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Foreword

This Survey is published on the responsibility of the Economic and Development Review Committee of the OECD, which is charged with the examination of the economic situation of member countries.

The economic situation and policies of France were reviewed by the Committee on 19 March 2024. The draft report was then revised in light of the discussions and given final approval as the agreed report of the whole Committee on 16 April 2024.

The Secretariat's draft report was prepared for the Committee by Bertrand Pluyaud and Nikki Kergozou, with contribution from Emeline Gorguet under the supervision of Jens Arnold.

Statistical research assistance was provided by Mafalda Trincao and editorial support was provided by Robin Houng Lee and Emily Derry.

The previous Survey of France was issued in November 2021.

Information about the latest as well as previous Surveys and more details about how Surveys are prepared is available at www.oecd.org/eco/surveys

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Basic statistics of France, 2023
(Numbers in parentheses refer to the OECD average)[1]

LAND, PEOPLE AND ELECTORAL CYCLE					
Population (million)	68.2		Population density per km²	124.5	(39.2)
Under 15 (%)	17.0	(17.0)	Life expectancy at birth (years, 2022)	82.2	(79.6)
Over 65 (%)	22.0	(18.3)	Men (2022)	79.4	(77.0)
International migrant stock (% of population, 2019)	12.8	(13.2)	Women (2022)	85.2	(82.4)
Latest 5-year average growth (%)	0.3	(0.4)	Latest general election	June	2024

ECONOMY					
Gross domestic product (GDP)			Value added shares (%)		
In current prices (billion USD)	3 056.0		Agriculture, forestry and fishing	2.1	(2.8)
In current prices (billion EUR)	2 826.2		Industry including construction	20.8	(27.2)
Latest 5-year average real growth (%)	0.9	(1.6)	Services	77.1	(70.0)
Per capita (thousand USD PPP)	61.1	(58.9)			

| GENERAL GOVERNMENT | | | | | |
Per cent of GDP					
Expenditure (OECD: 2022)	56.9	(42.8)	Gross financial debt (OECD: 2022)[2]	116.2	(113.2)
Revenue (OECD: 2022)	51.4	(39.6)	Net financial debt (OECD: 2022)[2]	72.8	(67.4)

EXTERNAL ACCOUNTS					
Exchange rate (EUR per USD)	0.92		Main exports (% of total merchandise exports, 2022)		
PPP exchange rate (USA = 1)	0.68		Machinery and electronics	18.1	
In per cent of GDP			Chemicals	17.4	
Exports of goods and services	34.3	(31.3)	Transportation	14.4	
Imports of goods and services	36.3	(31.5)	Main imports (% of total merchandise imports, 2022)		
Current account balance	-0.7	(-0.3)	Fuels	18.8	
Net international investment position	-29.8		Machinery and electronics	18.6	
			Chemicals	11.4	

LABOUR MARKET, SKILLS AND INNOVATION					
Employment rate (aged 15 and over, %)	52.2	(58.0)	Unemployment rate, Labour Force Survey (aged 15 and over, %)	7.3	(4.8)
Men	55.7	(65.5)	Youth (aged 15-24, %)	17.2	(10.6)
Women	49.0	(50.8)	Long-term unemployed (1 year and over, %, 2022)	2.0	(1.2)
Participation rate (aged 15 and over, %)	56.3	(60.9)	Tertiary educational attainment (aged 25-64, %, 2022)	41.6	(40.7)
Average hours worked per year	1 500	(1 742)	Gross domestic expenditure on R&D (% of GDP, 2021)	2.2	(2.9)

ENVIRONMENT					
Total primary energy supply per capita (toe, 2022)	3.1	(3.8)	CO2 emissions from fuel combustion per capita (tonnes, 2022)	4.0	(7.8)
Renewables (%, 2022)	12.4	(12.0)	Water abstractions per capita (1 000 m³, 2020)	0.4	
Exposure to air pollution (more than 10 µg/m³ of PM 2.5, % of population, 2020)	38.0	(56.5)	Municipal waste per capita (tonnes, 2022)	0.5	(0.5)

SOCIETY					
Income inequality (Gini coefficient, 2021, OECD: latest available)	0.298	(0.315)	Education outcomes (PISA score, 2022)		
Relative poverty rate (%, 2021, OECD: 2020)	8.5	(11.7)	Reading	474	(476)
Median disposable household income (thousand USD PPP, 2021. OECD: 2020)	30.6	(27.5)	Mathematics	474	(472)
Public and private spending (% of GDP)			Science	487	(485)
Health care (2022)	12.1	(9.2)	Share of women in parliament (%)	37.8	(32.8)
Pensions (2020, OECD: 2019)	14.9	(9.5)	Net official development assistance (% of GNI)	0.5	(0.4)
Education (% of GNI, 2021)	4.8	(4.4)			

1.The year is indicated in parenthesis if it deviates from the year in the main title of this table. *Where the OECD aggregate is not provided in the source database, a simple OECD average of latest available data is calculated where data exist for at least 80% of member countries. Public debt (Maastricht definition) was at 110.7% of GDP in Q1 2024. The Maastricht definition evaluates debt at face value and not market value as employed here. Moreover, the instrument coverage is different.
Source. Calculations based on data extracted from databases of the following organisations: OECD, International Energy Agency, International Labour Organisation, International Monetary Fund, United Nations, World Bank.

Executive summary

Economic growth has proven resilient but remains weak

France has faced two significant, successive shocks: the COVID-19 pandemic and the increase in inflation. Government support measures have been decisive in protecting businesses, jobs and purchasing power, but at a high fiscal cost. Gradual disinflation is expected to support a moderate economic recovery by 2025.

Economic activity had regained pre-pandemic levels in 2021 but slowed in 2022 and 2023. After emerging in the context of the post-COVID-19 recovery, inflationary pressures have been exacerbated by Russia's war of aggression against Ukraine and have restrained private consumption in France and other OECD countries. The tightening of monetary policy in response to rising prices has led to a deterioration in financing conditions for businesses and households, which has curbed private investment and consumption. At

the same time, business investment has been buoyed by substantial public support.

After having provided massive support to businesses and households during the pandemic, France also took strong measures to limit price increases. Inflation was high in 2022 and 2023, but less than in the euro area as a whole, and the purchasing power of households was preserved over both years. The budgetary cost of these measures amounted to a cumulative 2.9% of GDP over the two years.

Figure 1. GDP growth has slowed

Real GDP, Index, 2019Q4=100
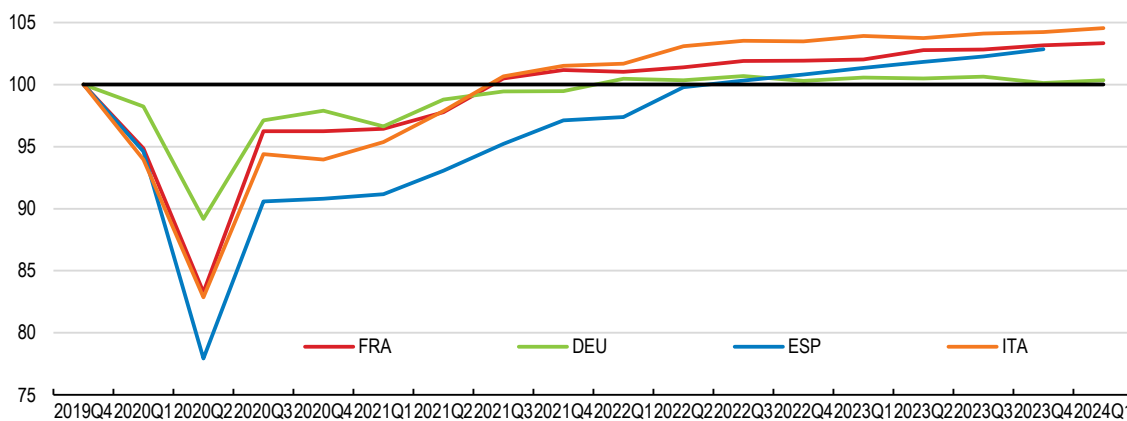
Source: OECD Economic Outlook: Statistics and Projections (database).

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Disinflation and a mild improvement in the global economic outlook will support a modest recovery (Table 1). In 2024, subdued external demand will limit exports while higher financing costs will continue to reduce private investment and consumption. In 2025, easing inflation and a moderate recovery in foreign demand will allow growth to gain some momentum. Unemployment is expected to increase slightly between 2023 and 2025.

Risks to economic activity are balanced. Geopolitical tensions could intensify and lead to a rise in energy prices, which would weigh on economic activity. Financial risks, including in the real estate sector, warrant vigilance, despite an overall solid financial situation of households, businesses and banks. Upside risks include sizeable household savings accumulated during the pandemic which could boost private consumption. Exports, particularly in the aeronautical sector, could catch up faster than expected.

The budget balance deteriorated and public debt rose markedly during the COVID-19 pandemic. A recent public spending review identified in 2023 potential savings of around 0.4% of GDP per year by 2027, and new spending cuts have been decided for 2024, amounting to 0.7% of GDP. The pension reform introduced in 2023 will also help reduce spending.

Table 1. GDP growth will remain modest

Annual growth rates, %, unless specified

	2022	2023	2024	2025
Real GDP	2.6	1.1	0.8	1.3
Private consumption	3.2	0.9	1.2	1.9
Govt consumption	2.6	0.8	0.4	0.4
Investment	0.1	0.7	-0.9	0.8
Exports	8.3	2.5	2.8	1.8
Imports	9.1	0.7	-0.2	1.7
Unemployment rate (% labour force)	7.3	7.3	7.6	7.7
Inflation (CPI)	5.9	5.7	2.3	2.0
Govt balance (% GDP)	-4.7	-5.4	-5.1	-4.3
Public debt (% GDP, Maastricht definition)	111.3	109.7	112.8	114,7

Source: OECD Economic Outlook database.

