-off expenditure program.



- The government's target implies about 2 percent more employed workers than assumed in staff's projections. If that higher employment were achieved, and investment also increased to match the added employment, and revenues increased in line with the extra output, the budget *might* balance—but not if policies used to boost employment are themselves costly.

21. Maintaining healthy public finances is important, especially given known future pressures and potential risks:

- Rising demands for healthcare and social services will stress the public finances. Staff estimates the long-run sustainability gap—the adjustment needed in the government balance to bring public sector net wealth to safe levels—to be around 3 percent of GDP.
- In addition, there are significant risks to the baseline: the economy might not recover as well as assumed, and spending on “one-off” expenditures might be hard to switch off. If the employment rate were to revert gradually to its historic mean, debt would reach around 65 percent of GDP by 2024 and would increase from there. The public balance sheet is exposed to asset price valuation risks and a high stock of government guarantees, while pensions liabilities are large. A forward-looking measure of net wealth that includes future deficits under unchanged policies and expected increases in age-related costs is low compared to potential losses from a recent fiscal stress test. Staff analysis suggests that a prudent level of intertemporal financial net worth for Finland would be between 30 and 85 percent of GDP, compared to -49 percent of GDP (2017 Staff Report; Brede and Henn 2018).



22. Fiscal credibility would be enhanced if the government makes spending contingent on economic performance—i.e. that it commits not to spend the extra 1.7 billion euros until it is sure that it can balance revenues against the 1.4 billion euros of one-off items. A planned mid-term budget review sets a criterion of identifying measures to add 30 out of the targeted 60 thousand jobs before all spending on one-off items takes place—a more prudent criterion would be for half of the extra spending to take place at that point.

23. Even then, the government will likely need to take corrective actions to meet its medium-term target, which should remain the fiscal anchor. This would likely require offsetting measures worth about ½ percent of GDP per year. All options should be on the table. Planned excise increases could be brought forward. The government could significantly improve the public finances by eliminating environmentally-harmful subsidies. Analysis by Fund staff indicates that increasing in-work benefits to low-income and part-time workers and reducing marginal tax rates for upper-middle income workers could boost employment, hours worked and earnings (Selected Issues Paper). This could even be done in a revenue-neutral way if out-of-work benefits for secondary earners such as housing benefits and home care allowance were reduced. Otherwise, the

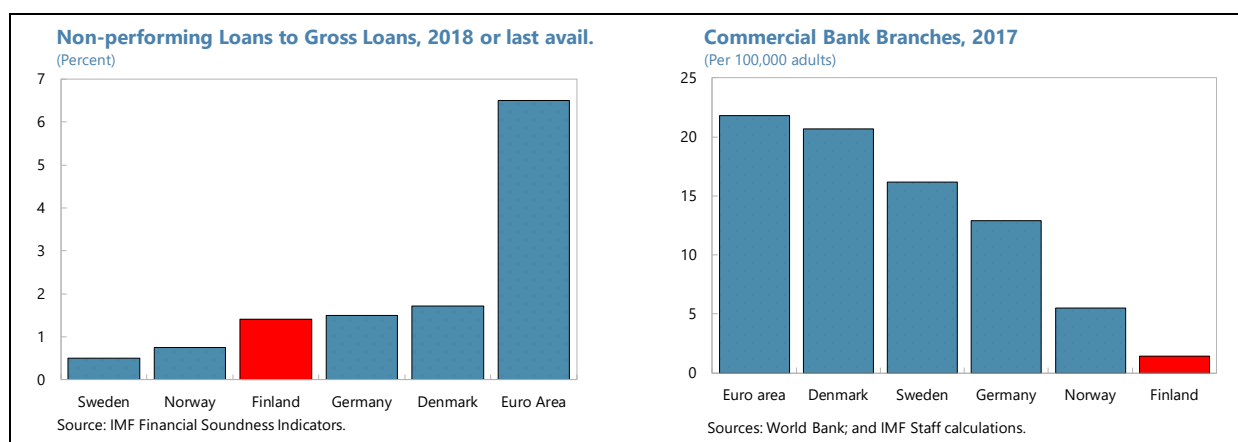
government will have to find other savings. Crucially, cost control has to be part of the debate about health and social services reform.⁸

Authorities' Views

24. The authorities recognized that the government's program is demanding. They emphasized the cornerstones of a balanced fiscal path, restructuring health and social services, and increased employment. They agreed these would not be achieved automatically, and that building fiscal buffers is crucial to ensure the social welfare model can be sustained. The authorities clarified that the unallocated one-off spending is contingent on sufficient employment measures, to be decided by the end of 2020. The Ministry of Finance's projections show a persistent budget deficit, based on an assessment of current defined measures.

C. Financial Sector and Macprudential Policies

25. The banking system is well capitalized and profitable. Measured capital ratios fell in 2018 compared to those seen in 2017, due to the re-domiciliation of Nordea (2018 Selected Issues Paper) but remain above required levels that include systemic risk buffers and buffers for other systemically important institutions. Profitability remains stable and around the euro area average, notwithstanding the compression of [interest rate margins](#). The favorable cost-to-income ratios of Finnish banks is in part driven by low levels of non-performing loans and greater efficiency of Finnish Banks—the digitalization of the payments system (Annex IV) and of business practices is relatively [advanced in Finland](#), suggesting that banks are already reaping efficiency gains from digital transformation, notwithstanding large up-front investments that can initially [subdue profitability](#). This is reflected by the number of bank branches per 100,000 inhabitants, which has fallen significantly over the last decade and is now extremely low relative to peers.



⁸ The previous government had reform plans that it estimated would yield savings of 1.3 percentage points of GDP per year in the medium term.

26. Finnish banks are highly exposed to real estate, but residential and commercial real estate markets are not obviously overvalued. The exposure of domestic banks to real estate market has grown significantly over the last 20 years. The total volume of credit issued by domestic banks to the real-estate and construction sectors stood at 48.5 billion euros in 2018 (above 20 percent of GDP and 50 percent of banks' receivables from firms and housing corporations), but rates of non-performing real estate loans remain low. In addition, real estate markets do not seem overheated overall, although there are differences across regions and market segments:

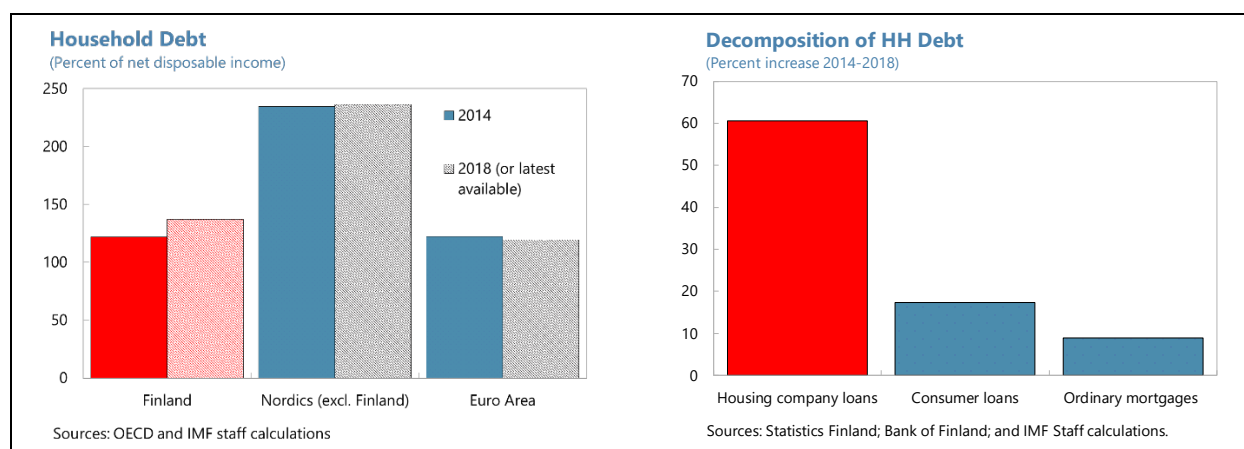
- *Residential real estate* prices have been nearly flat in real terms across the whole country, price-to-income and price-to-rent ratios are relatively low, and construction of new housing units seems to be slowing. However, housing prices in the Helsinki region have increased steadily while in most other parts of the country prices are falling (Figure 4).
- *Commercial real estate (CRE)* valuations also do not appear stretched overall, but aggregate price dynamics mask significant differences across regions and submarkets. In the prime Helsinki office segment, limited supply means that rents are increasing, but they remain below the levels observed in other European capitals. By contrast, prices of retail properties have declined, given the brisk pace of growth in e-commerce and new supply in the Helsinki area. There are ongoing efforts to collect more data for a more precise assessment of CRE-related vulnerabilities in the financial sector, but data to monitor developments in CRE markets remain insufficient.⁹

27. However, the increase and the composition of household debt create borrower-side vulnerabilities. While the debt-to-income ratio remains far below that of Denmark, Norway and Sweden, it has increased in recent years, driven by large annual increases in consumer credit and housing company loans. The share of highly indebted households is also elevated relative to levels observed in the past (although it has been stable in recent years). One concern is that financing the purchase of real estate through shares in a housing company masks risks to home owners and can make higher prices appear more affordable than they truly are.¹⁰ In addition, the majority of housing loans carry variable rates.

28. The authorities are taking steps to address these weaknesses. In particular, a government appointed working group has recommended a comprehensive cap on the debt-to-income (DTI) ratio, limits on the indebtedness of housing companies, and shortening the maximum

⁹ CRE market data present mainly come from private providers and are neither complete nor representative. The ESRB has discussed similar issues [here](#).

¹⁰ Home owners buy shares of a housing company that may be connected to a specific apartment. The housing companies charge the shareholders a monthly fee which they use to service their debt. The debt is mutually guaranteed, so shareholders are liable for payments of *all* debt held by the housing company—including in case of nonpayment of fees by other shareholders. Hence, under this scheme, repayments can appear low initially and risks can be mispriced.



maturity of mortgages and housing company loans.¹¹ Crucially, the DTI limit would cover all borrower's debts, including housing company loans. The working group proposes that the DTI limit be 450 percent; anticipating cases in which higher leverage could be affordable for some borrowers, it also proposes an exemption to allow banks a share of borrowers with higher debt ratios. These would be significant improvements and also in line with recent [recommendations](#) by the European Systemic Risk Board. The parliamentary discussions on these proposals are set to begin in 2020. In addition to the working group recommendations, an electronic registry of housing company shares is scheduled to be operational by the end of 2022. The registry will include full ownership information and will therefore make it easier to assess risks of investing in housing companies.

29. Additional steps could be taken to address financial risks, especially those associated with the increase in housing company and consumer loans.

- Moving forward to establish the planned comprehensive positive credit registry and [stepping up data collection](#) on loans from outside credit institutions is important to limit the possibility of cheating by loan applicants, and would also help to assess the increase in consumer credit from the increase in "peer-to-peer" and other non-bank loans.
- Once the credit registry is operational, the authorities could consider implementing a debt service-to-income cap, which would complement the DTI cap by targeting the risk of high interest burdens, such as from consumer loans. Replacing the loan-to-collateral ratio for mortgage loans by an LTV cap would further strengthen the macroprudential toolkit.¹²

¹¹ The [report](#) recommends, in addition to the DTI cap, a maximum maturity of housing loans of 25 years (except for 10 percent of the lending volume), a limit on indebtedness of housing companies of 60 percent of the value of the properties and the removal of the possibility to defer amortization of housing company loans. Other recommendations include the transfer of supervision of non-bank consumer lending to the FIN-FSA and regulation concerning the management of consumer's insolvency risks.

¹² To meet the cap, loan applicants are able to pledge collateral aside from the residence itself, meaning that loans could exceed values of the purchased real estate.

- The underlying causes that have led to the boom in housing company loans should be addressed. Phasing out mortgage interest tax deductibility is welcome, but has made housing company loans relatively more attractive in some cases, and there are other elements of the tax code that create a clear incentive to favor housing company loans over conventional mortgages.¹³ It is therefore important that the planned government [review](#) of income tax advantages of housing company loans begin soon.¹⁴

30. Recent developments in neighboring countries highlight the need for effective supervision and enforcement of AML/CFT and strong regional cooperation, given the highly integrated financial sector in the region. Recent measures including the establishment of the AML/CFT coordination group and the recent substantial increase in resources for AML/CFT supervision within the FSA are helpful. However, the authorities should strive to close remaining gaps in Finland's AML/CFT framework as highlighted by the [recent assessment](#) of the Financial Action Task Force (FATF). In particular, they should:

- Develop, adopt and implement a risk-based AML/CFT supervisory engagement model;
- Undertake formal sector-specific risk assessments, in particular for various financial institutions;
- Ensure that sanctions are imposed on individual institutions if AML/CFT regulation has been violated as so far, no sanctions have been imposed on financial institutions;

Authorities' Views

31. The authorities considered that containing vulnerabilities from the increase and change in the composition of household debt is a policy priority. The national authorities noted that trying to put in place additional macroprudential measures may be challenging politically, and that legislative, administrative and technical obstacles may result in delays in implementing the positive credit register and the electronic registry of housing company shares. The national authorities agree with the AML/CFT recommendations and would be ready to allocate resources for supervision if deemed necessary.

STAFF APPRAISAL

32. The slowing economy highlights underlying challenges. The economy has performed well over the past three years, with unemployment falling and real earnings increasing. But growth has slowed more quickly than anticipated in 2019. Trend growth is constrained by adverse demographics, while productivity growth remains weak. There are some vulnerabilities in household

¹³ The shares of a housing company may be connected to a specific apartment, and their transfer comes with a lower transfer tax burden (2 percent on the shares of the limited company versus 4 percent on direct property). Transactions are also less complicated compared to direct ownership of real estate. In addition, financing the purchase of buy-to-let properties can entail greater income tax savings.