Additional efforts are vital to lower government debt more markedly. Fiscal outcomes will have to be strengthened by containing the wage bill and streamlining social and healthcare coverage, spending by local governments and tax expenditures, while taking into account short-term economic conditions when defining the pace of adjustment. Fiscal consolidation focused on spending restraint will create space to raise investment in education, digitalisation and other measures to boost potential growth and finance the green transition. The effectiveness of the fiscal framework would be strengthened by making public finance programming laws binding and fully implementing expenditure reviews.

Pursuing structural reforms will boost productivity

Potential growth and productivity have decelerated over recent years. The employment rate has continued to increase but remains below the OECD average.

Lifting productivity growth hinges on a wider diffusion of digital technologies, continued reductions of still high regulatory barriers and stronger innovation. Easing barriers to entry and regulations in some services sectors would support competition. France has a dynamic innovation ecosystem that should continue to be supported.

Figure 2. Productivity growth has slowed

Annual average growth in GDP per hours worked
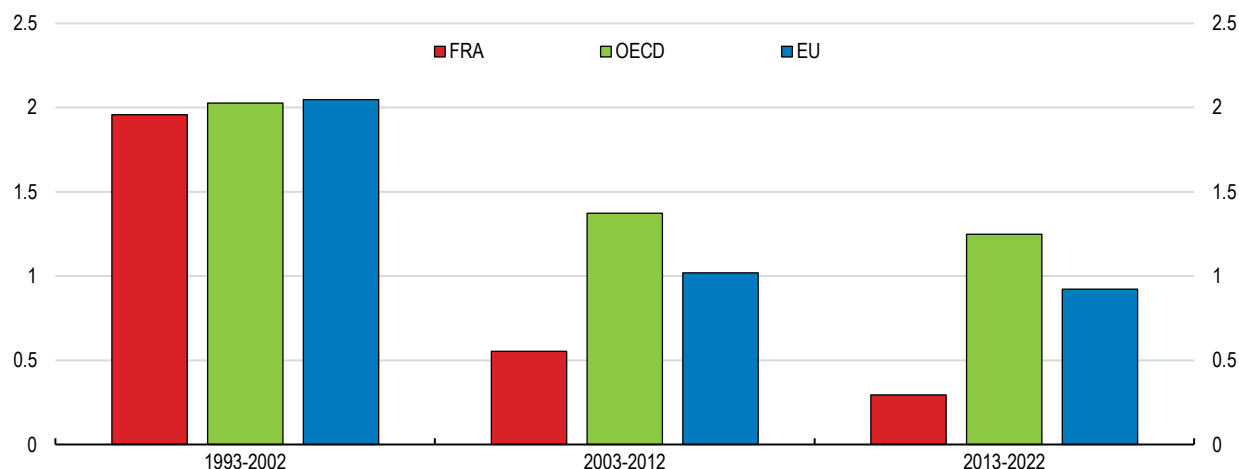
Source: OECD Productivity indicators (database).

The past few years have seen ambitious policy efforts to boost competitiveness and employment. This includes cutting business taxes and reducing social charges on low salaries, along with reforms to unemployment benefits, apprenticeships and vocational training. The government is implementing a better-connected and more supportive "network for employment", which includes stakeholders in employment and integration, coordinated by "France Travail". The reform is promising, but the task's complexity and the challenging coordination efforts involved will require careful implementation. Apprenticeships continue to receive strong support, which could be made more effective by better targeting support to young people with low skills who face difficulties transitioning into the labour market on their own. Stepping up the provision of early childcare services should support women's participation in the labour market.

Greenhouse gas emission reductions will need to accelerate

France reduced greenhouse gas emissions by 25% between 1990 and 2022, and recently implemented consistent medium and long-term environmental planning. Still, reaching the 2030 targets will require stronger policy efforts across several sectors (Figure 3).

Average carbon prices are relatively high but uneven across sectors. France offers substantial implicit fossil fuel subsidies, particularly to the farming and fishery sectors. Accelerating the phase-out of these subsidies and other tax expenditures while aligning prices across sectors would strengthen the effectiveness of carbon pricing.

More effective sectoral policies would help reduce emissions. Transport emissions are still far from 2030 targets. Large-scale support for electric vehicles, combined with measures to enhance public transport and encourage alternative modes of transport such as cycling, will support more rapid progress. Simplifying administrative procedures for low- and middle-income households to obtain public support would accelerate thermal residential renovations.

Figure 3. Emissions need to decline sharply

Greenhouse gas emissions, Mt CO2-e
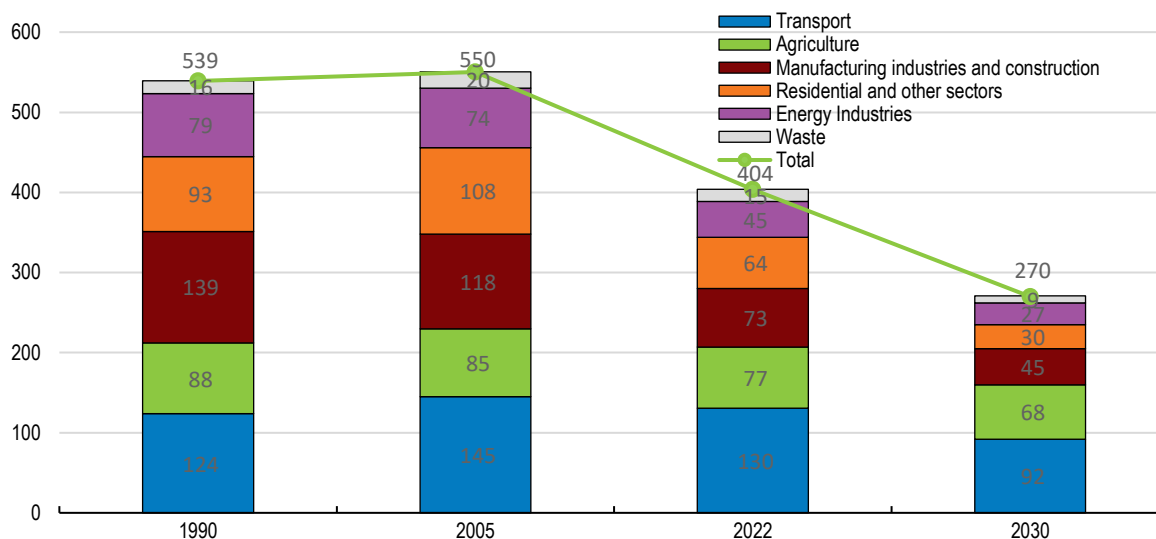
Note: Excludes land-use, land-use change and forestry (LULUCF), which in France is a net carbon sink and therefore represents negative emissions. Mt CO2-e stands for million tonnes of carbon dioxide equivalent. Emissions for 2022 are an estimate. The 2030 target is a provisiional goal. The SNBC-3 will put forward definitive carbon budgets. Emissions source categories are defined according to the National Air Pollutant and GHG Emissions Inventory System, as defined by the French Ministry in charge of the Ecological Transition and the Cohesion of Territories. Source: Citepa, Greenhouse gas emissions inventory, Secten data, 2023 edition; authors' calculations.

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Education outcomes are mid-range but inequitable

Students perform at a level similar to OECD peers although the link between socio-economic background and educational outcomes is particularly strong (Figure 4).

School autonomy is more limited than in many OECD countries. Autonomy can support educational outcomes but requires quality school leadership. Strengthening the role, responsibilities and career paths of school leaders could help, particularly in primary education and for schools facing challenging socio-economic contexts.

France spends around one third more per upper-secondary student than the average OECD country but around 9% less per primary student. Continuing

to rebalance the distribution of spending between primary and secondary schools could provide greater support to children in the early years of their education.

Modern teaching practices like cognitive activation are used less often than in many OECD countries. Ensuring that teachers have sufficient knowledge and skills, support, feedback and time would support their use.

Figure 4. Students' performance is linked to certain characteristics
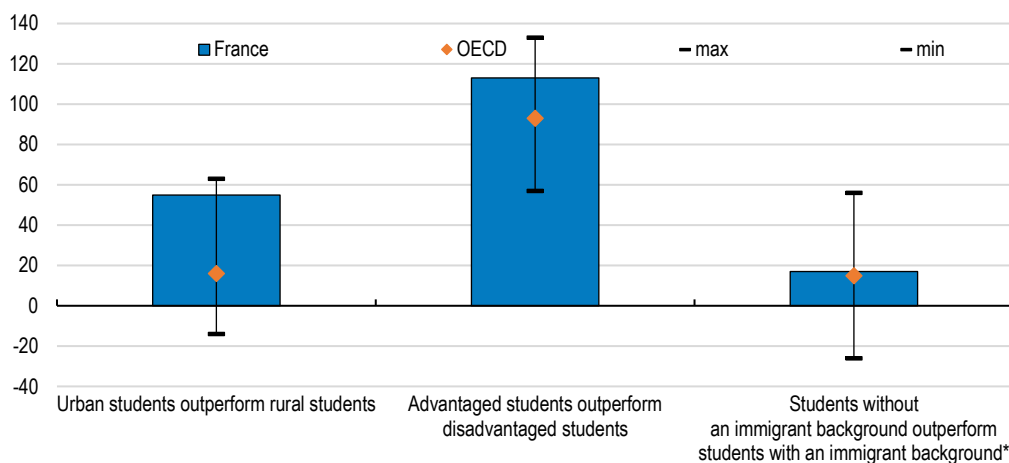
* Even after accounting for students' socio-economic status.
Source: OECD PISA 2022.

France is struggling to attract teachers, particularly in specific subjects and geographic areas. The teacher training system is complex and of variable quality. Improving working conditions, and considering to review remuneration, particularly for primary teachers and teachers in the middle of their career, would increase the attractiveness of the teaching profession.

The classification of some disadvantaged schools as "priority education" generates strong threshold effects, which precludes many disadvantaged students from much-needed support. A more progressive resource allocation to disadvantaged students would better align resources to students' needs.

Young people without tertiary education, particularly those with vocational qualifications, struggle to integrate into the labour market. The reform of vocational secondary schools introduced in 2023 aims to improve this situation by fostering closer ties between employers and schools. Combining school and significant work experience helps to smoothly transition to employment and should continue to be supported. Young people need to be better informed about future job opportunities, in particular those linked to the digital and green transitions. Diversifying the profiles of career advisers and reducing the number of structures in charge can improve career guidance.

Few girls currently pursue scientific careers and boys are underrepresented in humanities, social sciences and care professions. Continuing to combat gender stereotypes through better information would support gender diversity across career paths.

Supporting the well-being of students is essential to create a more conducive learning environment and improve students' outcomes. France has implemented plans to fight bullying and violence at school, which should continue to be treated as priority issues. Still, student discipline problems are more frequent than across OECD countries, according to the last PISA Survey. Teachers' training for managing the classroom and student behaviour can be strengthened. Including students with special needs in regular classes has become more common, but additional efforts are needed to meet the substantial needs for hiring and training assistants.

Main findings	Key recommendations
Improving the efficiency of public finances	
Public debt has increased significantly since the start of the decade. Tax expenditures are considerable and their effectiveness could be improved.	Step-up fiscal consolidation by reducing public spending and tax expenditures and improving their efficiency.
The tax-to-GDP ratio is one of the highest in the OECD. Taxes on labour are particularly high. Some business taxes have distortive effects.	Once public finances are balanced, continue to lower taxes on labour and eliminate distortive business taxes. In the short term, consider a shift in tax bases towards broad-based taxes and environmental taxes.
The Public Finance Programming Acts provide targets that were meant to strengthen the fiscal framework and curb public debt, but their effectiveness has been limited.	Strengthen the effectiveness of recent improvements in the fiscal framework by making the public spending ceilings binding and fully implementing spending reviews.
The 2023 pension reform is expected to increase the working population but older workers face difficulties in the labour market. The reform does not guarantee balanced pension funding. The system remains fragmented between different schemes and regimes, which makes it more difficult to implement fair rules and forecast pension expenditure.	Strengthen policies to support older people in employment. Closely monitor the impact of the pension reform.
Boosting employment and productivity	
Tax incentives for private R&D are amongst the highest in the OECD, yet R&D spending is consistently below the OECD average. Tax credits reach SMEs but provide more support to large firms.	Build on dynamic innovation ecosystems and a workforce with strong scientific and technological skills to attract R&D spending from multinationals.
Broad support for apprenticeships has accelerated their use since 2018. Such contracts may be replacing other forms of employment.	Target financial support for apprenticeships to young people with low skills and difficulties to join the labour market on their own.
Although the gap is below the OECD average, the employment rate of women remains below that of men.	Pursue efforts to improve the provision of early childcare services.
Supporting the green transition	
Carbon prices are highly uneven across sectors, particularly in agriculture and fishing, reducing their incentives to reduce emissions.	Accelerate the phase-out of fossil fuel subsidies, reduced rates and exemptions on fossil-fuel taxes. Further align carbon prices and tax polluting activities in line with their environmental impacts.
Past declines in transport emissions are insufficient to reach targets. The energy intensity of freight transport is high, with the share transported by rail low. Heavy vehicles continue to benefit from significant tax exemptions for diesel fuel.	Remove tax exemptions on diesel fuel for heavy vehicles to encourage a shift of freight transport from road to rail.
France's numerous programmes to support and fund residential renovations are complex and the up-front investment can be a significant barrier.	Reduce the barriers to complete renovations by simplifying administrative procedures and making it easier for low and middle-income households to obtain interest-free loans.
Strengthening educational outcomes	
Primary schools have limited autonomy, and school leaders are teachers responsible for administrative and pedagogical functions. Secondary schools have partial autonomy in how they manage and implement state budgets. Results from PISA suggest that appropriately combining autonomy and accountability is associated with better student performances.	Continue to raise school autonomy and accountability, particularly in primary schools.
Modern teaching practices promote critical thinking and decision making. They are associated with better student achievement and engagement but are used less widely than in other OECD countries.	Reinforce the use of modern approaches to teaching including cognitive activation practices by ensuring that teachers have sufficient knowledge and skills, support, feedback and time.
The attractiveness of the teaching profession could be improved. Salaries are lower than in alternative professions with similar qualifications, especially in primary schools. Early career increases are slow.	Improve the attractiveness of the teaching profession and consider reviewing remuneration for primary teachers and teachers in the middle of their career.
France provides additional resources to disadvantaged schools in the "priority education" network. This provides a clear structure for greater resources but results in strong threshold effects.	Continue to develop measures to combine the system of priority education networks with a more progressive allocation of resources to disadvantaged students outside of this system.
Significant imbalances between labour supply and demand reflect students' lack of awareness about future employment opportunities. Disadvantaged students have less access to guidance counselling.	Strengthen the quality of career choice counselling for secondary students, including through a stronger role for professional counsellors and additional efforts targeting disadvantaged students.
France has one of the highest incidences of in-class discipline problems in the OECD.	Strengthen teacher training in classroom management and student behaviour.

1 The economy has slowed and faces several challenges

Like other OECD economies, France has faced two significant, successive shocks: the COVID-19 pandemic and the impact of inflation, particularly in the wake of Russia's aggression against Ukraine. Government support measures have provided vital economic support, protecting businesses, jobs and household purchasing power.

Growth slowed in 2023 amid strong inflationary pressures and tighter financing conditions. It is expected to remain weak in 2024 but the economy should see a return to potential growth and improvement in household purchasing power in 2025. But beyond the cyclical recovery, low trend growth is holding back further improvements in incomes. GDP increased by only 1.5% per year between end-2009 and end-2019.

Several factors can account for this low growth performance, which predates the pandemic. These include insufficient levels and matching of skills, a slow diffusion of digital technologies within firms, high regulatory barriers and low R&D efficiency. The employment rate remains below the OECD average (68.1% compared to 69.4% in the OECD in 2022, Figure 1.1). Improving the labour market outcomes of young people and women would allow for stronger and more inclusive growth. France has implemented several reforms that can raise potential output, many of them related to the Recovery and Resilience Plan (RRP) agreed with the European Commission (Box 1.1).

Figure 1.1. The employment rate is below the OECD average
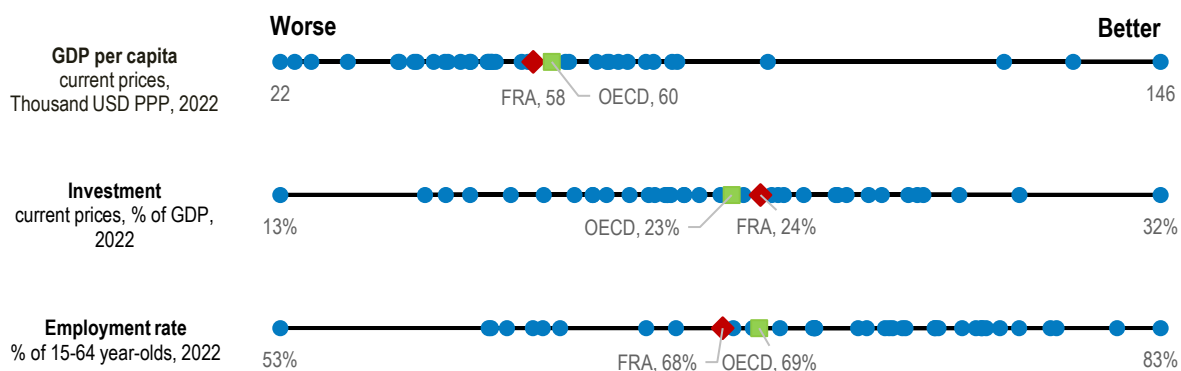
Source: OECD Economic Outlook database; OECD Labour Force Statistics database; and OECD calculations.

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Improving education outcomes can help to revive potential growth. Outcomes achieved in 2022 under the Programme for International Student Assessment (PISA) are close to the OECD average (Figure 1.2) but are highly correlated to socio-economic background. When compared with the survey conducted in 2018, performance scores of French students fell by more than the average OECD country in 2022 (OECD, 2023[1]). Numerous challenges lie ahead, including reducing inequalities in student performances, making the teaching profession more attractive, better connecting education to the present and future needs of the labour market and improving well-being at school.