¹⁴ Housing cooperatives in Norway share many similarities to Finnish housing companies. However, their debt has not grown, in part because there are stringent legal restrictions for letting flats in housing cooperatives.

finances. The external position remains moderately weaker than implied by fundamentals—the estimated current account gap would imply a real exchange rate overvaluation in the range of 5 to 10 percent, with similar estimates from real exchange rate models.

33. The new government's program is challenging. It has committed to spending more on education, employment, infrastructure, and climate policies—and balancing the budget. In the short run, fiscal stimulus will support demand—but even so, growth is only expected to reach 1½ percent this year and the next. Given likely growth and employment over the medium term, the government would still have a fiscal deficit of about 1 percent of GDP in 2023, about ½ percentage point away from its medium-term fiscal target.

34. There are many options to meet the medium-term fiscal target. Assuming it proceeds with the planned expenditure increases, offsetting measures would be required. The government could eliminate tax expenditures and subsidies on environmentally-harmful policies. Otherwise, the government will have to find other savings. Cost control has to be part of the debate about health and social services reform.

35. Improved tax and benefit incentives could boost employment. The government could look at leave and homecare benefits, which generate incentives for women to stay at home, and tax and benefit schedules that mean that some face a financial penalty to work, rather than stay unemployed or out of the workforce. Still more could be done to increase participation and employment of older workers. Employment of older workers could be increased by further limiting early retirement. But relying on job subsidies, which are expensive and have had mixed effects in other countries, seems likely to disappoint.

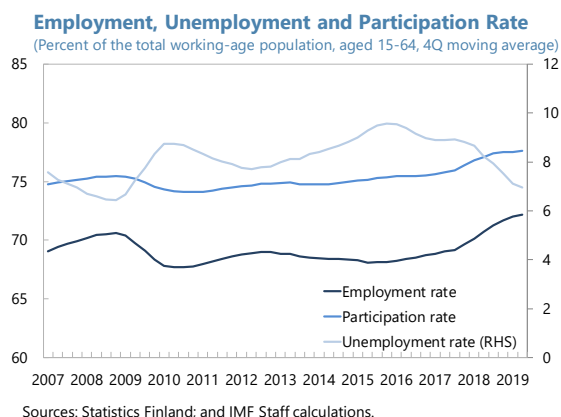
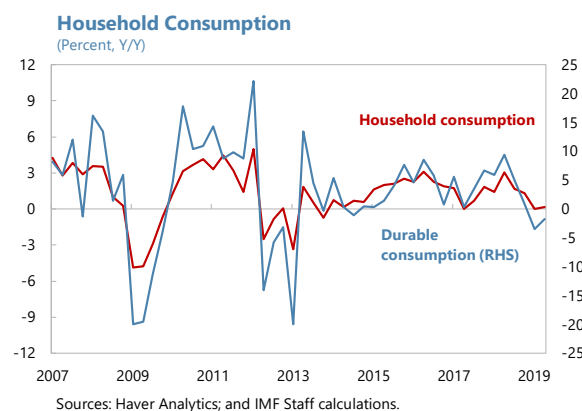
36. The financial system is sound, but extra measures are needed to address vulnerabilities of borrowers. While Finnish banks are highly exposed to real estate, residential and commercial real estate markets are not obviously overvalued. But household debt has been increasing, especially from housing company loans and consumer lending. The recent recommendation to limit the ratio of household debt to income is both sensible and in line with steps taken in many other countries. But it is important to address the tax code, which creates a clear incentive for investors to favor housing company loans, and to improve data collection.

37. It is proposed that the next Article IV consultation with Finland be held on the standard 12-month cycle.

Figure 1. Real Sector Developments

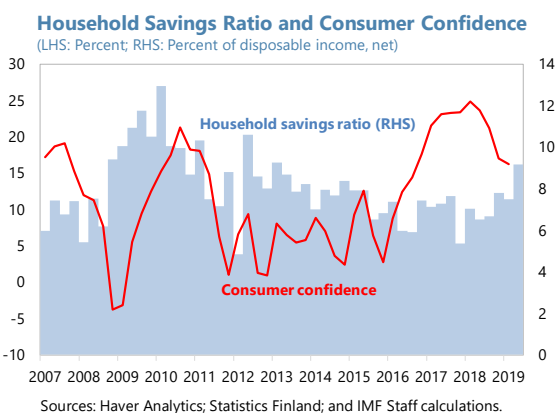
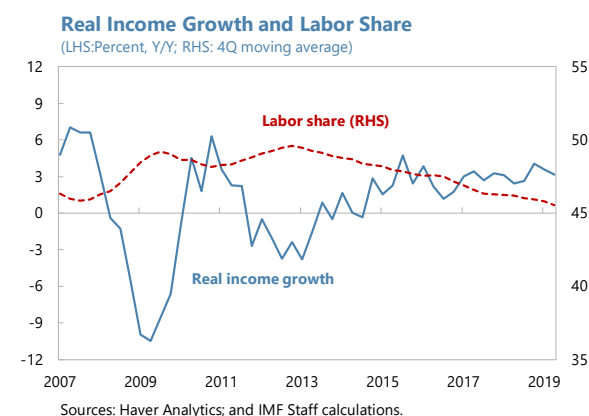
Household consumption slowed in early 2019, led by durables, but began to recover in the second quarter of 2019...

...reflecting a strong labor market...



...which has spurred real income growth.

Nonetheless, households have become somewhat more cautious, nudging savings higher.



Investment has slowed after almost four years of brisk growth, amid higher economic uncertainty.

A sharper drop of imports and resilient exports boosted overall GDP in the first half of 2019.

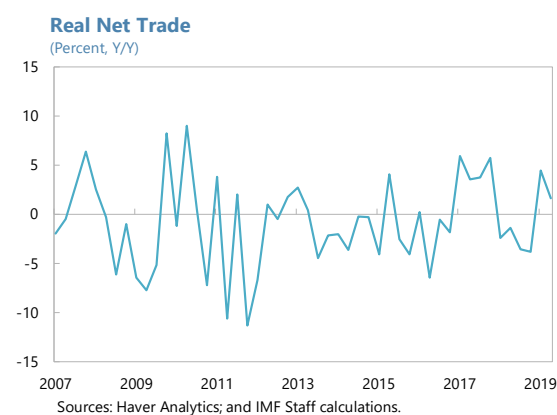
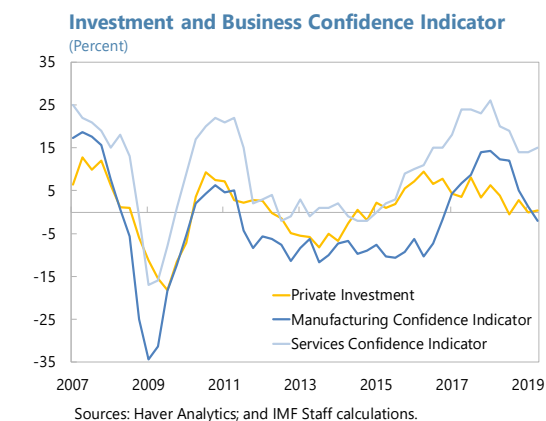
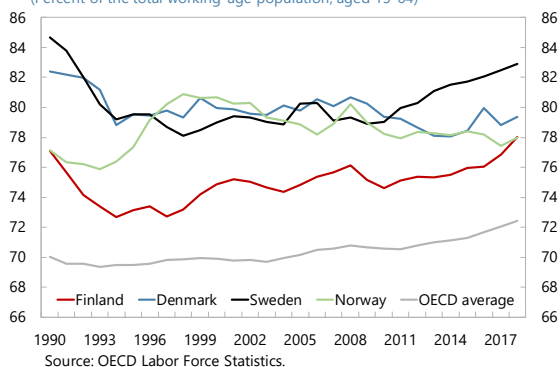
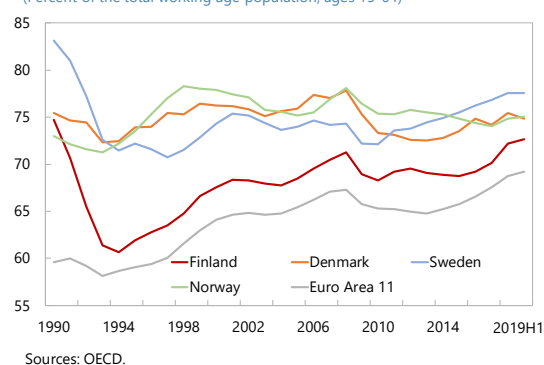


Figure 2. Labor Market Developments*Participation rates have increased...***Participation Rates in Nordic Countries**

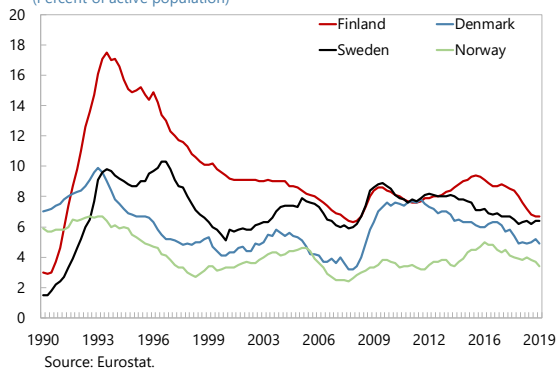
(Percent of the total working-age population, aged 15-64)

*...as have employment rates....***Employment Rate**

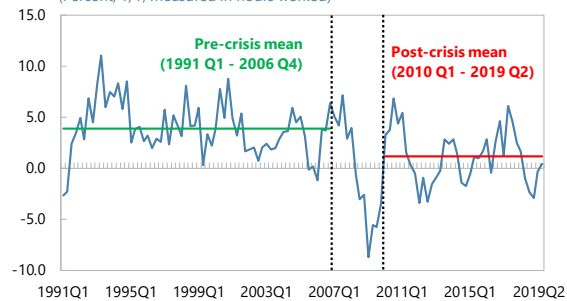
(Percent of the total working age population, ages 15-64)

*...leading to a cyclical low in unemployment rates.***Unemployment Rate in Nordic Countries**

(Percent of active population)

*But labor productivity growth has been weak in recent years....***Labor productivity growth in the private sector**

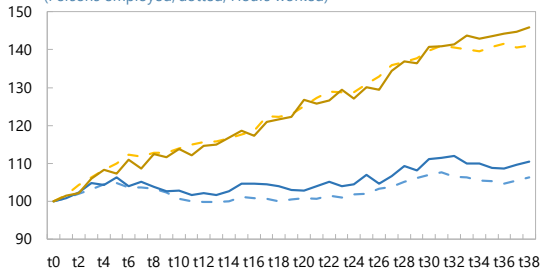
(Percent, Y/Y, measured in hours worked)



Note: Labor productivity is measured using SA GVA and employment excl. public administration, defence, education, human health and social work activities.

*...even accounting for the recession.***Labor productivity in the private sector**

(Persons employed, dotted; Hours worked)



Note: t0 refers to the first quarter preceding the recovery (indexed at 100). Labor productivity is measured using seasonally adjusted gross value added, employment and hours excluding public administration, defence, education, human health and social work activities.

This has been associated with an increase in the unemployment rate for a given vacancy rate, suggesting labor market mismatches.

Beveridge Curve

(Percent)

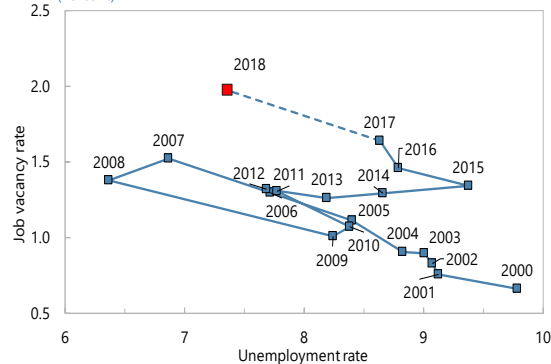
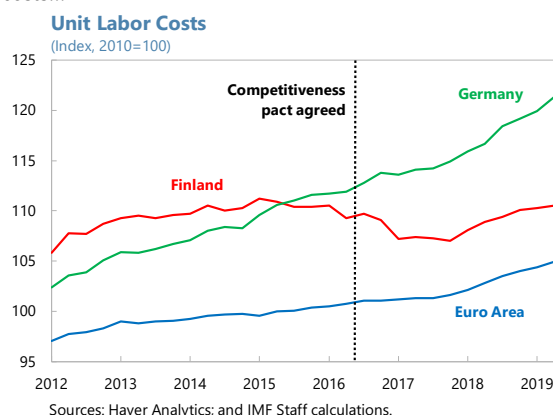
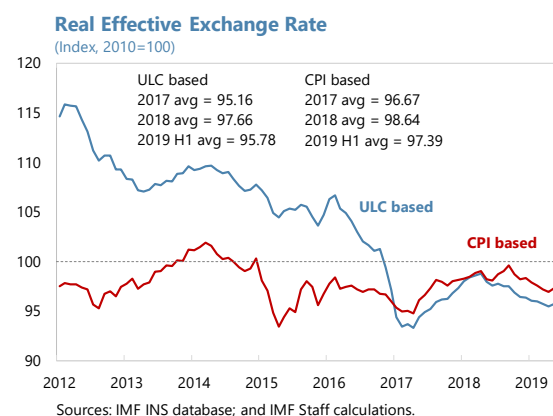


Figure 3. External Developments

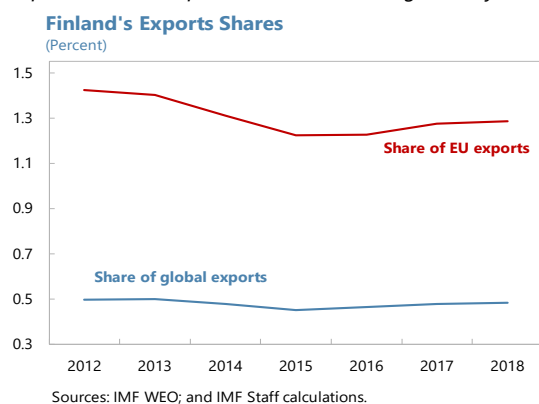
The Competitiveness Pact has helped to lower unit labor costs...



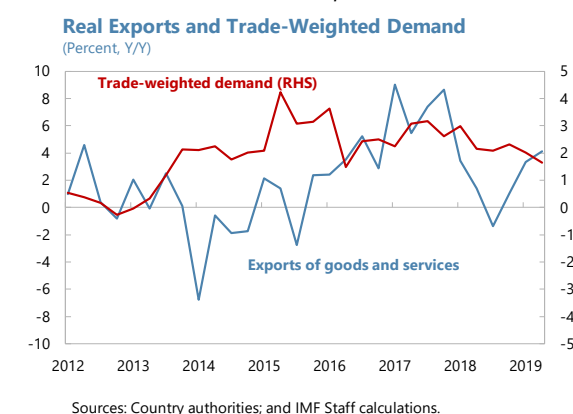
... furthering the decline in real effective exchange rates since 2016.



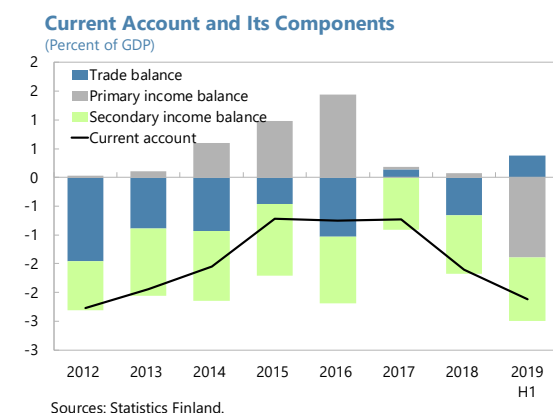
A lower REER and higher investment in recent years has helped Finland's export shares to recover gradually



Exports fell and subsequently recovered even as external demand slowed, but did not collapse as in 2014–15



Nonetheless, the CA relapsed into deficit in H1, as highly volatile net income balances fell in Q2



External debt rebounded towards its average in 2018, after the 2017 drops of portfolio and other liabilities were reversed

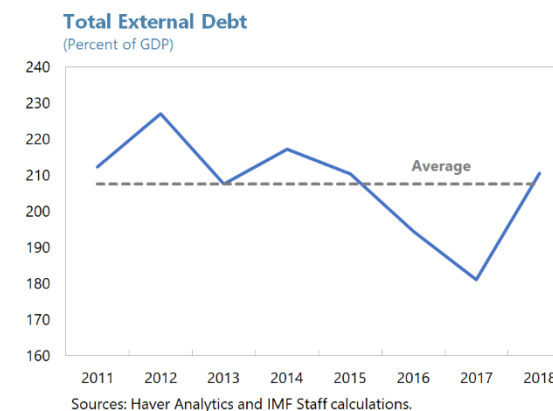
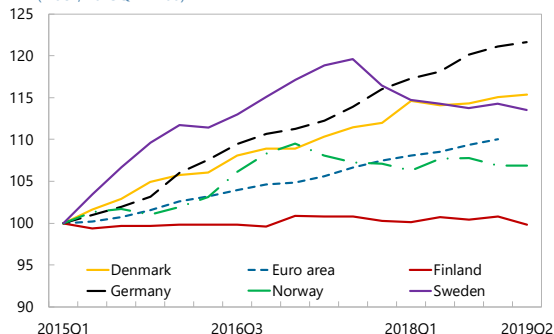


Figure 4. Real Estate Market Developments

House prices in Finland have been nearly flat in real terms across the whole country in contrast to other European countries.

Real House Prices

(Index, 2015Q1 = 100)

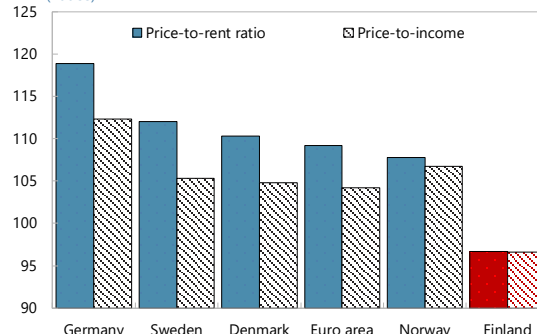


Sources: OECD, IMF Staff calculations.

In turn, price-to-rent and price-to-income ratios are relatively low.

Price-to-rent and Price-to-income, 2018

(Ratios)

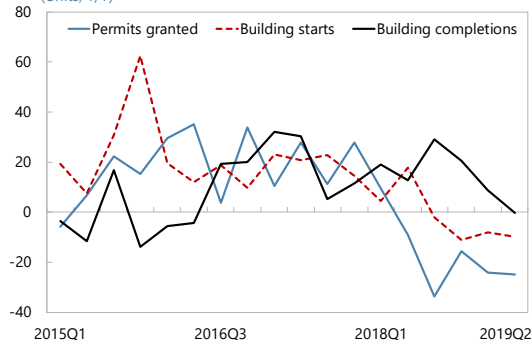


Sources: OECD.

Housing construction has also slowed down.

Housing Construction

(Units, Y/Y)

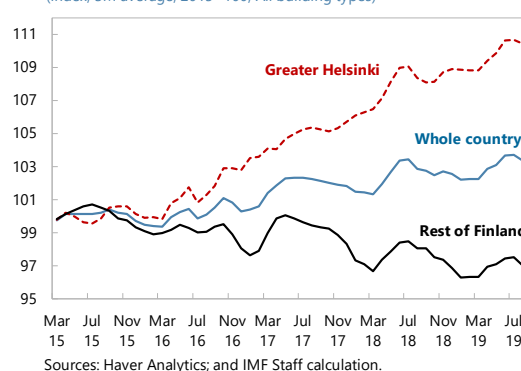


Sources: Haver Analytics; and IMF Staff calculations.

However, prices in metropolitan Helsinki have increased significantly in recent years.

House Prices

(Index, 3M average, 2015=100, All building types)

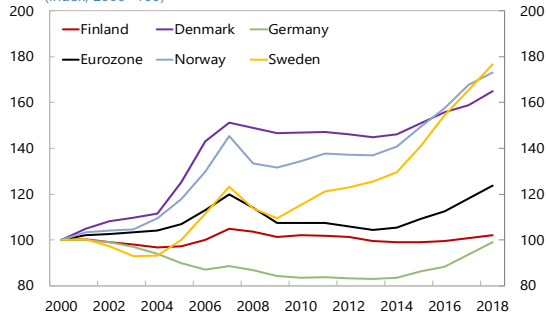


Sources: Haver Analytics; and IMF Staff calculation.

Price increases in the CRE market have likewise been modest...

Commercial Real Estate Capital Growth Index

(Index, 2000=100)

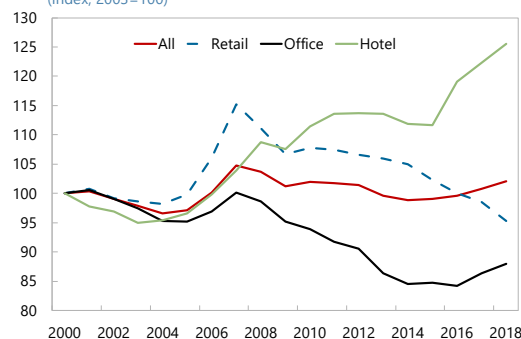


Sources: MSCI; and IMF Staff calculations.

...but there has been significant heterogeneity across market segments.

Capital growth rates across segments in Finland

(Index, 2003=100)



Sources: MSCI; and IMF Staff calculations.

Table 1. Finland: Selected Economic Indicators, 2017–2025

	2017	2018	2019	2020	2021	2022	2023	2024	2025
	Proj.								
	(Percentage change, unless otherwise indicated)								
Output and demand (volumes)									
GDP	3.1	1.7	1.5	1.6	1.5	1.3	1.3	1.3	1.3
Domestic demand	1.5	2.6	1.1	1.7	1.5	1.3	1.4	1.3	1.3
Private consumption	1.0	1.8	1.5	1.4	1.3	1.3	1.3	1.3	1.3
Public consumption	0.2	1.5	1.5	2.1	1.6	1.3	1.2	1.2	1.1
Gross fixed capital formation	4.0	3.3	1.5	1.8	1.7	1.7	1.7	1.7	1.6
Change in stocks (contribution to growth in percent of GDP)	0.1	0.6	-0.4	0.0	0.0	0.0	0.0	0.0	0.0
Exports of goods and services	8.8	2.2	3.9	2.0	2.0	2.0	2.0	2.0	2.0
Imports of goods and services	4.1	5.0	3.2	2.2	2.0	2.0	2.0	2.0	2.0
Net exports (contribution to growth in percent of GDP)	1.6	-1.1	0.5	-0.1	0.0	0.0	0.0	0.0	0.0
Prices, costs, and income									
Consumer price inflation (harmonized, average)	0.8	1.2	1.2	1.5	1.5	1.6	1.6	1.8	1.9
Consumer price inflation (harmonized, end-year)	0.5	1.3	1.3	1.5	1.4	1.6	1.6	1.8	1.9
GDP deflator	0.7	2.1	1.9	2.0	2.0	2.0	1.9	1.9	1.9
Unit labor cost, manufacturing	-8.4	2.9	0.6	0.9	0.3	0.3	0.2	0.1	0.0
Labor market									
Labor force	0.8	1.4	0.1	0.3	0.3	0.3	0.2	0.1	0.0
Employment	1.0	2.7	1.0	0.5	0.4	0.2	0.1	0.1	0.0
Unemployment rate (in percent)	8.6	7.4	6.5	6.4	6.3	6.4	6.5	6.5	6.5
Potential output and NAIRU									
Output gap (in percent of potential output) ¹	-0.7	-0.4	-0.3	-0.2	-0.1	0.0	0.1	0.2	0.1
Growth in potential output	1.4	1.4	1.4	1.4	1.3	1.3	1.3	1.3	1.3
	(Percent of GDP)								
General government finances²									
Overall balance	-0.7	-0.8	-0.8	-1.1	-1.2	-1.2	-0.9	-0.9	-0.9
Primary balance ³	0.3	0.1	0.0	-0.4	-0.6	-0.5	-0.2	-0.2	-0.3
Structural balance (in percent of potential GDP)	-0.6	-0.7	-0.9	-1.3	-1.4	-1.4	-1.1	-1.1	-1.0
Structural primary balance (in percent of potential GDP) ³	0.4	0.2	-0.1	-0.6	-0.8	-0.7	-0.4	-0.4	-0.4
Gross debt	60.8	58.9	58.5	57.9	58.2	58.6	58.8	59.1	59.4
Net debt ⁴	-57.7	-51.5	-49.0	-46.2	-43.4	-40.8	-38.7	-36.6	-34.5
	(Percent)								
Money and interest rates									
M3 (Finnish contribution to euro area, growth rate, e.o.p.)	6.7	6.1	...	...	...	...	...	...	...
Finnish MFI euro area loans (growth rate, e.o.p.)	3.2	4.8	...	...	...	...	...	...	...
Domestic nonfinancial private sector credit growth (e.o.p.)	2.4	2.2	2.9	4.1	4.5	4.4	4.0	3.8	3.7
3-month Euribor rate (percent)	-0.3	-0.3	...	...	...	...	...	...	...
10-year government bonds yield	0.5	0.7	...	...	...	...	...	...	...
	(Percent of GDP)								
National saving and investment									
Gross national saving	23.1	23.5	24.1	24.4	24.6	24.8	25.0	25.2	25.7
Gross domestic investment	23.9	24.9	24.8	25.0	25.1	25.0	24.9	25.0	25.4
Balance of payments									
Current account balance	-0.8	-1.4	-0.7	-0.6	-0.5	-0.1	0.1	0.2	0.3
Goods and services balance	0.1	-0.7	0.0	0.0	0.0	0.1	0.2	0.3	0.3
Net international investment position	0.0	-2.2	-2.8	-3.2	-1.9	-1.9	-1.7	-0.6	0.4
Gross external debt	181.1	210.5	210.6	209.4	207.6	205.5	203.6	201.0	198.7
Exchange rates (period average)									
Euro per US\$	0.89	0.85	...	...	...	...	...	...	...
Nominal effective rate (appreciation in percent)	0.7	3.2	...	...	...	...	...	...	...
Real effective rate (appreciation in percent) ⁵	-0.6	2.0	...	...	...	...	...	...	...
Memorandum items									
Nominal GDP (in Euro billions)	225.8	234.5	...	...	...	...	...	...	...
Nominal GDP (in U.S. dollar billions at market exch. rates)	255.0	277.0	...	...	...	...	...	...	...

Sources: Bank of Finland, BIS, International Financial Statistics, IMF Institute, Ministry of Finance, Statistics Finland, and Fund staff calculations.

¹ A negative value indicates a level of actual GDP that is below potential output.

² Fiscal projections include measures as specified in the General Government Fiscal Plan.

³ Adjusted for interest expenditure.

⁴ Defined as the negative of net financial worth (i.e., debt minus assets).

⁵ CPI-based real effective exchange rate.