Figure 1.2. Students level is average according to PISA scores
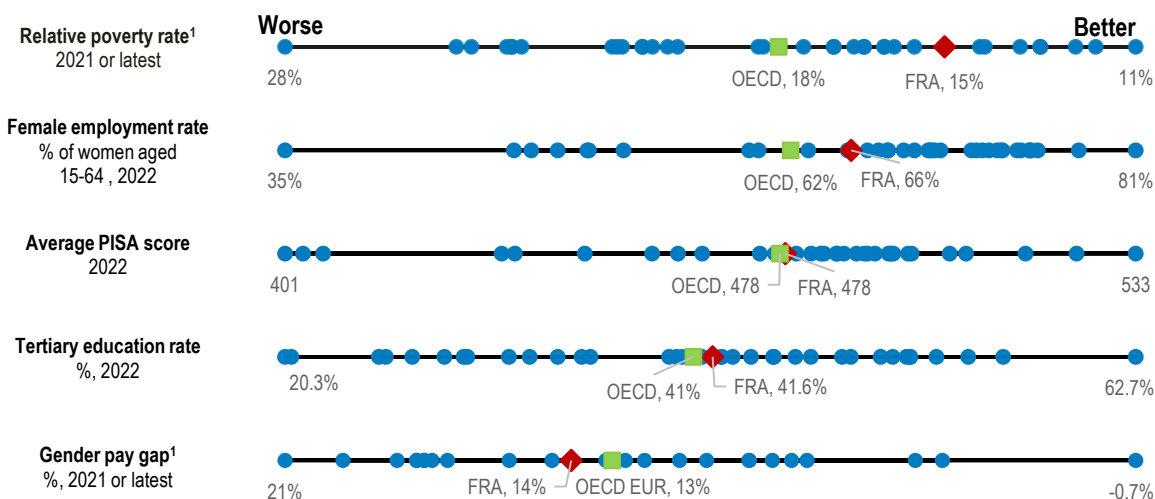
1.Indicator reversed so that the right side of the scale mostly corresponds to better outcomes.
Note: Relative poverty rate is determined after taxes and transfers based on a poverty line at 60% of median household income. Average PISA score is the average scores in mathematics, science and reading. For gender pay gap, OECD EUR is the unweighted average of OECD European countries.
Source: OECD Income Distribution database; OECD Labour Force Statistics database; OECD PISA database; OECD Education at a Glance database; Eurostat; and OECD calculations.

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Sizeable fiscal support both during the pandemic, and more recently to shelter households and firms from high inflation, allowed the economy to effectively withstand these external shocks, but it also widened the fiscal deficit. Public debt, which was already at 97% of GDP before the pandemic, increased to 110% of GDP by the end of 2023. The 2023 pension reform is expected to reduce the deficit of the pension system but will not eliminate it. While public spending helps to reduce social inequalities, its ratio to GDP is the highest in the OECD. Accordingly, taxation is one of the heaviest in the OECD, thus hampering competitiveness and potential growth. There is room to reduce public spending and make it more efficient. Boosting potential GDP growth would make it easier to achieve a substantial and much-needed fiscal consolidation. Future external shocks will warrant targeted responses to support households and firms most at risk, rather than broader measures such as VAT rate cuts.

The imperative to reduce public deficits is all the more urgent as climate change will result in significant costs for the economy and in particular for public finances, whether through the investments necessary to limit its impact or through the damage it will cause. France is committed to reducing greenhouse gas (GHG) emissions and has already lowered them by one quarter between 1990 and 2021 (Figure 1.3). France has implemented environmental planning to coordinate long-term climate change mitigation and environmental preservation efforts. Initiatives include creating fiscal incentives and disincentives, developing renewable energy, promoting energy efficiency and adapting to the impact of climate change. Net effective carbon prices remain high on average, but uneven across sectors. The share of renewable energy sources is comparable to that of peers and has potential for further increases. France still offers substantial implicit fossil fuel subsidies, particularly to farmers and fishermen. In order to reach the ambitious targets set for 2030, further mitigation policies will need to be implemented across the transport, building, industry, energy and agricultural sectors. Supporting vulnerable firms and households will be key to their success.

> **Box 1.1. Recent and upcoming reforms in France**
>
> Several major structural reforms have been implemented since the previous Survey in October 2021 or are planned to be undertaken in the short term.
>
> - In February 2022, a law aimed at improving local public administration was approved.
> - The pension reform came into force in September 2023 and introduces a gradual raising of the statutory retirement age from 62 to 64. The main special pension regimes are merged with the general regime for new employees. Since September 2023, minimum pensions have been raised by 100 euros per month, based on a full career and will be indexed to the minimum wage (SMIC).
> - The February 2023 unemployment insurance reform aligns benefit duration with the economic cycle. Unemployment benefit duration is reduced by 25% whenever the unemployment rate is below 9% and has not increased by more than 0.8 percentage points in the past quarter.
> - The law on full employment approved in November 2023 will enhance synergies between employment services by creating a "network for employment" coordinated by a new body named "France Travail", which replaces Pôle Emploi, providing more effective and specific support for job seekers. Eligibility for minimum income benefits ("revenu de solidarité active") will be made conditional on 15 hours of activity per week, which can include training, internships or career guidance.
> - Vocational upper-secondary schools were reformed in 2023 with the objective of improving the integration of students into employment, enhancing the appeal of vocational pathways and adapting programmes to the needs of the labour market.
> - Future reforms in education were announced by the Government in December 2023 and January 2024. These include grouping students in classes according to their level in mathematics and French to encourage more innovative teaching methods, bolstering remediation pathways for struggling students and introducing a foundation year for students who do not pass the national exam at the end of lower-secondary school.
> - In 2023, annual spending reviews were introduced for the first time, as part of the Public Finance Programming Law.

Against this background, the main messages of this Survey are the following:

- Reducing public debt should be a priority and requires implementing a short and medium-term fiscal consolidation plan. Public spending should be lowered, by altering the trajectory of the wage bill, streamlining social and healthcare expenditure, and improving the efficiency of public services. Tax expenditures should also be reduced.

- Low potential growth can be revived by continuing to implement policies supporting innovation and acquisition of digital skills and reducing regulatory barriers to competition. Labour market policies should strengthen incentives for older workers to participate in the labour force and prioritise those among young people who are the furthest away from finding employment.

- Fulfilling the ambitious greenhouse gas emissions reduction objectives set for 2030 will require boosting environmental policies in transport, construction, industry, energy and agriculture, further aligning carbon prices across sectors and accelerating the phase-out of remaining implicit fossil fuel subsidies.

- Spending on education is above the OECD average but outcomes are not commensurate and strongly linked to student's socio-economic background. Education can be improved by continuing to make the teaching profession more attractive and allocate more resources to disadvantaged students and more autonomy and responsibility to schools.

Figure 1.3. The share of energy from renewable sources can be increased

	Worse	Better
GHG emissions per unit of GDP [1] KgCO₂ eq. per USD, 2021 or latest		

GHG emissions per unit of GDP [1]
KgCO$_2$ eq. per USD, 2021 or latest

Worse — Better
0.41   OECD, 0.25   FRA, 0.15   0.08

Fine particles intensities[1]
Kg per inhabitant, 2021 or latest
38   OECD, 5 — FRA, 3   1

Household energy consumption[1]
koe/m^2, 2021 or latest
16   FRA, 14   OECD EUR, 10   5

Renewable energy sources
% of total energy supply, 2022
3% OECD, 12% — FRA, 12%   87%
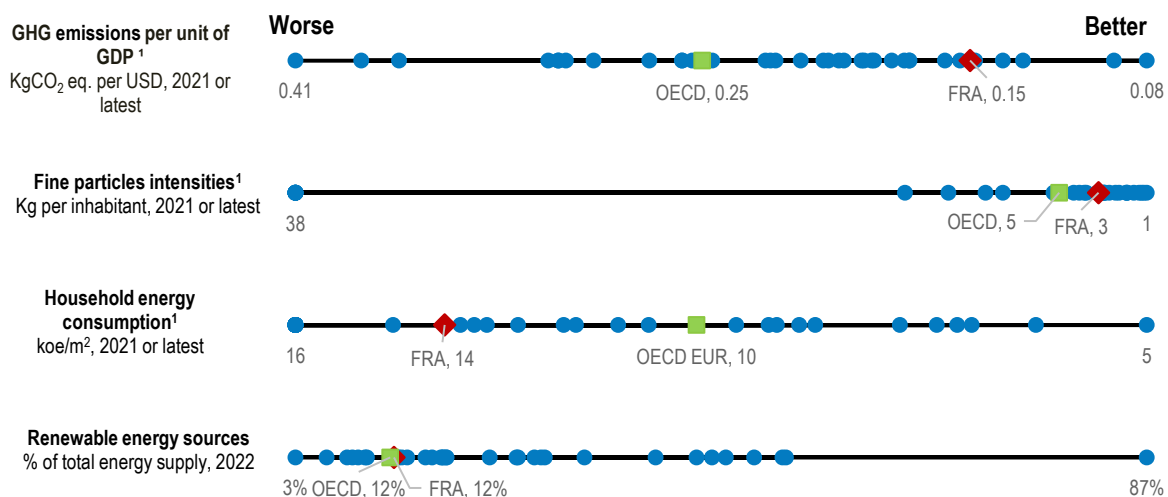
1. Indicator reversed so that the right side of the scale corresponds to a better outcome.
Note: Greenhouse gas (GHG) emissions exclude excluding land use, land-use change and forestry (LULUCF). The indicator is expressed in GHG emissions per unit of GDP, measured in 2015 PPP USD, and represents the GHG intensity of economic activity. "Fine particles intensities" shows PM$_{2.5}$ particulates emission per inhabitant is the fine particles intensities. For this indicator, the OECD unweighted average excludes Australia, Colombia, Costa Rica, Israel, Japan, Mexico, and New Zealand. The "Household energy consumption" is the energy consumption per square metrem² of households for space heating scaled to the EU average climate. OECD EUR is the unweighted average of OECD European countries.
Source: OECD Green Growth Indicators database; Odyssee-Mure; IEA World Energy Balances database; and OECD calculations.