Table 2. Finland: Balance of Payments, 2017–2025

	2017	2018	2019	2020	2021	2022	2023	2024	2025
						Proj.			
<i>Billions of euros</i>									
Current account	-1.7	-3.2	-1.6	-1.5	-1.3	-0.4	0.2	0.7	0.9
Goods and services	0.3	-1.7	0.0	0.0	0.0	0.2	0.5	0.8	0.8
Exports of goods and services	85.1	90.4	96.3	100.1	104.0	108.2	112.8	117.6	122.3
Goods	59.5	63.5	66.2	68.8	71.5	74.4	77.5	80.9	84.1
Services	25.6	26.9	30.1	31.3	32.5	33.8	35.2	36.7	38.2
Imports of goods and services	84.8	92.1	96.3	100.1	104.0	108.0	112.3	116.8	121.5
Goods	58.0	62.7	64.5	67.0	69.5	72.2	75.1	78.2	81.3
Services	26.9	29.4	31.8	33.1	34.4	35.7	37.2	38.7	40.2
Income	-2.0	-1.5	-1.7	-1.4	-1.3	-0.6	-0.3	-0.1	0.1
o/w Investment income	-2.0	-1.5	-1.7	-1.4	-1.3	-0.6	-0.3	-0.1	0.1
Capital and financial account	-8.9	-11.2	-1.2	-1.0	-0.8	0.1	0.6	1.2	3.4
Capital account	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	1.3
Financial account	-9.1	-11.4	-1.4	-1.3	-1.1	-0.1	0.4	0.9	2.1
Direct investment ¹	-3.2	11.1	3.9	3.2	3.4	3.3	2.4	1.3	0.4
In Finland	15.6	-9.1	0.7	0.7	0.7	0.7	1.7	2.8	3.7
Abroad	12.4	2.0	4.6	3.9	4.1	4.0	4.1	4.1	4.1
Portfolio investment	-3.8	-21.9	-3.6	-3.6	-4.8	-5.7	-7.2	-7.8	-5.4
Financial derivatives	-4.3	-0.6	-0.3	-0.1	-0.1	0.0	0.0	0.0	0.0
Other investment	2.6	0.1	-1.4	-0.8	0.4	2.2	5.3	7.5	7.2
Assets	11.9	13.2	12.9	12.6	12.3	12.0	11.7	11.5	12.3
Liabilities	9.3	13.1	14.3	13.4	11.9	9.8	6.4	4.0	5.1
Reserve assets	-0.4	-0.1	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Net errors and omissions	-7.6	-8.4	0.0	0.0	0.0	0.0	0.0	0.0	0.0
<i>Percent of GDP</i>									
Current account	-0.8	-1.4	-0.7	-0.6	-0.5	-0.1	0.1	0.2	0.3
Goods and services	0.1	-0.7	0.0	0.0	0.0	0.1	0.2	0.3	0.3
Exports of goods and services	37.7	38.6	39.7	39.8	40.0	40.3	40.7	41.0	41.4
Goods	26.3	27.1	27.3	27.4	27.5	27.7	28.0	28.2	28.4
Services	11.4	11.5	12.4	12.5	12.5	12.6	12.7	12.8	12.9
Imports of goods and services	37.6	39.3	39.7	39.8	40.0	40.2	40.5	40.8	41.1
Goods	25.7	26.7	26.6	26.6	26.7	26.9	27.1	27.3	27.5
Services	11.9	12.6	13.1	13.2	13.2	13.3	13.4	13.5	13.6
Income	-0.9	-0.6	-0.7	-0.6	-0.5	-0.2	-0.1	0.0	0.0
Capital and financial account	-4.0	-4.8	-0.5	-0.4	-0.3	0.0	0.2	0.4	1.1
Capital account	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.4
Financial account	-4.0	-4.9	-0.6	-0.5	-0.4	-0.1	0.1	0.3	0.7
Direct investment ¹	-1.4	4.7	1.6	1.3	1.3	1.2	0.9	0.4	0.1
Portfolio investment	-1.7	-9.3	-1.5	-1.4	-1.8	-2.1	-2.6	-2.7	-1.8
Financial derivatives	-1.9	-0.3	-0.1	-0.1	0.0	0.0	0.0	0.0	0.0
Other investment	1.1	0.0	-0.6	-0.3	0.2	0.8	1.9	2.6	2.4
Reserve assets	-0.2	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Net errors and omissions	-3.4	-3.6	0.0	0.0	0.0	0.0	0.0	0.0	0.0
GDP at current prices (bln euros)	225.8	234.5	242.5	251.3	260.0	268.7	277.3	286.5	295.7

Sources: Bank of Finland, Statistics Finland, and Fund staff calculations.

¹ Large inward FDI flows in 2014 and 2015 are mainly due to large mergers and acquisitions (M&A) in those years such as Microsoft's purchase of Nokia's handset business (worth 2.6 percent of GDP) and various M&A deals in the energy, manufacturing and shipbuilding sectors worth more than 0.5 percentage points of GDP each.

Table 3. Finland: International Investment Position, 2009–2018

(Percent of GDP)

	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018
Assets	274.8	324.7	369.8	361.3	317.6	344.9	336.6	323.3	275.8	330.2
Direct investment	67.8	74.7	67.7	72.3	66.7	61.5	62.9	66.9	69.0	69.7
Portfolio investment	97.1	114.1	106.3	119.4	123.2	138.1	145.5	145.6	139.5	139.6
Equity & investment fund shares	39.4	52.4	44.3	52.7	58.5	67.6	73.6	76.7	81.8	78.8
Debt securities	57.8	61.8	62.0	66.7	64.7	70.5	71.9	68.9	57.7	60.8
Fin. deriv. (other than reserves)	44.6	57.6	93.2	67.5	41.7	60.3	45.7	41.1	9.1	24.7
Other investment	60.9	74.5	98.5	98.0	82.0	80.7	78.1	65.1	54.3	92.1
Reserve assets	4.4	3.8	4.0	4.2	4.0	4.2	4.3	4.6	3.9	4.0
Liabilities	272.3	309.2	355.9	350.7	314.6	348.0	332.1	318.2	275.8	332.5
Direct investment	50.5	54.4	50.4	51.7	46.6	52.0	57.3	54.5	56.9	47.9
Portfolio investment	106.4	110.3	102.7	119.9	129.2	141.0	146.0	141.5	135.4	169.0
Equity & investment fund shares	39.7	38.7	26.1	31.5	40.3	44.1	48.6	52.1	54.5	63.0
Debt securities	66.6	71.5	76.6	88.4	88.9	97.0	97.4	89.3	80.9	106.1
Fin. deriv. (other than reserves)	43.4	54.9	89.3	63.3	39.3	56.9	44.3	39.6	8.7	26.0
Other investment	72.0	89.7	113.6	115.8	99.6	98.0	84.5	82.7	74.8	89.6
Net International Investment Position	2.6	15.5	13.9	10.6	3.0	-3.1	4.5	5.1	0.0	-2.3
Direct Investment	17.2	20.3	17.3	20.6	20.1	9.4	5.6	12.4	12.1	21.8
Portfolio Investment	-9.2	3.9	3.7	-0.6	-6.0	-3.0	-0.5	4.1	4.1	-29.4
Fin. deriv. (other than reserves)	1.2	2.7	3.9	4.2	2.5	3.4	1.4	1.5	0.4	-1.3
Other Investment	-11.0	-15.1	-15.1	-17.8	-17.5	-17.3	-6.4	-17.6	-20.5	2.6

Sources: Statistics Finland and Fund staff calculations.

Note: Changes to the NIIP since the 2014 Article IV are mainly due to the switch to the BPM6 statistical standard.

Table 4. Finland: General Government Statement of Operations, 2017–2025
(Percent of GDP, unless otherwise indicated)

	2017	2018	2019	2020	2021	2022	2023	2024	2025
	Projections								
Revenue	53.0	52.2	51.8	51.9	51.8	51.8	51.9	52.1	52.1
Tax revenues	30.9	30.3	30.2	30.5	30.5	30.5	30.5	30.7	30.7
Taxes on production and imports	14.0	14.1	13.8	13.9	14.0	14.0	14.0	14.1	14.1
Current taxes on income, wealth, etc.	16.5	15.9	16.1	16.3	16.3	16.3	16.3	16.3	16.3
Capital taxes	0.4	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3
Social contributions	12.1	11.9	11.8	11.9	11.9	11.9	12.0	12.0	12.0
Grants	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2
Other revenue	9.9	9.8	9.7	9.4	9.2	9.2	9.2	9.2	9.2
Expenditure	53.7	53.1	52.7	53.0	53.0	53.0	52.8	52.9	53.0
Expense	53.1	52.2	51.9	52.1	52.2	52.3	52.4	52.5	52.6
Compensation of employees	12.4	12.3	12.2	12.3	12.5	12.4	12.5	12.5	12.5
Use of goods and services	10.8	10.7	10.8	10.9	10.9	11.0	11.0	11.0	11.0
Consumption of fixed capital (CFC)	3.4	3.4	3.4	3.4	3.4	3.4	3.5	3.5	3.5
Interest	1.0	0.9	0.8	0.7	0.7	0.6	0.7	0.7	0.7
Subsidies	1.2	1.2	1.2	1.2	1.1	1.1	1.1	1.1	1.1
Grants	1.3	1.3	1.3	1.2	1.2	1.2	1.2	1.2	1.2
Social benefits	21.7	21.2	21.0	21.1	21.1	21.2	21.2	21.3	21.4
Other expense	1.4	1.4	1.3	1.3	1.4	1.3	1.3	1.3	1.3
Net acquisition of nonfinancial assets	0.6	0.8	0.8	0.9	0.8	0.7	0.5	0.4	0.4
Net acquisition of nonfinancial assets excl. CFC	4.0	4.2	4.2	4.3	4.3	4.1	3.9	3.9	3.9
Consumption of fixed capital (CFC)	-3.4	-3.4	-3.4	-3.4	-3.4	-3.4	-3.5	-3.5	-3.5
Net operating balance	-0.1	0.0	0.0	-0.2	-0.4	-0.5	-0.4	-0.4	-0.5
Net lending/borrowing	-0.7	-0.8	-0.8	-1.1	-1.2	-1.2	-0.9	-0.9	-0.9
Net acquisition of financial assets	4.2	-1.9							
Currency and deposits	1.3	-1.1							
Securities other than shares	-0.4	-0.5							
Loans	-1.1	-1.2							
Shares and other equity	2.5	1.2							
Insurance technical reserves	0.0	0.0							
Financial derivatives	0.0	0.9							
Other accounts receivable	2.0	-1.1							
Net incurrence of liabilities	4.8	-1.1							
Special Drawing Rights (SDRs)	0.0	0.0							
Currency and deposits	0.0	-0.1							
Securities other than shares	1.2	-0.4							
Loans	-0.4	0.6							
Shares and other equity	0.0	0.0							
Insurance technical reserves	0.0	0.0							
Financial derivatives	2.4	0.0							
Other accounts payable	1.7	-1.3							
<i>Memorandum items:</i>									
Primary balance (excl. interest expense)	0.3	0.1	0.0	-0.4	-0.6	-0.5	-0.2	-0.2	-0.3
Structural balance (in percent of potential GDP)	-0.6	-0.7	-0.9	-1.3	-1.4	-1.4	-1.1	-1.1	-1.0
Structural primary balance (in percent of potential GDP) 1/	0.4	0.2	-0.1	-0.6	-0.8	-0.7	-0.4	-0.4	-0.4
Central government net lending/borrowing	-1.8	-1.2	-0.7	-1.0	-0.8	-0.6	-0.4	-0.4	-0.5
General government gross debt	60.8	58.9	58.5	57.9	58.2	58.6	58.8	59.1	59.4
General government net debt 2/	-57.7	-51.5	-49.0	-46.2	-43.4	-40.8	-38.7	-36.6	-34.5
Central government gross debt	51.8	49.4	48.0	46.5	45.7	44.8	44.0	43.2	42.6
Output gap (percent of potential output)	-0.7	-0.4	-0.3	-0.2	-0.1	0.0	0.1	0.2	0.1
Nominal GDP (Euro bill.)	225.8	234.5	242.5	251.3	260.0	268.7	277.3	286.5	295.7

Sources: International Financial Statistics, Government Finance Statistics, Eurostat, Ministry of Finance, and IMF staff estimates.

1/ Adjusted for interest expenditure.

2/ Defined as the negative of net financial worth.

Table 5. Finland: Public Sector Balance Sheet, 2012–2018
(Percent of GDP)

	2012	2013	2014	2015	2016	2017	2018
Assets	269.3	255.1	258.3	277.4	278.2	280.4	268.9
Nonfinancial	88.5	88.6	87.3	84.7	84.8	83.0	81.9
General Government	74.8	75.9	76.7	75.7	75.1	73.3	72.2
Public Corporations and Central Bank	13.7	12.7	10.5	9.0	9.7	9.7	9.7
Financial	180.9	166.4	171.0	192.7	193.5	197.4	187.0
General Government	113.3	117.5	125.3	127.8	128.3	132.4	125.2
Gold and SDRs	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Currency and Deposits	8.2	7.3	6.4	9.0	8.2	9.2	7.7
Debt Securities	21.1	20.9	21.2	21.1	19.6	17.8	16.8
Loans	15.2	15.4	15.3	14.7	13.8	12.2	10.5
Equity and investment fund shares	63.0	69.6	76.3	77.3	82.1	86.1	82.1
Insurance, pension and standardized guarantees	0.0	0.0	0.1	0.1	0.1	0.1	0.1
Financial derivatives and stock options	1.2	1.1	1.1	1.0	0.9	1.1	3.3
Other accounts receivable	4.7	3.3	4.5	4.4	4.0	5.9	4.6
Public Corporations and Central Bank	67.6	48.9	45.8	64.9	65.2	65.0	61.8
							136.2
Liabilities	137.8	118.7	119.8	138.2	140.1	138.1	132.8
General Government	63.8	64.5	71.4	73.9	74.8	73.8	72.5
SDRs	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Currency and Deposits	0.3	0.3	0.4	0.4	0.4	0.4	0.3
Debt Securities	46.3	46.2	52.5	53.9	54.1	51.3	49.4
Loans	12.1	12.6	13.4	14.4	14.2	13.3	13.2
Equity and investment fund shares	0.3	0.3	0.3	0.2	0.2	0.2	0.2
Insurance pension and standardized guarantee scheme	0.0	0.0	0.0	0.1	0.1	0.1	0.1
Financial Derivatives	-0.8	0.1	-0.5	-0.9	-0.3	0.3	2.7
Other accounts payable	5.6	5.6	5.4	6.2	6.7	8.2	6.5
Public Corporations and Central Bank	74.0	54.2	48.4	64.3	65.3	64.3	60.3
Existing pension liabilities 1/	283.1	288.5	304.6	302.6	300.6	297.8	298.0
To public sector employees	96.4	97.7	105.1	103.9	103.2	102.2	100.4
To private employees	186.7	190.8	199.5	198.8	197.4	195.6	197.7
Public Sector Net Financial Worth							
Excluding pension liabilities	43.0	47.7	51.2	54.5	53.3	59.4	54.3
Including existing pension liabilities to public employees	-53.3	-50.0	-53.9	-49.4	-49.8	-42.9	-46.1
Including existing pension liabilities to all employees	-240.0	-240.7	-253.4	-248.1	-247.3	-238.4	-243.8
Public Sector Net Worth							
Excluding pension liabilities	131.5	136.4	138.5	139.2	138.1	142.3	136.2
Including existing pension liabilities to public employees	35.1	38.7	33.4	35.3	35.0	40.1	35.8
Including existing pension liabilities to all employees	-151.6	-152.1	-166.1	-163.4	-162.5	-155.5	-161.9

Sources: Finnish Centre for Pensions; Statistics Finland; Eurostat; Brede and Henn (2018); and IMF staff calculations.