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2 Macroeconomic developments and policy challenges

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GDP growth has moderated but is expected to recover by 2025

Gross domestic product (GDP), after falling sharply in 2020 on account of the COVID-19 pandemic, had returned to its pre-crisis level by the end of 2021, buoyed by substantial measures to support companies and households. Inflationary pressures emerged alongside the recovery and have been significantly exacerbated by Russia's war of aggression against Ukraine. The upturn in inflation and subsequent monetary policy tightening have curbed activity in France and other countries (Figure 2.1). New government measures helped mitigate the inflationary shock and support the economy, which showed resilience, avoiding another recession. Nevertheless, these measures came with a high cost for public finances. After reaching 2.6% in 2022 and 1.1% in 2023, GDP growth is expected to slow to 0.8% in 2024, before recovering to 1.3% in 2025, as disinflation allows for moderate growth in household consumption (Table 2.1).

Figure 2.1. GDP exceeded its pre-pandemic level but has slowed since end-2021

Real GDP, 2019Q4=100
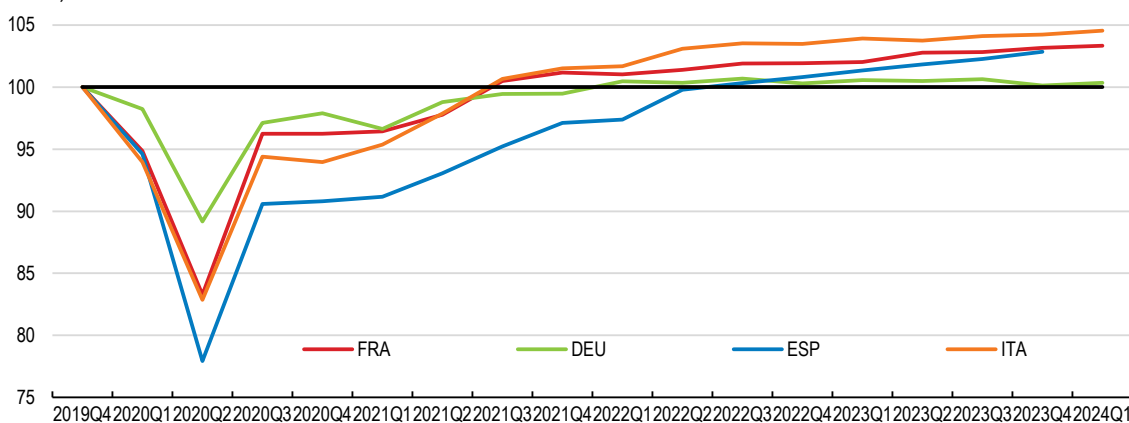
Source: OECD Economic Outlook: Statistics and Projections (database).

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Inflation has slowed GDP growth

Inflation picked up as of mid-2021, due to higher commodity prices and supply constraints, against the backdrop of the global economic recovery (Figure 2.2). At the start of 2022, the upturn in inflation was considerably aggravated by Russia's military aggression against Ukraine and the subsequent surge in energy prices. Food prices also surged throughout the year. As higher input costs were passed on to prices in industry and services, core inflation in turn picked up. However, despite the increase in wages that followed higher prices, the inflationary trend did not continue beyond the first quarter of 2023. After a peak at 7.3% in February 2023, headline inflation started to recede and fell to 2.7% in May 2024.

The government has introduced various measures to alleviate the effects of the inflationary shock on households and businesses (Table 2.2). The cap on increases in regulated gas and electricity prices, known as the "price shield", accounted for more than 60% of the total between 2021 and 2023 (Box 2.1). France finds itself among the countries with the most substantial support measures to combat inflation and preserve purchasing power. It has chosen to support the economy primarily by acting on prices, while others, such as Germany, have acted on incomes by providing subsidies (Figure 2.3). These measures have effectively limited inflationary pressures, with inflation restricted to 5.9% in 2022, compared with 8.4% in the euro area. Nevertheless, they entailed a significant cost for public finances. In addition, the fall in inflation has been slower in France than in the euro area in the second half of 2023.

The measures aimed at keeping prices down may hamper the reduction in energy consumption, particularly of fossil fuels (Hemmerlé et al., 2023[1]). However, France has implemented an energy

efficiency plan to raise awareness among households and business about energy savings, resulting in decreased energy consumption in 2023 (Ministère de l'Economie, des Finances et de la Souveraineté Industrielle et Numérique, 2023[2]).

Figure 2.2. Inflation has started to decrease

YoY, as a %
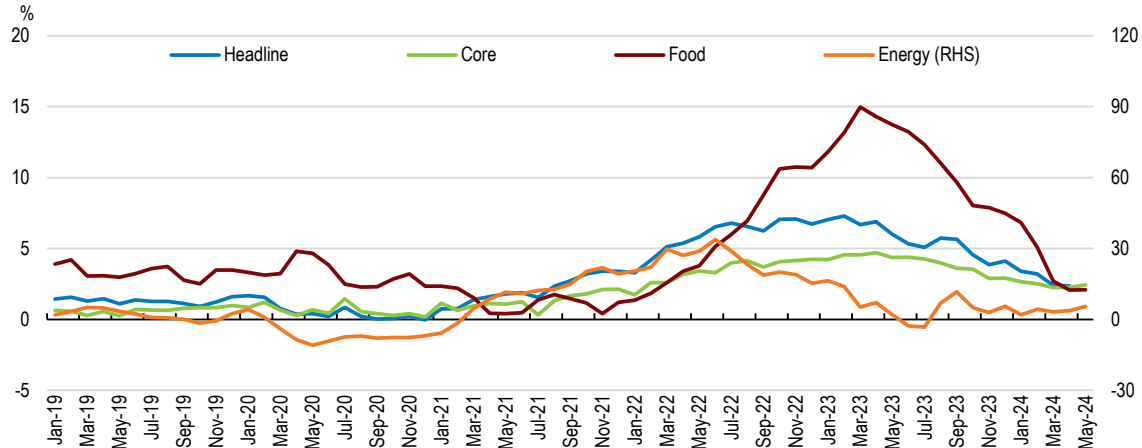
Source: Eurostat and OECD Economic Outlook: Statistics and Projections (database)

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Table 2.1. Macroeconomic indicators and projections

France	2020	2021	2022	2023	2024	2025
	Current prices EUR billion	Percentage changes, volume (2014 prices)				
GDP at market prices	2 317.4	6.8	2.6	1.1	0.8	1.3
Private consumption	1 241.7	5.3	3.2	0.9	1.2	1.9
Government consumption	587.3	6.6	2.6	0.8	0.4	0.4
Gross fixed capital formation	519.5	9.6	0.1	0.7	-0.9	0.8
Final domestic demand	2 348.6	6.5	2.3	0.8	0.5	1.3
Stockbuilding[1]	8.5	-0.6	0.6	-0.4	-0.8	0.0
Total domestic demand	2 357.1	6.0	2.9	0.5	-0.2	1.3
Exports of goods and services	661.8	11.1	8.3	2.5	2.8	1.8
Imports of goods and services	701.4	8.0	9.1	0.7	-0.2	1.7
Net exports[1]	- 39.6	0.7	-0.3	0.6	1.1	0.0
Note:						
GDP deflator	_	1.2	3.2	5.3	2.1	1.9
Harmonised consumer price index	_	2.1	5.9	5.7	2.3	2.0
Core HICP[2]	_	1.3	3.4	4.0	2.0	2.0
Unemployment rate[3] (% of labour force)	_	7.9	7.3	7.3	7.6	7.7
Gross household saving (% of disposable income)	_	18.7	16.6	16.8	17.7	16.9
General government financial balance (% of GDP)	_	-6.6	-4.7	-5.4	-5.1	-4.3
General government gross debt (% of GDP)	_	136.8	115.4	116.2	119.3	121.2
General government gross debt, Maastricht definition (% of GDP)	_	112.8	111.3	109.7	112.8	114.7
Current account balance (% of GDP)	_	0.4	-2.0	-0.7	-0.4	-0.5

1. Contributions to changes in real GDP, actual amount in the first column.
2. Harmonised consumer price index, excluding energy, food, alcohol and tobacco.
3. Including overseas departments.
Source: OECD (2024), OECD Economic Outlook: Statistics and Projections (database) and updates.

Figure 2.3. France chose to support households and firms by acting on prices

Cost of support measures to address rising energy prices, as a % of GDP (2021-2023)
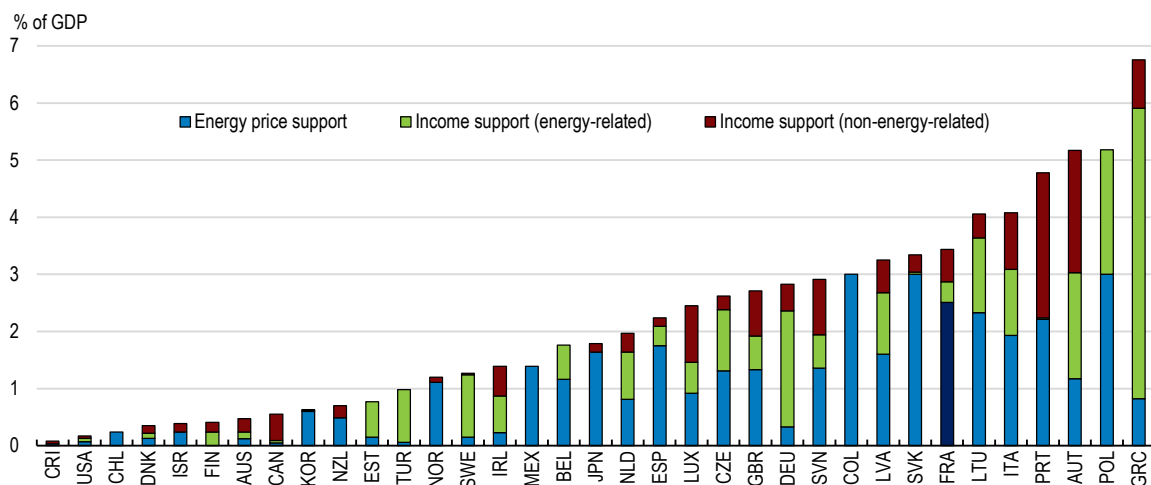
Source: OECD Energy support measures tracker (2023)

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Table 2.2. Government support measures to counter inflation

Description of the measure	Cost to public finances in billions of euros and as a % of 2023 GDP in brackets			
	2021	2022	2023	2024
Cap on the increase in regulated gas prices ("price shield"), from October 2021 to June 2023	0.4 (0.01%)	6.7 (0.24%)	2.3 (0.08%)	0.5 (0.02%)
EUR 100 allowance for individuals with incomes of less than EUR 2,000 a month ("inflation allowance"), in December 2021	3.8 (0.14%)			
Energy vouchers for low-income households, including fuel allowances	0.5 (0.02%)	1.2 (0.04%)	1.3 (0.05%)	
Subsidies for companies in sectors most exposed to rising input costs		0.9 (0.03%)	0.1 (0.00%)	
Allowances for companies whose energy costs represent more than 3% of revenues		0.5 (0.02%)	2.5 (0.9%)	
Compensation for electricity suppliers for capping increases in regulated electricity prices ("price shield")		11.2 (0.40%)	12.9 (0.57%)	2.8 (0.10%)
Reduction in electricity taxes as part of the cap on increases in regulated electricity prices ("price shield")		7.0 (0.25%)	8.8 (0.31%)	4.0 (0.14%)
Revaluation of the transport allowance for people using their personal vehicle for work-related journeys (revaluation of the kilometric scale)		0.4 (0.01%)	0.6 (0.02%)	0.5 (0.02%)
Advance revaluation of pensions and social benefits		6.7 (0.24%)	1.6 (0.06%)	0.1 (0.00%)
Fuel price subsidy of 18 cents per litre from April to August 2022, 30 cents per litre from September to mid-November, and 10 cents per litre from mid-November to December 2022		7.9 (0.28%)		
Exceptional "back-to-school" allowance targeted at low-income households in September 2022		1.1 (0.04%)		
Various measures to support households and businesses			0.9 (0.03%)	
Electricity price smoothing for SMEs and local authorities ("electricity shock absorber") and guarantee for very small enterprises ("super shock absorber")			2.6 (0.09%)	0.8 (0.03%)
Total	**4.7 (0.17%)**	**43.6 (1.56%)**	**36.6 (1.31%)**	**8.7 (0.31%)**

Source: 2024 Budget Draft Bill, Economic, Social and Financial Report, Ministry of the Economy, Finance and Industrial and Digital Sovereignty.

Box 2.1. The gas and electricity "price shield"

- The gas and electricity price shield caps the increase in the regulated sales prices charged to end consumers. These prices are set by the French Energy Regulatory Commission (CRE) and applied by incumbent suppliers to their customers. Under the price shield, the State covers the difference between the regulated sales price and the theoretical price that should have been applied based on the rise in gas and electricity suppliers' costs of. For gas, the difference is paid directly to the suppliers. For electricity, part of the difference is covered by a tax rebate, and the rest is paid to the suppliers.

- The regulated sales prices of natural gas were frozen at their October 2021 level from 1 November 2021 to 31 December 2022. In 2023, the increase in the regulated sales prices of natural gas was limited to 15% on 1 January 2023, before the price shield for gas was removed at the end of June.

- The increase in regulated electricity sales prices was limited to 4% from 1 February 2022 to 31 January 2023. There was a 15% increase in February 2023, and a 10% increase in August.

- According to INSEE, the gas and electricity price shield reduced the increase in household consumer prices by 3.1 percentage points between the second quarter of 2021 and the second quarter of 2022, including the reduction in the price of non-energy goods and services made possible by lower costs for the companies producing them (Bourgeois, 2022[3]).

- Another study, by the Conseil d'analyse économique (CAE), estimates that the price shield helped reduce inflation by an average of 0.7 percentage points in 2022 and a further 0.7 percentage points in 2023. This estimate only takes into account the direct effect on energy prices for households (Malliet, 2023[4]).

- According to a Cepremap study, the price shield reduced inflation by 1.1% in 2022 and by 1.8% in 2023, leading to an increase in activity of 1.7% of GDP in 2022 and 0.08% in 2023. The cost of this measure is estimated at EUR 110 billion over two years, representing 3.9% of GDP (Langot et al., 2022[5]).

Figure 2.4. Household consumption and the savings rate both increased

A. Private consumption in volume and real gross disposable income, 2019Q4=100

B. Gross household savings rate, %
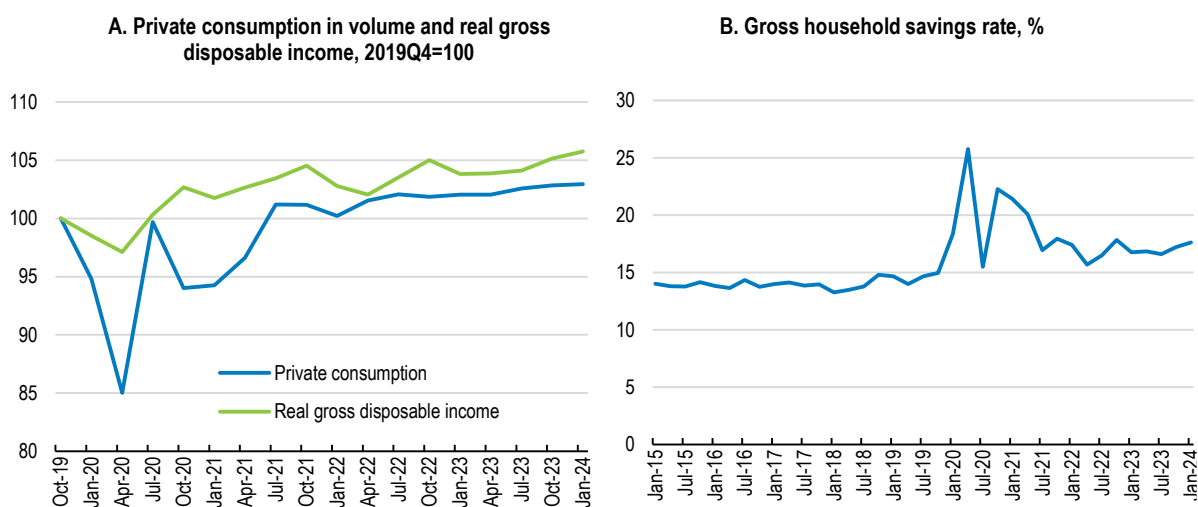
Source: Insee and OECD Economic Outlook: Statistics and Projections (database)

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Despite the inflationary shock, purchasing power was preserved in 2022 and 2023, largely thanks to support measures. Private consumption nonetheless slowed, as households maintained a high savings rate, well above its pre-crisis level (Figure 2.4). The fall in the outlook for demand, both in France and abroad, dampened investment since the last quarter of 2022. Higher interest rates increased financing costs, which also weighed on investment. The implementation of the "France Relance" and "France 2030" plans helped corporate and public investment to hold up (Box 2.2). Household investment, in contrast, fell sharply (Figure 2.5). Subsequently, housing prices started to decrease.

France's exports have increased slightly since end-2022, as foreign demand eased due to high inflation and tighter financial conditions in its main trading partners. Nonetheless, imports decreased during the same period, with foreign trade making a positive contribution to growth in 2023. In some sectors, exports have not fully recovered their pre-pandemic level. In particular, expenditures by non-residents remain 5% below their end-2019 level. The recovery is ongoing for exports of transport equipment, a key sector of France's foreign trade. Automobile exports have suffered as a result of supply difficulties (Fogelman, 2022[6]), which are diminishing, while aircraft equipment orders have picked up.

Figure 2.5. Household investment fell, corporate and public investment fared better

Gross fixed capital formation by volume[1], 2019Q4=100
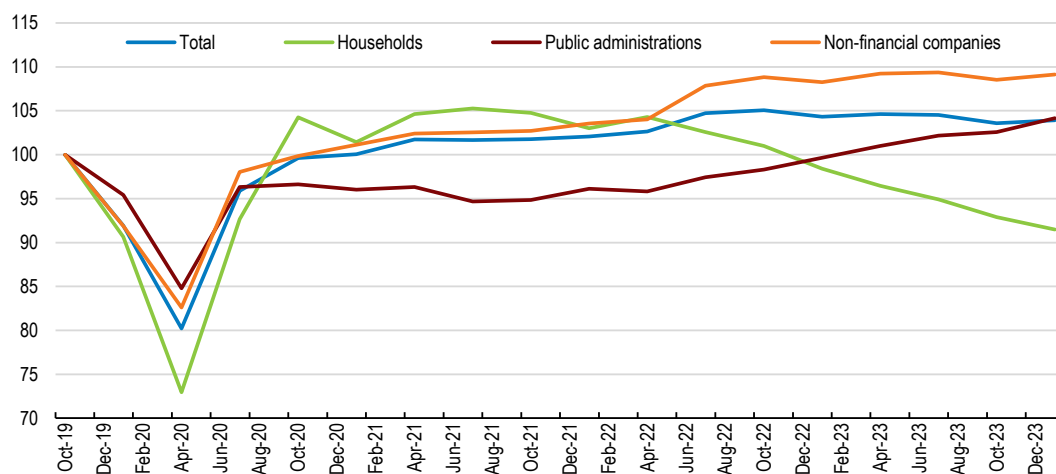
1. Data adjusted for seasonal variations and working days.
Source: Insee.