Note: Public sector corporations include the largest 9 enterprises controlled by the Central Government. These account for over 90 percent of assets of Central Government controlled corporations. However, local government controlled corporations are

1/ This is the net present value of already-accrued liabilities for work performed in the past, based on data (and discount rates) of the Finnish Centre for Pensions (ETK), except for 2016, which are Fund Staff estimates. These pension liabilities represent a contractual obligation to public sector employees. For private sector employees, rules governing the pension system could potentially be altered to change the present value of payouts.

Table 6. Finland: Financial Soundness Indicators, 2014–2018

(Ratios, unless otherwise indicated)

	2014	2015	2016	2017	2018
Capital Adequacy					
Regulatory Capital to Risk-Weighted Assets	17.3	22.9	23.3	21.4	21.5
Regulatory Tier 1 Capital to Risk-Weighted Assets	16.4	21.5	21.9	19.6	19.7
Total Capital to Total Assets	4.3	5.6	6.5	9.0	9.3
Asset quality and exposure					
Non-performing Loans to Total Gross Loans 1/	1.3	1.3	1.5	1.7	1.5
Non-performing Loans Net of Provisions to Capital 1/	11.2	9.9	9.5	10.7	8.5
Earnings and profitability					
Return on Assets	0.5	0.6	0.6	0.5	0.7
Return on Equity	11.3	11.5	10.6	7.5	7.7
Non-interest Expenses to Gross Income, percent	60.5	58.3	58.4	55.0	61.6
Personnel Expenses as Percent of Noninterest Expenses	35.7	38.0	37.6	36.9	30.8
Liquidity					
Liquid Assets to Total Assets (Liquid Asset Ratio)	14.3	16.7	19.0	20.9	15.1
Liquid Assets to Short Term Liabilities	18.9	22.4	25.1	20.9	28.9
Customer Deposits as Percent of Total (non-interbank) Loans	77.4	80.2	89.4	82.3	75.5
Memorandum items					
Change in Housing Price Index (in percent, year average)	-0.4	0.0	0.4	1.6	0.9
Total Household Debt (in percent of GDP)	61.5	62.3	63.6	63.6	63.9
Total Household Debt (in percent of disposable income)	125.8	129.6	135.1	137.9	138.1
Household Interest Expenses (in percent of disposable income)	2.0	1.9	1.7	1.6	1.6
Gross Debt of Non-financial Corporations (in percent of GDP)	133.5	139.6	129.7	135.7	126.9

Sources: Bank of Finland, ECB, FIN-FSA, Financial Soundness Indicators, and OECD.

1/ Break in series in 2017

Annex I. Risk Assessment Matrix¹

(Potential Deviations from Baseline)

Source of Risks and Relative Likelihood	Expected Impact if Risk is Realized
Downside Risks	
High Rising protectionism and retreat from multilateralism. Escalating and unpredictable trade actions and a WTO trade dispute imperil the global trade system.	Medium/High Escalating trade tensions would not only undermine Finnish exports, but could hit the economy via lower investment, employment and thereby overall output growth. Disruptions to global value chains could disrupt the production and supply of goods and harm productivity. Policy response: Allow automatic stabilizers to operate; continue to pursue measures to increase productivity.
High Sharp rise in risk premia. An abrupt deterioration in market sentiment could trigger risk-off events. Higher risk premia cause higher debt service and refinancing risks, particularly on leveraged households, firms and vulnerable sovereigns, ultimately depressing growth.	Medium Adjustments to higher risk premia would increase financing costs for corporates and ultimately households, reducing the availability of credit. High corporate savings and Finland's high sovereign credit rating may help to buffer the impact on the broader economy somewhat. Notwithstanding Finnish banks' strong capital buffers, if the shock were large and protracted, it could disrupt their operations, given their reliance on wholesale funding. Policy response: Take preemptive prudential measures to reduce financial sector vulnerabilities, monitor risks at individual institutions. If market stresses materialize, the central bank should supply liquidity promptly.
High Further build-up of financial vulnerabilities. Although the turn in the monetary policy cycle towards easing provides a reprieve for risky assets, it also encourages risk taking and the underpricing of risk.	Medium A further build-up of financial vulnerabilities would prove ultimately disruptive, by limiting the availability of credit, tighten financial conditions, undermining domestic demand and investment, in particular. Policy response: Take preemptive prudential measures as necessary, monitor risks at individual institutions. If significant market stresses materialize, the central bank should supply liquidity promptly.
Medium/High Weaker-than-expected global growth. Weak growth in key advanced economies including Europe High and US Medium , China High , could lead to a synchronized and potentially prolonged growth slowdown	Medium/High Weaker external growth would undermine Finnish exports, dent investment and ultimately output and employment. A prolonged global downturn would gradually spillover onto domestic demand, leading to a more pronounced domestic downturn in Finland. Policy response: Allow automatic stabilizers to operate as a first line of defense, implement counter-cyclical fiscal measures if needed.
High Intensification of geopolitical tensions and security risks (e.g. in the Middle East) causing socio-economic and political disruption, disorderly migration and volatile commodity prices.	Medium/Low Elevated geopolitical tensions could elevate uncertainty, inflate energy prices and lead to frictions on trade activity. Policy response: Allow automatic stabilizers to operate.

¹ The Risk Assessment Matrix (RAM) shows events that could materially alter the baseline path (the scenario most likely to materialize in the view of IMF staff). The relative likelihood of risks listed is the staff's subjective assessment of the risks surrounding the baseline ("low" is meant to indicate a probability below 10 percent, "medium" a probability between 10 and 30 percent, and "high" a probability of 30 percent or more). The RAM reflects staff views on the source of risks and overall level of concern as of the time of discussions with the authorities. Non-mutually exclusive risks may interact and materialize jointly.

Source of Risks and Relative Likelihood	Expected Impact if Risk is Realized
<p>Medium</p> <p>Adverse shock in a neighboring Nordic country, leading to a correction in the housing market and/or CRE markets, and distress in the financial sector.</p>	<p>Medium</p> <p>Lower demand of key trading partners would reduce domestic output and employment. Finnish financial sector would see declining asset quality and funding difficulties.</p> <p>Policy response: Full implementation of macroprudential policy tools, including liquidity measures. Allow automatic stabilizers to operate.</p>
<p>Low/ Medium</p> <p>Weaker-than-anticipated employment growth.</p>	<p>Medium/High</p> <p>Recent employment gains could prove to be cyclical rather than permanent. Reversing labor market reforms would lower employment growth, and hence potential output growth and fiscal balances.</p> <p>Policy response: Continue to seek opportunities to remove distortions that discourage participation and employment.</p>
<p>Low/ Medium</p> <p>Fiscal slippage, leading to increasing public debt.</p>	<p>Medium/High</p> <p>One-off spending commitments highlighted in the budget could become permanent, and labor market reforms could be reversed (above)</p> <p>Policy response: Maintain commitment that one-off spending is contingent on labor market measures. Prepare offsetting fiscal measures to meet the government's Medium-Term fiscal Objective.</p>

Annex II. Past Fund Staff Recommendations and Implementation

Past Staff Recommendations	Implementation
Fiscal Policy	
A moderate fiscal tightening is needed to build fiscal buffers, given looming spending pressures from age-related costs, a relatively high level of contingent liabilities, and the typical volatility of the Finnish economy.	The structural balance in 2019 shows a mild expansion from stronger-than-expected local government spending. The 2020 Budget and medium-fiscal plan features a short-term fiscal expansion, delaying previous fiscal consolidation plans.
Unexpected savings should be allocated to either reduce the debt or to growth-enhancing expenditures, such as on infrastructure that might aid labor mobility (e.g. transportation) and measures to partially reverse recent cuts in R&D spending.	Larger deficits will be driven by higher spending on employment and business services, education, early childhood care and transfers to families, pensions for low-income individuals, and public investment. Revenues will be increased from higher excises on energy and phasing out of mortgage interest deductibility.
Ensure that health and social services reforms (SOTE) moves forward and generates the ambitious targeted revenue savings and productivity gains. Clear and timely communication about the key elements of the new system and potential implementation hurdles should be maintained with stakeholders.	The previous government resigned ahead of the Parliamentary elections in the Spring following lack of progress on the SOTE reform. The previous government's reform is now on hold and no new measures have yet been announced.
Labor Market Policy (see also Annex VI)	
The Competitiveness Pact and other targeted measures, including provisions to improve incentives to re-enter the labor market and increasing the flexibility of firm-level wage bargaining, should be implemented in full.	The Competitiveness Pact expires in 2020. Public sector pay was reduced; part of the liability for social security contributions was shifted from employers to employees; annual working time was extended by 24 hours without additional compensation.
Strengthen ALMPs further to facilitate labor mobility, as job-to-job transition remains comparatively modest.	<p>Funding for active labor market policies was augmented to increase the frequency of interviews with unemployment insurance recipients and step-up job-matching efforts. Incentives to work were increased by reducing the growth of benefits. The maximum duration of benefits was cut for those under 58 years of age, and conditionality was increased (e.g. at least 12 job applications every 3 months). However, the activation model, which increased conditionality for both basic unemployment benefits and income-related schemes, will be revoked in 2020. Unemployment insurance contribution rates were reduced in 2018. Taxes were reduced on labor income. Unemployed persons can now retain a part of their unemployment benefits when taking up a long-distance job (so called "mobility support").</p> <p>The 2017 pension reform increases the retirement age from 63 to 65 over the next decade. Measures were implemented to address the inactivity trap: childcare fees were reduced for low- and middle-income families, vocational educational programs were broadened with a focus on life-long learning, duration of unemployment benefits was shortened, conditions for granting</p>

Past Staff Recommendations	Implementation
	unemployment benefits were tightened, a tapering scheme for unemployment benefits was introduced to incentivize job search efforts.
Product Market Policy	
Reforms to the retail and state-dominated sectors, such as rail and postal services, should be furthered to increase competition and yield productivity gains.	<p>The Postal Act and Decree was amended in 2017 to diminish regulatory obstacles and boost job creation. The Land Use and Building Act and building regulations have been modernized in May 2017, relaxing size restrictions for large stores and allowing stores to develop their concepts more freely without limitations on their location. The revised provisions of the Alcohol Act entered into force from 2018, modernizing the rules and reforming the outdated, cumbersome and unnecessary regulation.</p> <p>In August 2018, the authorities announced that railways will also be liberalized, and work is starting to this effect. Finally, the authorities are considering to further privatize other public corporations.</p>
Financial Sector and Macprudential Policies	
The current cap on mortgage loans relative to collateral could usefully be replaced with a cap relative to the value of the property, as is common in other countries	The authorities agree that this measure would be desirable, but do not think that implementation would be feasible over the medium term.
It would be useful for the authorities to have debt-based macroprudential tools (such as debt-to-income or debt-service-to-income caps) at their disposal should leverage become more stretched.	The authorities are planning to implement a debt-to-income cap and have already worked on the calibration.
Staff supports the establishment of a "positive credit register"—i.e. a database that credit firms and the FIN-FSA could use to obtain real-time information about customers' debt and income levels.	Efforts to establish a credit register are well underway, but technical, administrative and legal obstacles imply that completion will take several years.
Additional consumer protection measures are needed and require more data collection, especially on consumer lending provided through digital platforms. Tighter prudential requirements to demonstrate creditworthiness could also be considered.	The planned debt-to-income cap will be comprehensive and cover all types of household debt including consumer loans. The authorities are making efforts to improve collection of data on non-traditional forms of consumer lending.