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France lost export market share during the COVID-19 crisis, which has yet to be fully recovered, despite a slight increase in 2023 (Figure 2.6). Almost all industrial sectors experienced a decline in market share, while services have proved more resilient (COE-Rexecode, 2023[7]). The improved outlook for transport equipment suggests a recovery of market share in the sector. During the previous decade, France had managed to stabilise its market share due to the slowdown in the integration of emerging countries into the global economy, but also on the back of a policy of reducing social charges on low and medium salaries, which had helped to lower labour costs. However, more needs to be done to improve non-price competitiveness (Berthou, 2021[8]). In particular, this will require efforts in terms of innovation (Chapter 3), as the proportion of innovating companies remains low (BPI France, 2023[9]).

Box 2.2. Progress on the France Relance and France 2030 plans

- In 2020, against the backdrop of the COVID-19 pandemic, France launched the "France Relance" plan, worth EUR 100 billion, or 3.8% of GDP for 2022, to be invested by the end of 2022. The aim was to kick start the economy and speed up the country's structural transformation by focusing on three areas: the green transition (1.14% of GDP), business competitiveness (1.29% of GDP) and regional cohesion (1.37% of GDP for investment in healthcare, local authorities, training and integration, and retraining).

- This plan was supplemented the following year by the "France 2030" investment plan, aimed at developing industrial competitiveness and future technologies through investment to support businesses, universities and research bodies. It received EUR 54 billion to be invested between 2023 and 2027 (2.0% of GDP). Both plans were described in the *OECD Economic Survey of France 2021* (OECD, 2021[10]).

- According to the Evaluation Committee of the "France Relance" plan, 93% of investments had been committed by the end of November 2023 (Comité d'évaluation du plan France Relance, 2022[11]). That said, only 73% of the funds had actually been used by August 2022.

- The "France Relance" plan will be partially funded through the European Next Generation EU and REPowerEU funds, with France set to receive EUR 40.3 billion in subsidies between 2021 and 2026, or 1.5% of GDP. Payment of the funds is contingent on meeting targets outlined in the National Recovery and Resilience Plan (PNRR), focusing on investments and reforms. To date, 0.8% of GDP has been paid out following the positive assessment by the European Commission in relation to two payment requests covering completion of 28 of the 46 reform-related targets and 64 of the 134 investment-related targets. Reforms have been carried out in public finance, the labour market and healthcare, while investments have mainly concerned building renovations, transport, decarbonising industry, youth employment and education. A third payment request for an additional 0.3% of GDP was submitted to the European Commission in January 2024.

- Finally, by October 2023, 0.8% of GDP of investment had been committed out of the 2% of GDP provided for under the France 2030 plan. By the end of June 2023, France had contributed to the funding of more than 2,400 projects for over 2,700 recipient organisations. 48% of funding was allocated to SMEs and mid-sized enterprises, 13% to large groups and 29% to universities and research bodies.

Figure 2.6. France has lost export market share

Export performance[1]
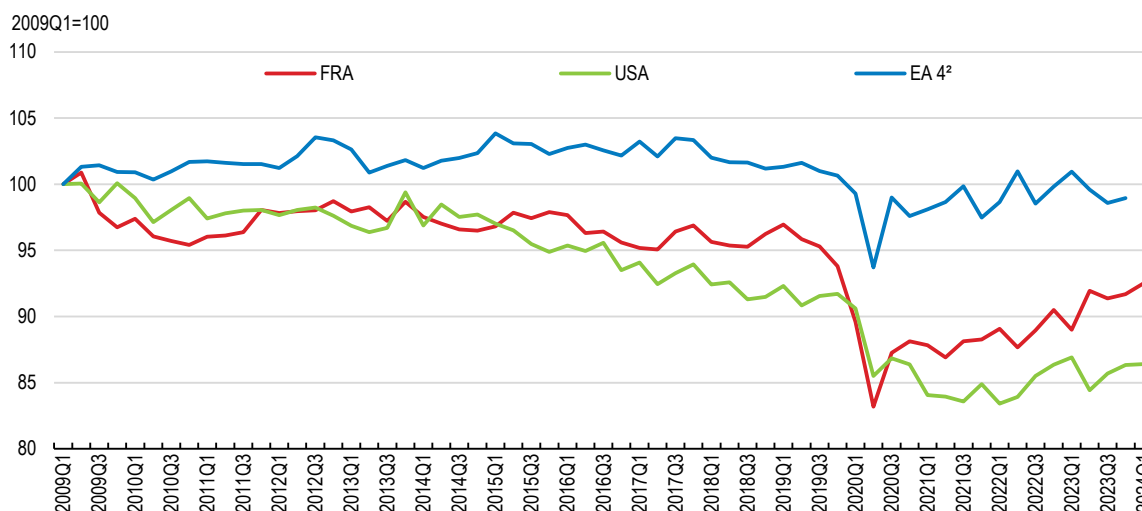
1. Difference between export growth and export markets' growth, in volume terms (based on export markets as of 2010).
2. EA4 is the simple average for Germany, Spain, Italy and the Netherlands.
Source: OECD (2024), OECD Economic Outlook (database).

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Figure 2.7. Structure of exports

A. Goods by destination, 2020

Legend:
- Euro area
- Other Europe
- Asia
- North America
- Others
- Africa

Euro area 45%, Other Europe 22%, Asia 12%, North America 9%, Others 7%, Africa 5%

B. Services by destination, 2022

Legend:
- Euro area
- Other EU
- Other Europe
- North America
- Asia
- Others

Euro area 41%, Other EU 4%, Other Europe 18%, North America 16%, Asia 13%, Others 8%

C. Goods by sector, 2020

Legend:
- Machinery and transport equipment
- Chemicals and related products
- Miscellaneous manufactured articles
- Food and live animals
- Manufactured goods
- Articles and transactions
- Beverages and tobacco
- Others

Machinery and transport equipment 35%, Chemicals and related products 21%, Miscellaneous manufactured articles 13%, Food and live animals 10%, Manufactured goods 10%, Articles and transactions 4%, Beverages and tobacco 4%, Others 0%

D. Services by sector, 2022

Legend:
- Transport
- Travel
- Technical business services
- Others
- Consulting services
- ICT services
- Financial services
- Charges for the use of intellectual property
- Research and development services

Transport 22%, Travel 17%, Technical business services 14%, Others 12%, Consulting services 10%, ICT services 7%, Financial services 6%, Charges for the use of intellectual property 4%, Research and development services 4%

Note: In Panel C, Others include mineral fuels, lubricants and related materials, crude materials, and animal and vegetable oils. In Panel D, Others include insurance and pension, construction services, and cultural services.
Source: OECD (2023), International Trade Statistics (database); OECD International trade in services.

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The robustness of employment that emerged during the pandemic persists

Since the onset of the pandemic, employment has been particularly robust relative to activity. The unemployment rate reached a forty-year low of 7.1% in the first quarter of 2023, before edging up to 7.5% in the first quarter of 2024. Job vacancies have reached a historically high level in 2023. The surge in apprenticeship contracts following the 2018 reform and the introduction in 2020 of an exceptional bonus for hiring apprentices goes some way towards explaining the relatively strong employment figures, as about a third of jobs created between end-2019 and mid-2023 correspond to apprenticeship.

Against a backdrop of inflationary pressures and recruitment difficulties, wages rose sharply in 2022 and 2023, without however matching the price increases over the same period. Between the last quarter of 2021 and the last quarter of 2023, average hourly wages rose by 7.9%, while consumer prices rose by 11.5%. Over the same period, the minimum hourly wage (SMIC) was raised by 9.9% (in May 2023).

GDP growth is expected to recover slowly

After 1.1% in 2023, GDP growth is predicted to be 0.8% in 2024 before bouncing back to 1.3% in 2025, slightly above potential growth. The output gap, estimated at -1.5%, in 2023, will remain negative and is projected at -1.7% in 2025. A lacklustre international environment is set to limit export growth, while rising financing costs are expected to continue to curb investment, which is expected to fall in 2024 and rise only slightly in 2025. The slight upturn in GDP is expected to be driven primarily by a gradual recovery in household consumption, which in turn is set to be underpinned by a gradual fall in inflation from 5.7% in 2023 to 2.3% in 2024 and 2.0% in 2025, assuming that commodity prices stabilise. At the same time, tight labour markets are set to continue to fuel wage growth. Household incomes will also benefit from the indexation of certain welfare benefits to past inflation. The government has introduced an allowance of 100 euros per car at the start of 2024 for low-income households, to compensate for the rise in fuel prices, at a budget cost of 500 million euros. Most of the emergency support measures have gradually disappeared. All in all, household purchasing power will increase in 2024 and 2025.

Risks to economic activity appear evenly balanced. Geopolitical tensions could intensify and trigger a rise in energy prices and a loss of confidence from investors. This would lead to higher inflation and lower growth. The downturn in the real estate market could gather pace, with a sharper-than-expected fall in household investment. On the other hand, higher-than-expected spending of savings accumulated during the pandemic could lead to stronger private consumption. Exports could continue to catch up faster than expected, particularly in the aeronautical sector.

Table 2.3. Events that could lead to major changes in the outlook

Vulnerability	Possible outcome
A steeper-than-expected real estate downturn.	A fall in activity as household investment declines.
An intensification of geopolitical tensions.	Higher energy prices would induce a rise in inflation, a fall in incomes and a worsening of the current account balance. A loss of confidence from investors would reduce global demand and lower growth in France.
France has lost export market share.	Exports could be stronger than expected, particularly in the aeronautical sector.
Household savings have remained high since the start of the COVID-19 crisis.	Households could choose to spend their accumulated savings, which would support growth.