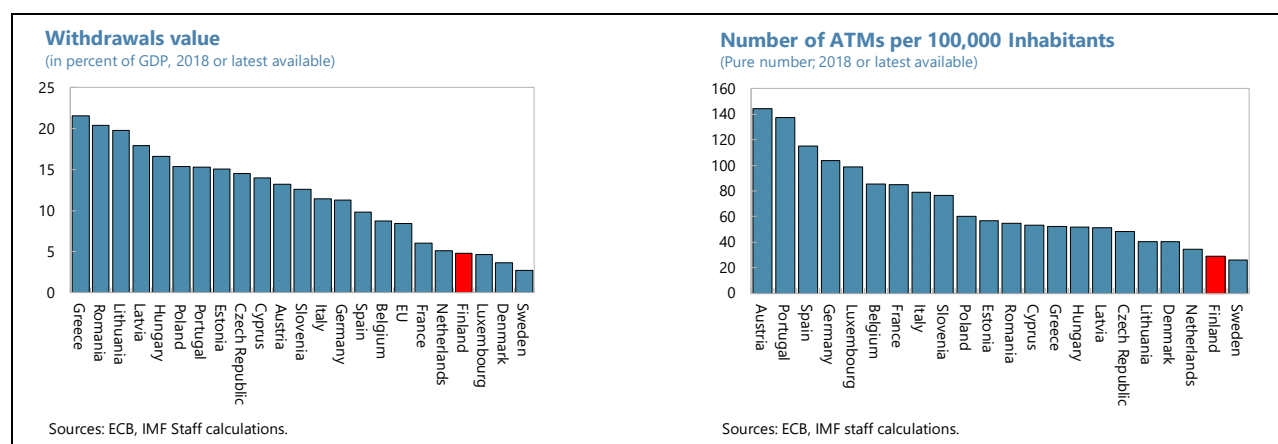
Finland		Overall Assessment: <i>The external position of Finland in 2018 was assessed to be moderately weaker than medium-term fundamentals and desirable policies would suggest. Unit labor costs declined appreciably in 2016-2018, have been growing moderately since; export market shares have also shown some signs of improvement. Nonetheless, the trade balance remains volatile, deteriorated in 2018 and was augmented by persistent negative net income balances.</i> Potential policy responses: Wage restraint has resulted in some gains to competitiveness and a slight decline of the REER since 2016, particularly on a ULC-basis. However, with the Competitiveness Pact coming to an end in 2020, it will be important to boost wage flexibility at the firm level, to enhance the economy's ability to adjust to shocks. Structural reforms should continue to focus on increasing productivity. It is especially important that medium-term fiscal restraint supports the strengthening of the external balance.
Foreign asset and liability position and trajectory	<p>Background. Finland's net international investment position (NIIP) was slightly negative at -2.2 percent of GDP as of end-2018, from zero percent in 2017. This decline was driven by a marked increase in portfolio investment liabilities (and, to a lesser degree, increased financial derivatives liabilities). Both gross assets and liabilities have declined from their peak in 2011, and now stand at 330.2 and 332.5 percent, respectively. The financial sector accounts for just over half of both external assets and liabilities, while the remainder is largely held by nonfinancial corporations and government social security funds.</p> <p>Assessment. The NIIP is expected to be positive over the medium term, consistent with the gradual improvement in current account balances and net incomes. Vulnerabilities mainly stem from the large cross-border exposures of the financial sector, including liquidity risk related to foreign-financed wholesale funding. External debt temporarily declined in 2017, due to shifts of portfolio and other debt liabilities related to the relocation of a large financial institution. These liabilities subsequently rebounded in 2018, reflecting the reorganization of the international operations of the same institution. As a result, external debt returned to 210 percent of GDP, slightly below its prior 6-year average.</p> <p>NIIP -2.3 Gross Assets 330.2 Reserve Assets 4.0 Gross Liabilities. 332.5</p>	
Current account	<p>Background. Finland's current account balance switched into deficit in 2011 amid the sharp decline of exports and particularly the wood and paper and electronics industries (Nokia). The deficit has averaged around 11/4] percent of GDP during the past five years. Exports recovered across different sectors in 2017 and into early 2018, reflecting brisk external growth. The current account balance is expected to remain negative in 2019 and improve thereafter to a small surplus over the medium term, reflecting the decline of unit labor costs since 2016. This fall in ULCs resulted in a marked improvement in cost competitiveness and was corroborated by more recent evidence of gains in export market shares. External demand conditions have worsened, but remain broadly supportive.</p> <p>Assessment. The EBA current account model estimates a gap of -2.3 percent of GDP in 2018, resulting from a cyclically-adjusted current account balance of -1.6 percent of GDP and an EBA current account norm of 0.7 percent of GDP. Taking into account the normal uncertainties around the estimates, staff assess the CA gap to be between -1 and -3 ½ percent.^{1/} The estimated contribution of policies to the gap is very small, and almost entirely explained by looser-than-optimal fiscal policy. The same model estimates a largely unchanged norm for 2019; when applied to projected current account balances for 2019, the gap would be -1 ½ percent of GDP. These estimates of current account gaps are consistent with real exchange rate overvaluation in the range of 5 to 10 percent.</p> <p>Actual CA -1.4 Cycl. Adj. CA -1.6 EBA CA Norm 0.7 EBA CA Gap -2.3 REER gap 7.2</p>	
Real exchange rate	<p>Background. On the whole, REER measures declined since 2015. The cost competitiveness gap vis-à-vis the euro area is being closed on the back of wage restraint and a recovery in output. After depreciating sharply in 2017 (6 percent), the ULC-based REER briefly strengthened by 1 percent in 2018, only to depreciate again by 2 percent in the first half of 2019. The CPI-based REER appreciated by about 2 percent in 2018, but subsequently depreciated by 1.3 percent in the first half of 2019.</p> <p>Assessment. The EBA level and index REER models suggest that the REER was overvalued by around 8.3 and 8.4 percent in 2018, respectively. The EBA external sustainability model suggests a REER undervaluation of 4 percent. Staff assess the REER to be between 5 and 10 percent above the level consistent with fundamentals, reflecting a cost-competitiveness gap, which is expected to be closed gradually in the medium-term.</p>	
Capital and financial accounts: flows and policy measures	<p>Background. Net total financial inflows were broadly unchanged at 4.8 percent of GDP in 2018, mostly reflecting developments in the Financial account. Portfolio inflows into equities and fixed income instruments rose to 9 percent of GDP in 2018, partly offset by outflows of direct investment of about 4.7 percent of GDP.</p> <p>Assessment. Finland has a fully open capital account. It remains exposed to financial market risks against the background of interconnected regional financial markets.</p>	
FX intervention and reserves level	<p>Background. The euro has the status of global reserve currency.</p> <p>Assessment. Reserves held by Euro area countries are typically low relative to standard metrics. The currency is freely floating.</p>	
Technical Background Notes	^{1/} A standard deviation of 1.2 percent of GDP around the cyclically-adjusted current account norm is applied to obtain the current account gap range.	

Annex IV. The Transformation of Finland's Payment Market

Finland is undergoing a swift transformation of its payment market, similarly to its Nordic peers. Available evidence suggests that cash usage has sharply declined, and that digital means of payments have quickly proliferated. The Finnish case offers interesting insights and raises important policy questions for most other countries of the euro area where cash remains much more important.

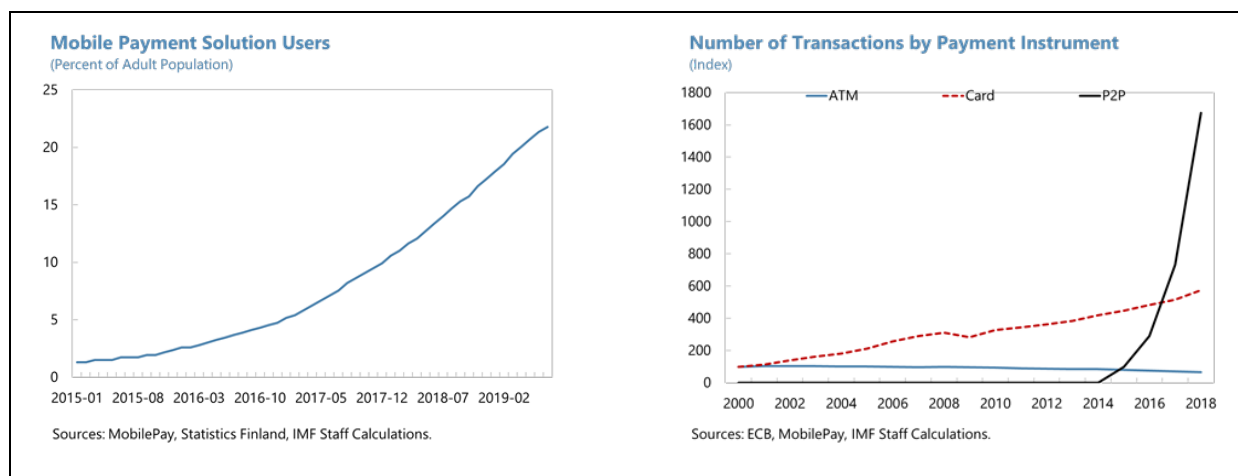
1. Finland is undergoing a swift transformation of its payment market. Broadly, this implies that the use of cash to make payments is decreasing, while electronic means of payments are rapidly gaining importance. The digitalization in payments mirrors the transformation of the Finnish banking industry towards a more digitalized business model more broadly which is more advanced than in other European countries.

2. Data on ATM withdrawals suggest that cash usage is very low in Finland.¹ Cash withdrawals measured relative to GDP have fallen significantly over the last two decades and have now reached levels that are lower than in most international peers. This is mirrored by the thinning of the ATM network in Finland, where the number of ATMs is also very low relative to the size of the population.



3. Mobile retail payment solutions are quickly gaining market share. Mobile payment systems enable easy and fast person-to-person transfers, and they are increasingly adopted in Nordic countries. While Finland is somewhat trailing regional peers, it is likely to be one of the leading countries in the euro area in terms of mobile payment usage. More than 20 percent of the adults and adolescents have already signed up for MobilePay, one of the leading mobile payment providers, over a span of less than 5 years.

¹ ATM cash withdrawals imperfectly reflect cash usage. However, other indicators such as cash in circulation is only available for the Euro area as a whole and not for individual euro area countries.



4. The growth in the number of person-to-person (P2P) mobile transactions is unparalleled in the Finnish payments market. While the number is still small relative to card payments, the number of transactions of MobilePay has grown significantly and at much faster rates than the number of card payments since early 2015. In recent years, the nominal annual increase in MobilePay transactions is negatively correlated with the decrease in the number of ATM withdrawals.

5. The Finnish experience can provide useful lessons for the euro area and merits closer scrutiny. Many Euro area countries have been slow in adopting new and digital means of payments. The Finnish experience could provide lessons about what drives the wide adoption of innovations in the payments market which in turn can provide insights about what it takes to reach a [key objective](#) of the European commission, namely to establish a pan-European instant retail payment solution.

6. The Finnish payments market is safe and efficient. Important recent innovations in the payments markets in Finland make use of existing payment and settlement systems so that they do not raise financial stability or consumer protection concerns contrary to other [digital forms of money](#) such as stablecoins which are quickly proliferating globally and which can erode deposits of traditional banks or give rise to new monopolies. Given the efficiency and level of digitalization of the payments market in Finland, the attractiveness of new types of digital money for consumers is likely to be lower compared to other countries.

7. A decline in cash usage nevertheless raises an important macroeconomic policy question about the desirability of a universal and publicly backed payment instrument. Given network externalities, continued decline in the usage of cash may eventually lead to a point where cash is no longer a useful payment instrument, although this is unlikely to happen in the near future. Nevertheless, in such a scenario, the public would essentially not have access to a publicly guaranteed or issued means of payments that is always available. This could have adverse effects on those parts of the population that still rely on cash, including potentially elderly people, or small businesses that find it too costly or difficult to accept other means of payments, which the authorities are well aware of. Among other measures, they are therefore closely monitoring access and usability of digital banking services.

Annex V. Debt Sustainability Analysis

After four years of decline, the public debt-to-GDP ratio is projected to start increasing again as the government implements a modest fiscal stimulus amid slower growth. In the baseline scenario, debt approaches 60 percent of GDP in the medium term. A contingent liability shock is the stress scenario with the greatest impact on the public debt-to-GDP ratio. Under the assumptions of this scenario, the debt ratio would reach close to 90 percent of percent of GDP by 2024.

Baseline Scenario

- 1. Macroeconomic assumptions.** The economy is slowing with GDP growth expected to reach 1.5 percent in 2019, pick up to 1.6 percent in 2020, before gradually reverting to potential growth—estimated at 1¼ percent—over the medium term. Inflation as measured by the GDP deflator is projected to be broadly constant around 2 percent. Following the decision by the European Central Bank to lower its policy rate, interest rates will remain subdued in the near term and increase gradually as monetary policy begins to normalize.
- 2. Finland’s debt level approaches 60 percent of GDP under the baseline scenario, which calls for using the higher scrutiny framework.** After four years of decline, the public debt-to-GDP ratio is projected to increase again starting in 2021 as the government implements a modest fiscal stimulus amid slower growth. Debt is expected to reach close to 60 percent of GDP by 2024 and continue to grow thereafter. Given the relatively long average maturity of Finnish public debt (6.4 years), the gross financing needs remain below 10 percent of GDP in the baseline scenario. It is also notable that social security funds, a part of general government, are accumulating assets. Nevertheless, net financial worth is estimated to be negative when pension liabilities are taken into account. This highlights the need for reforms to address Finland’s demographic challenges and the long-term growth in age-related expenditure.
- 3. Realism of baseline assumptions.** Median forecast errors for the primary balance over 2010–18 (0.09 percent of GDP, 59th percentile) and inflation (-0.07 percent, 54th percentile) have been moderate. With growth over the last decade especially volatile in Finland, the median forecast error for real GDP growth has been relatively higher at 0.58 percent (79th percentile).
- 4. The forecast fiscal adjustment is not large in either absolute terms or in comparison to other countries’ experiences.** The maximum 3-year change in the cyclically-adjusted primary balance (CAPB) of 0.5 percent of potential output places Finland in the 51th percentile of the distribution of CAPB adjustments cross countries.
- 5. Finland’s debt ratio would reach close to 90 percent of GDP in the medium term in the worst shock scenario examined.** For the standard macro-fiscal stress scenarios, the debt ratio stays below 65 percent of GDP, except in the real GDP and combined macro-fiscal shock scenarios, in which the debt level would reach around 71 percent of GDP. The contingent liability shock scenario causes the largest debt ratio increase, with gross public debt reaching 89 percent of GDP in 2024 on an upward path.

6. The shock scenarios include:

- *Real GDP growth shock:* Under this scenario, growth is one standard deviation lower than the baseline in both 2020 and 2021 (i.e. 3.2 percentage points lower). This also causes inflation to be around 80 basis points lower in these years. In 2021, the debt ratio reaches 70 percent of GDP and stays flat throughout the projection period. The gross financing need peaks at 12.5 percent of GDP in 2020 and 2021.
- *Primary balance shock:* In this scenario, the primary balance is 1.3 percentage points of GDP lower than in the baseline in both 2020 and 2021. This causes the debt path to slightly increase in those years, but the debt ratio remains below 65 percent of GDP throughout the forecast horizon (ending up at 61.8 percent in 2024). Gross financing needs increase somewhat during the years of the shock but converge back to levels closer to the baseline in the medium term.
- *Real interest rate and real exchange rate shocks:* Under the real interest rate shock scenario, the effective interest rate gradually rises from 2021 to exceed the baseline by 1.6 percentage points by 2024. Debt increases by around 2.7 percent of GDP compared to the baseline by 2024 to reach 61.8 percent of GDP. A real exchange rate shock does not have any direct impact on debt sustainability, as most of the debt is issued in euros and all foreign currency issuance is completely hedged by the Finnish State Treasury.
- *Combined macro-fiscal shock:* This scenario is a combination of the effects of the macro-fiscal scenarios above. In this scenario, growth and inflation fall, the primary balance deteriorates, the exchange rate depreciates, and interest rates rise relative to the baseline. The debt ratio reaches 74.6 percent of GDP on an upward path in 2024, while the gross financing need peaks at 12.9 percent of GDP in 2021.
- *Contingent liability shock:* This scenario could emerge in the event of a financial crisis (e.g., as a result of spillovers from a housing market correction in another Nordic country impacting Finland through financial, trade, and confidence channels). In this scenario, the contingent liability shock in 2020 equals about 20 percent of GDP. Additionally, growth falls as in the real GDP shock scenario and the effective interest rate rises by 1.4 percentage point by 2021. As a result, the debt ratio increases by 30 percent points of GDP above the baseline by 2024 to reach 88.7 percent of GDP and gross financing needs peak at 30 percent of GDP in 2020.¹

¹ The scenario assumes a one-time increase in non-interest expenditures equivalent to around 10 percent of banking sector assets, which, given the strong capital position of Finnish banks, is a very large shock. The shock is assumed to trigger a real GDP growth shock (as above), with growth reduced by one standard deviation for two consecutive years, leading also to a decline in inflation. While the revenue-to-GDP ratio remains the same as in the baseline, deterioration in the primary balance lead to higher interest rates.

Finland: Public Sector Debt Sustainability Analysis (DSA)—Baseline Scenario

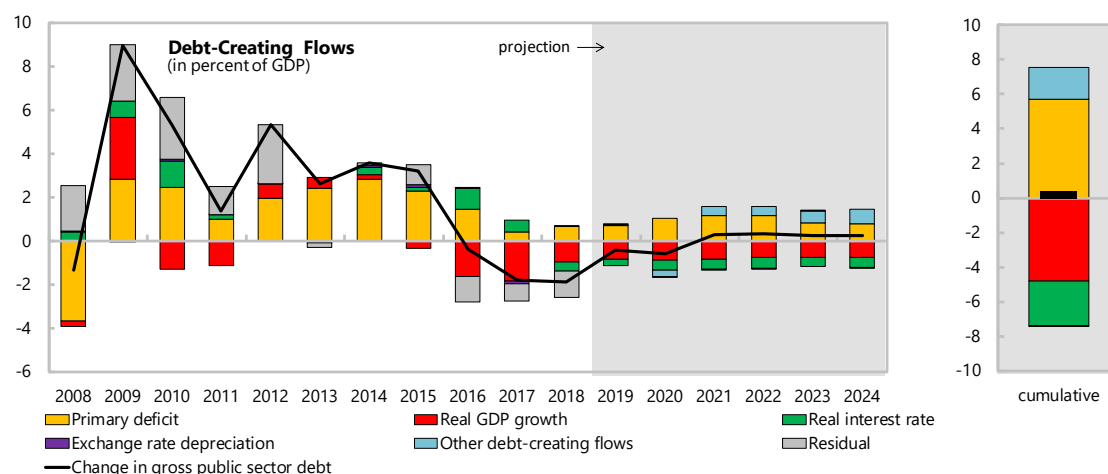
(In percent of GDP unless otherwise indicated)

Debt, Economic and Market Indicators^{1/}

	Actual			Projections							As of September 13, 2019	
	2008-2016 ^{2/}	2017	2018	2019	2020	2021	2022	2023	2024			
Nominal gross public debt	51.6	60.8	58.9	58.5	57.9	58.2	58.6	58.8	59.1	Sovereign Spreads EMBIG (bp) 3/	27	
Public gross financing needs	9.7	8.4	7.6	6.6	10.1	7.0	8.7	8.8	7.1	5Y CDS (bp)	11	
Real GDP growth (in percent)	-0.1	3.1	1.7	1.5	1.6	1.5	1.3	1.3	1.3	Ratings	Foreign	Local
Inflation (GDP deflator, in percent)	1.9	0.7	2.1	1.9	2.0	2.0	2.0	1.9	1.9	Moody's	Aa1	Aa1
Nominal GDP growth (in percent)	1.7	3.8	3.8	3.4	3.6	3.5	3.3	3.2	3.3	S&P's	AA+	AA+
Effective interest rate (in percent) ^{4/}	2.9	1.6	1.5	1.4	1.2	1.2	1.1	1.2	1.2	Fitch	AA+	AA+

Contribution to Changes in Public Debt

	Actual			Projections							cumulative	debt-stabilizing primary balance ^{9/}
	2008-2016	2017	2018	2019	2020	2021	2022	2023	2024			
Change in gross public sector debt	3.2	-1.8	-1.9	-0.4	-0.6	0.3	0.3	0.3	0.2	0.1		
Identified debt-creating flows	1.9	-1.0	-0.7	-0.409	-0.6	0.3	0.3	0.2	0.3	0.1		
Primary deficit	1.5	0.4	0.7	0.7	1.1	1.2	1.2	0.8	0.8	5.7		-0.5
Primary (noninterest) revenue and grants	51.8	52.3	51.5	51.1	51.2	51.2	51.2	51.3	51.5	307.6		
Primary (noninterest) expenditure	53.3	52.7	52.2	51.8	52.3	52.4	52.4	52.2	52.3	313.3		
Automatic debt dynamics ^{5/}	0.4	-1.5	-1.3	-1.141	-1.3	-1.3	-1.2	-1.2	-1.2	-7.4		
Interest rate/growth differential ^{6/}	0.4	-1.3	-1.4	-1.1	-1.3	-1.3	-1.2	-1.2	-1.2	-7.4		
Of which: real interest rate	0.4	0.5	-0.4	-0.3	-0.5	-0.5	-0.5	-0.4	-0.4	-2.6		
Of which: real GDP growth	-0.1	-1.8	-1.0	-0.8	-0.9	-0.8	-0.8	-0.8	-0.8	-4.8		
Exchange rate depreciation ^{7/}	0.0	-0.1	0.1	...	...	...	...	...	...	...
Other identified debt-creating flows	0.0	0.0	0.0	0.0	-0.3	0.4	0.4	0.5	0.7	1.8		
#TSREF! (negative)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0		
Contingent liabilities	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0		
Stock-flow adjustment	0.0	0.0	0.0	0.0	-0.3	0.4	0.4	0.5	0.7	1.8		
Residual, including asset changes ^{8/}	1.3	-0.8	-1.2	0.0	0.0	0.0	0.0	0.0	0.0	0.0		



Source: IMF staff.

1/ Public sector is defined as general government.

2/ Based on available data.

3/ Long-term bond spread over German bonds.

4/ Defined as interest payments divided by debt stock (excluding guarantees) at the end of previous year.

5/ Derived as $[(r - \pi(1+g) - g + ae(1+r))/(1+g+\pi+g\pi)]$ times previous period debt ratio, with r = interest rate; π = growth rate of GDP deflator; g = real GDP growth rate; a = share of foreign-currency denominated debt; and e = nominal exchange rate depreciation (measured by increase in local currency value of U.S. dollar).

6/ The real interest rate contribution is derived from the numerator in footnote 5 as $r - \pi(1+g)$ and the real growth contribution as $-g$.

7/ The exchange rate contribution is derived from the numerator in footnote 5 as $ae(1+r)$.

8/ Includes asset changes and interest revenues (if any). For projections, includes exchange rate changes during the projection period.

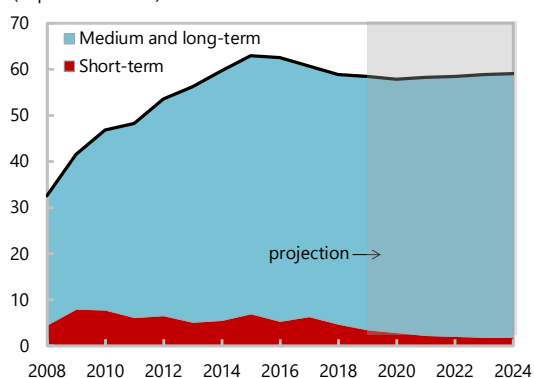
9/ Assumes that key variables (real GDP growth, real interest rate, and other identified debt-creating flows) remain at the level of the last projection year.

Finland: Public DSA—Composition of Public Debt and Alternative Scenarios

Composition of Public Debt

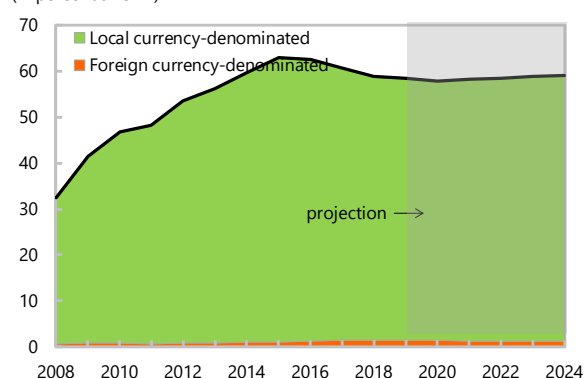
By Maturity

(in percent of GDP)



By Currency

(in percent of GDP)



Alternative Scenarios

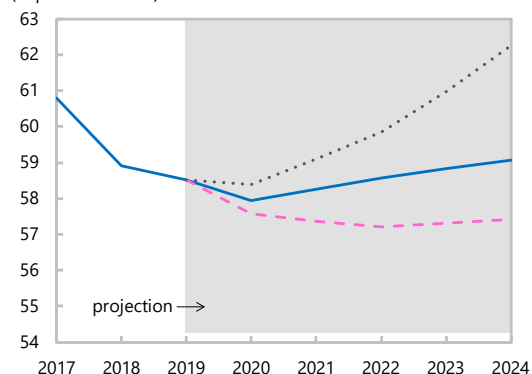
— Baseline

..... Historical

--- Constant Primary Balance

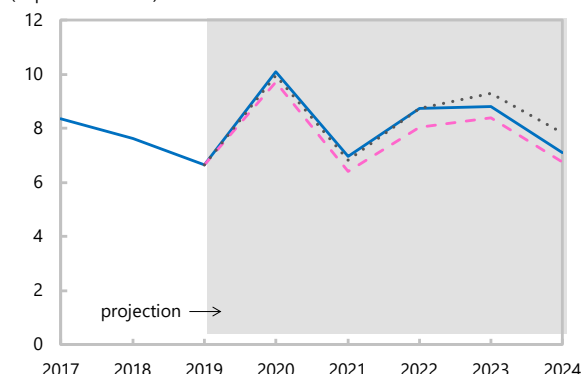
Gross Nominal Public Debt

(in percent of GDP)



Public Gross Financing Needs

(in percent of GDP)



Underlying Assumptions

(in percent)

Baseline Scenario

	2019	2020	2021	2022	2023	2024
Real GDP growth	1.5	1.6	1.5	1.3	1.3	1.3
Inflation	1.9	2.0	2.0	2.0	1.9	1.9
Primary Balance	-0.7	-1.1	-1.2	-1.2	-0.8	-0.8
Effective interest rate	1.4	1.2	1.2	1.1	1.2	1.2

Constant Primary Balance Scenario

	2019	2020	2021	2022	2023	2024
Real GDP growth	1.5	1.6	1.5	1.3	1.3	1.3
Inflation	1.9	2.0	2.0	2.0	1.9	1.9
Primary Balance	-0.7	-0.7	-0.7	-0.7	-0.7	-0.7
Effective interest rate	1.4	1.2	1.2	1.1	1.1	1.2

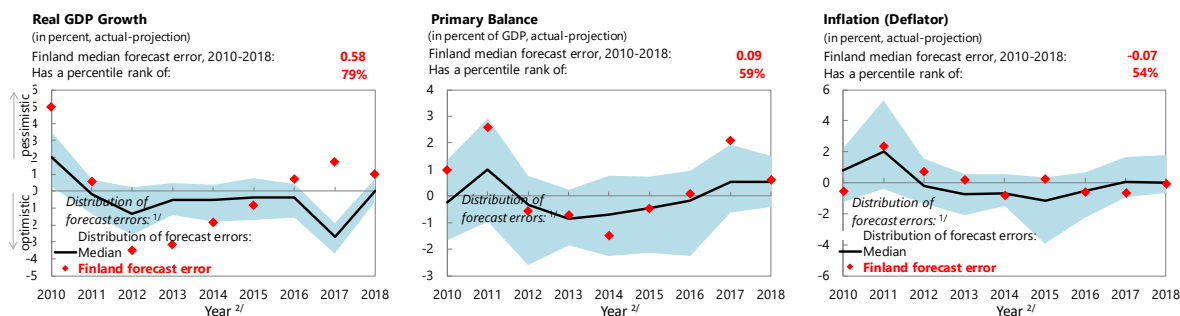
Historical Scenario

	2019	2020	2021	2022	2023	2024
Real GDP growth	1.5	0.3	0.3	0.3	0.3	0.3
Inflation	1.9	2.0	2.0	2.0	1.9	1.9
Primary Balance	-0.7	-0.8	-0.8	-0.8	-0.8	-0.8
Effective interest rate	1.4	1.2	1.4	1.5	1.7	1.9

Source: IMF staff.

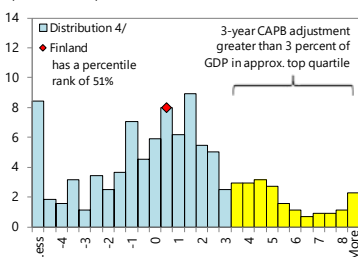
Finland: Public DSA—Realism of Baseline Assumptions

Forecast Track Record, versus surveillance countries

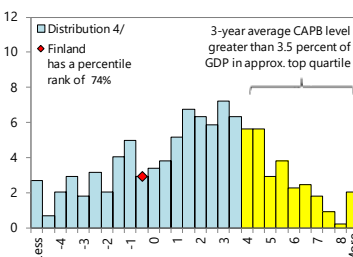


Assessing the Realism of Projected Fiscal Adjustment

3-Year Adjustment in Cyclically-Adjusted Primary Balance (CAPB) (Percent of GDP)



3-Year Average Level of Cyclically-Adjusted Primary Balance (CAPB) (Percent of GDP)



Boom-Bust Analysis^{3/}

Real GDP growth (in percent)



Source: IMF Staff.

1/ Plotted distribution includes surveillance countries, percentile rank refers to all countries.

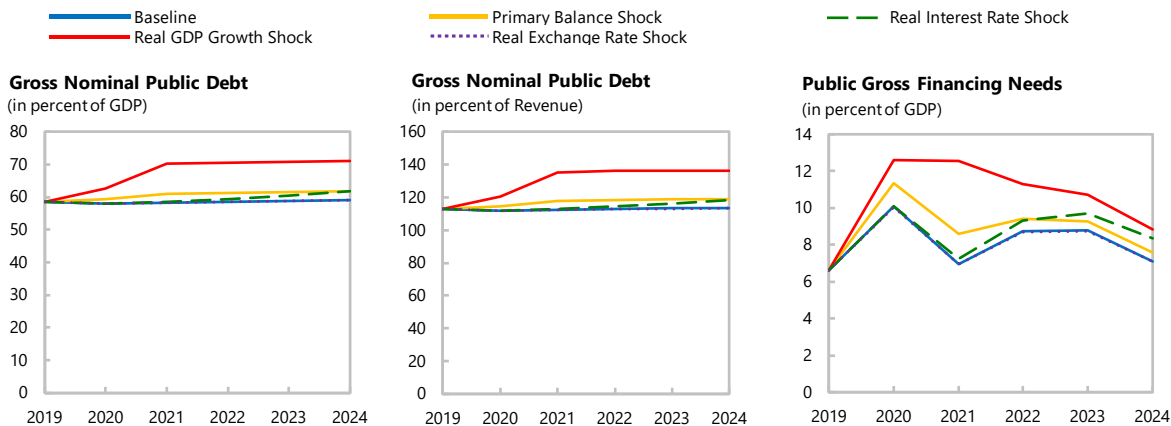
2/ Projections made in the spring WEO vintage of the preceding year.

3/ Not applicable for Finland, as it meets neither the positive output gap criterion nor the private credit growth criterion.

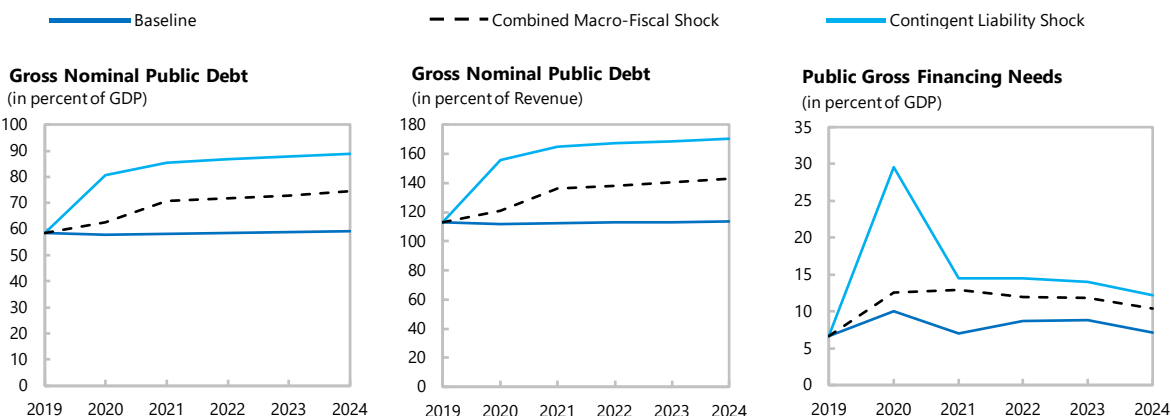
4/ Data cover annual observations from 1990 to 2011 for advanced and emerging economies with debt greater than 60 percent of GDP. Percent of sample on vertical axis.

Finland: Public DSA—Stress Tests

Macro-Fiscal Stress Tests



Additional Stress Tests

Underlying Assumptions
(in percent)

Primary Balance Shock							Real GDP Growth Shock						
	2019	2020	2021	2022	2023	2024		2019	2020	2021	2022	2023	2024
Real GDP growth	1.5	1.6	1.5	1.3	1.3	1.3	Real GDP growth	1.5	-1.7	-1.7	1.3	1.3	1.3
Inflation	1.9	2.0	2.0	2.0	1.9	1.9	Inflation	1.9	1.2	1.2	2.0	1.9	1.9
Primary balance	-0.7	-2.3	-2.4	-1.2	-0.8	-0.8	Primary balance	-0.7	-3.2	-5.5	-1.2	-0.8	-0.8
Effective interest rate	1.4	1.2	1.2	1.2	1.3	1.3	Effective interest rate	1.4	1.2	1.3	1.4	1.4	1.4
Real Interest Rate Shock							Real Exchange Rate Shock						
Real GDP growth	1.5	1.6	1.5	1.3	1.3	1.3	Real GDP growth	1.5	1.6	1.5	1.3	1.3	1.3
Inflation	1.9	2.0	2.0	2.0	1.9	1.9	Inflation	1.9	2.4	2.0	2.0	1.9	1.9
Primary balance	-0.7	-1.1	-1.2	-1.2	-0.8	-0.8	Primary balance	-0.7	-1.1	-1.2	-1.2	-0.8	-0.8
Effective interest rate	1.4	1.2	1.7	2.0	2.5	2.9	Effective interest rate	1.4	1.2	1.2	1.1	1.2	1.2
Combined Shock							Contingent Liability Shock						
Real GDP growth	1.5	-1.7	-1.7	1.3	1.3	1.3	Real GDP growth	1.5	-1.7	-1.7	1.3	1.3	1.3
Inflation	1.9	1.2	1.2	2.0	1.9	1.9	Inflation	1.9	1.2	1.2	2.0	1.9	1.9
Primary balance	-0.7	-3.2	-5.5	-1.2	-0.8	-0.8	Primary balance	-0.7	-20.1	-1.2	-1.2	-0.8	-0.8
Effective interest rate	1.4	1.2	1.8	2.2	2.7	3.1	Effective interest rate	1.4	1.3	2.6	2.5	2.4	2.2

Source: IMF staff.

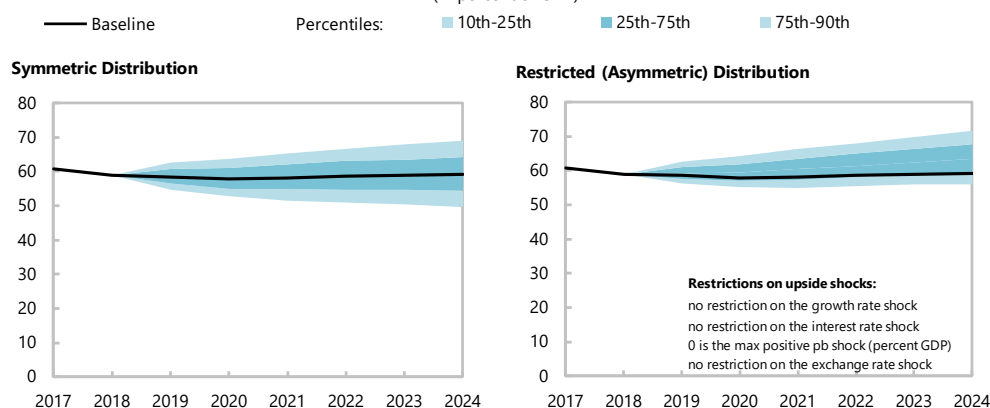
Finland: Public DSDA Risk Assessment

Heat Map

Debt level ^{1/}	Real GDP Growth Shock	Primary Balance Shock	Real Interest Rate Shock	Exchange Rate Shock	Contingent Liability shock
Gross financing needs ^{2/}	Real GDP Growth Shock	Primary Balance Shock	Real Interest Rate Shock	Exchange Rate Shock	Contingent Liability Shock
Debt profile ^{3/}	Market Perception	External Financing Requirements	Change in the Share of Short-Term Debt	Public Debt Held by Non-Residents	Foreign Currency Debt

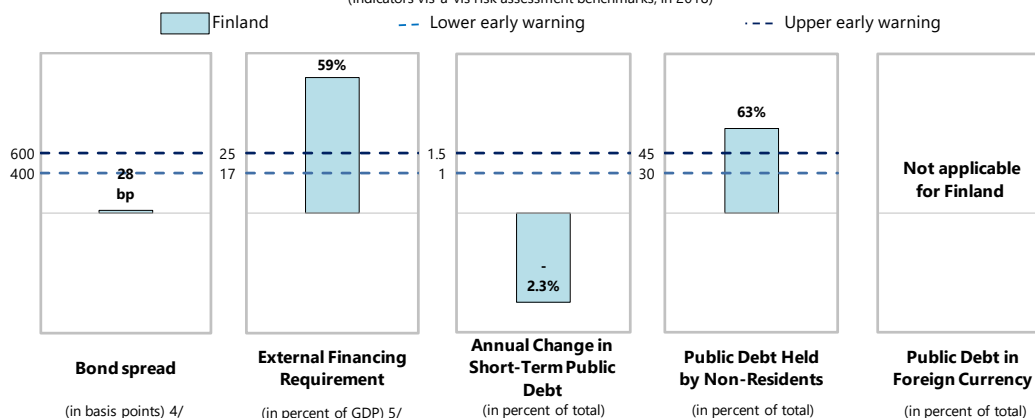
Evolution of Predictive Densities of Gross Nominal Public Debt

(in percent of GDP)



Debt Profile Vulnerabilities

(Indicators vis-à-vis risk assessment benchmarks, in 2018)



Source: IMF staff.

1/ The cell is highlighted in green if debt burden benchmark of 85% is not exceeded under the specific shock or baseline, yellow if exceeded under specific shock but not baseline, red if benchmark is exceeded under baseline, white if stress test is not relevant.

2/ The cell is highlighted in green if gross financing needs benchmark of 20% is not exceeded under the specific shock or baseline, yellow if exceeded under specific shock but not baseline, red if benchmark is exceeded under baseline, white if stress test is not relevant.

3/ The cell is highlighted in green if country value is less than the lower risk-assessment benchmark, red if country value exceeds the upper risk-assessment benchmark, yellow if country value is between the lower and upper risk-assessment benchmarks. If data are unavailable or indicator is not relevant, cell is white.
 Lower and upper risk-assessment benchmarks are:

400 and 600 basis points for bond spreads; 17 and 25 percent of GDP for external financing requirement; 1 and 1.5 percent for change in the share of short-term debt; 30 and 45 percent for the public debt held by non-residents.

4/ Long-term bond spread over German bonds, an average over the last 3 months, 15-Jun-19 through 13-Sep-19.

5/ External financing requirement is defined as the sum of current account deficit, amortization of medium and long-term total external debt, and short-term total external debt at the end of previous period.

Annex VI. Reforms Affecting the Labor Market

Below is a list of recent labor reforms and planned measures:

1. Recent labor market reforms:

- a. The *Competitiveness Pact* introduced in 2016 included a wage freeze for 2017; reduced pay for public sector employees; transfer of part of the liability for social security contributions from employers to employees; and an extension in annual working time of 24 hours without additional compensation.
- b. The *Activation model* introduced in 2017 encourages the unemployed to take up short-term jobs or job training schemes, by introducing mandatory regular interviews for the unemployed and cutting benefits of those who do not show “sufficient” activity.¹
- c. Cutting the maximum duration of unemployment benefits in 2017 and increasing conditionality (e.g. at least 12 job applications every 3 months).
- d. Improving incentives to work by reducing the growth of benefits.
- e. Transferring elderly long-term unemployment benefit receivers to the pension system (de facto assuming they are no longer employable).
- f. Reducing unemployment insurance contribution rates in 2018.
- g. Reducing day care fees and cutting taxes on labor income.
- h. The 2017 pension reform, which increases the retirement age from 63 to 65 over the next decade.
- i. Unemployed persons are able to retain a part of their unemployment benefits when taking up a long-distance job (so called “mobility support”).

2. Planned measures:

- Increased use of job subsidies.
- Increased funding for case workers and development of individualized employment plans to support job seekers.
- Higher funding to promote the integration and employment of immigrants into the labor force.

¹ The Activation model cuts the unemployment benefits by one day per month for individuals who fail to demonstrate sufficient activity. Activity requirements in the first two months of unemployment are one of: working a minimum of 18 hours; participating in a training program for a minimum of five days; or earning a minimum of 241 euros in entrepreneurial income.

- Increased funding for the work-ability program for people with partial work ability.
- The age threshold for extended unemployment benefits will be raised to 62 years. (the “unemployment tunnel”).
- The unemployment insurance contribution will be cut further in 2020 and unemployment benefits will be increased.
- Labor taxes will be reduced for low-income workers.

3. Measures likely to be discontinued:

- The Competitiveness Pact (item (a) above) is set to expire in 2020.
- The government has stated that it will eliminate the Activation model (item (b) above), putting more emphasis on job-seeker support and job subsidies.