The financial situation of households, businesses and banks looks solid, but risks have increased

As a result of the higher costs incurred by monetary policy tightening, banks have increased lending rates to businesses and households (Figure 2.8, Panel A). They have also imposed stricter loan conditions (European Central Bank, 2023[12]). However, the slowdown in lending to households and businesses (Figure 2.8, Panel B) seems more to do with a fall in demand than a squeeze in supply (OECD, 2023[13]). Overall, the transmission of monetary policy appears to have fully passed through into financial conditions.

The real estate market is currently slowing, but this is expected to have only a limited impact on the financial situation of households. Rising borrowing costs have led to a fall in housing investment, down by 7.0% year-on-year in the first quarter of 2024. House prices have also started to fall, but at this stage the downturn is contained and less severe than in the other major euro area countries (Figure 2.9). Moreover, as almost all mortgage loans are granted at fixed rates, the rise in interest rates has not significantly affected the ability of borrowers already in debt to repay their loans. In addition, 65% of mortgages are secured by a bank guarantee, which means that the borrower's solvency needs to be assessed twice, thereby limiting the risk of default.

Figure 2.8. Interest rates increased and lending decreased

A. Interest rates on loans , en %

Legend:
- Households - housing loans
- Households - consumer loans
- Enterprises
- ECB (main refinancing operations)

B. Outstanding loans, annual change %

Legend:
- Households - consumer loans
- Households - housing loans
- Non-financial companies - investment
- Non-financial companies - treasury
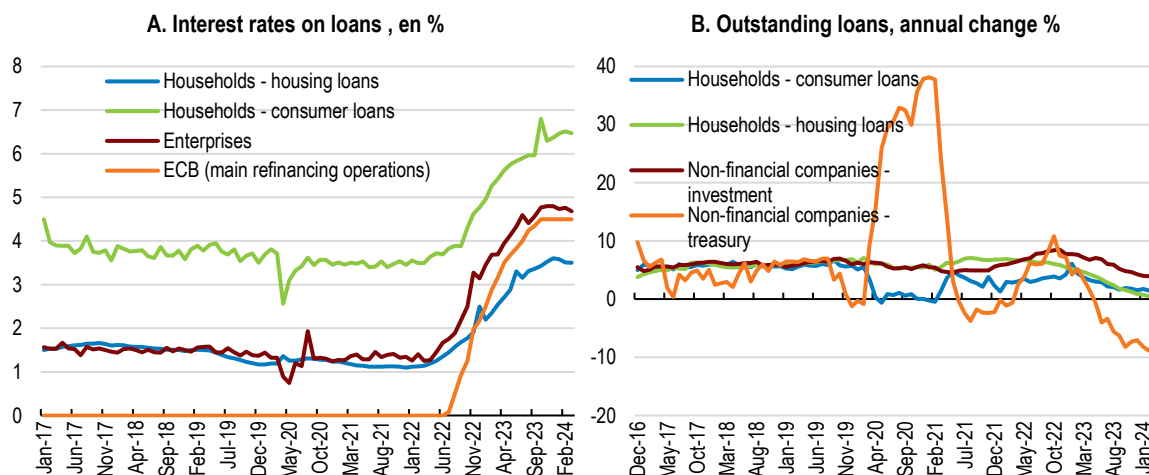
Source: European Central Bank, Banque de France

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Figure 2.9. Real estate prices have fallen, but less than in the other large euro area countries

A. Real house price
Index 2015=100

Legend: FRA — OECD — EA4[1]

B. House prices to income ratio
Index 2015=100

Legend: FRA — OECD — EA4[1]
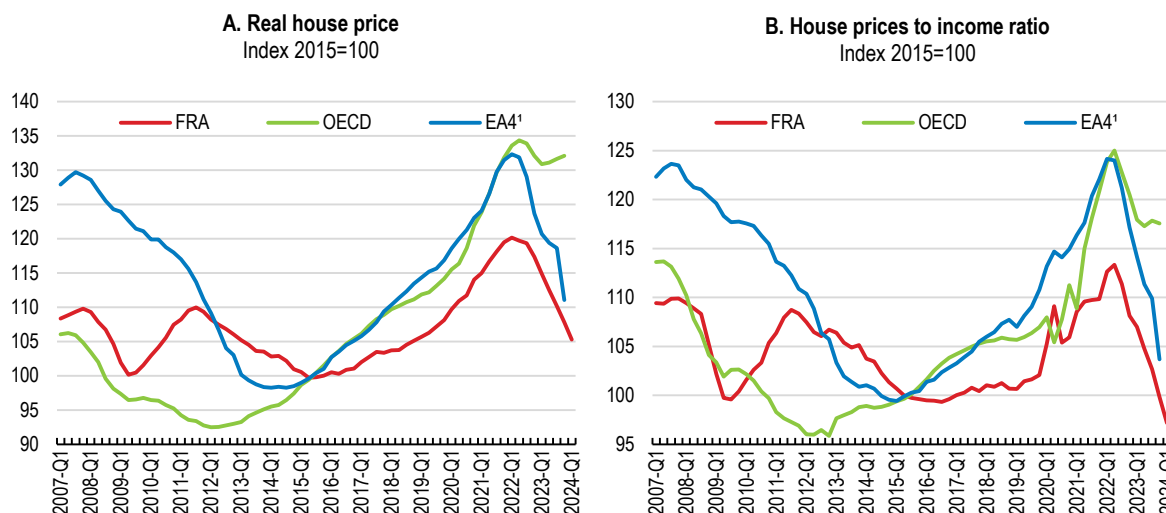
1. EA4 is the simple average for Germany, Spain, Italy and the Netherlands.
Source: OECD (2024), Analytical House Price Indicators (database).

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Household debt has increased as a share of GDP since the 2008 financial crisis, in contrast to the situation in the other large euro area countries, and it is now higher than in these countries (Figure 2.10). However, banks are now subject to rules for granting mortgage loans that limits the risk of excessive household debt to a macroeconomic level. These rules became legally binding in 2022. They require that 80% of loans allocated by banks must be granted with a maturity of less than 25 years (27 in the case of a grace period) and to borrowers with an effort ratio (monthly payments as a proportion of household income) of less than 35%.

Figure 2.10. Household debt has risen over the past decade

Household debt, as a % of GDP

Source: Banque de France

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The increase in financing costs and the deterioration of the business outlook has slowed the flow of credit to companies. In 2023 and in early 2024, investment loans continued to rise but liquidity loans fell. Bond market financing experienced a slight year-on-year increase in March 2024.

The financial situation of companies remains generally sound, despite high levels of debt. Gross corporate debt, which was already high in 2019, increased during the pandemic and has fallen only slightly since. As a proportion of GDP, it is much higher than the average across the euro area (Figure 2.11, Panel A). However, corporate cash flow, like corporate debt, increased significantly in 2020 and 2021 (Figure 2.11, Panel B). It fell in 2023 but remains above its 2019 level. Accordingly, net corporate debt has remained close to its long-term average. Profit margins, which peaked in 2021, are close to pre-pandemic levels (Figure 2.11, Panel C). There were very few insolvencies in 2020 and 2021 as a result of the support measures introduced to counter the pandemic. Rising production costs, higher interest rates, the slowdown in activity and initial repayments of government guaranteed loans (PGE) caused a sharp increase in insolvencies in 2022 and 2023 to pre-crisis levels. Insolvencies could continue to rise if the slowdown in activity persists, especially with the expiry of the PGE scheme at the end of 2023. Since March 2020, 685,000 businesses have benefited from this scheme, for a total of 144 billion euros.

The commercial real estate sector has begun to slow. Commercial real estate construction starts have been falling since mid-2022. Demand has been undermined by the rise in transaction costs following the upturn in interest rates and by the more structural effect of growth in teleworking and e-business. While commercial real estate represented only 3.3% of the banking sector's exposure at the end of 2022, it accounted for 8.4% of the assets of insurance companies. Given the proportion of commercial real estate assets in companies' total assets (11% in 2021), very close attention needs to be paid to developments in the sector, as a fall in prices would reduce the value of companies' assets (Haut Conseil de Stabilité Financière, 2023[14]).

Figure 2.11. The financial situation of companies is generally sound despite high debt

A. Debt excluding trade credit of non-financial corporations as a ratio of GDP

B. Balance-sheet of non-financial corporations 2019Q1=100

C. Profit margins, % of value added

D. Insolvencies, cumulative over 12 months

1. Deposits in monetary financial institutions excluding ESCB in the euro area.
Source: ECB data portal (2024), Insee (2024), Banque de France (2024).

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The six leading French banks posted a 5.3% rise in net banking income in 2022. Their interest margin rose by 7.2%, driven mainly by a buoyant lending activity. In 2023, the gradual effect of rising interest rates on banks' return on assets is expected to have boosted their interest margins, but the slowdown in lending volumes will have weighed on their income (Haut Conseil de Stabilité Financière, 2023[14]).

French banks exhibit high levels of solvency and liquidity (Banque de France, 2023[15]). However, their prudential position could deteriorate as lending slows and insolvencies rise, which could affect credit risk. The CET1 solvency ratio of France's main banking groups stood at 16.0% in the last quarter of 2023, above the European average (Single Supervisory Mechanism), while the total capital ratio was 19.4%, compared with 19.7 for the European average. The LCR liquidity ratio remained well above the minimum requirement of 100%, at 149.9% compared with 164.4% for the European average. The non-performing debt ratio improved very slightly since the last quarter of 2022, but remains very low, below its 2019 level. At 1.9% in the last quarter of 2023, the non-performing debt ratio is at the same level as the European average.

The HCSF decided to increase the level of the reserves that banks could draw on in the event of financial risks materialising, having noted that macro-financial vulnerabilities had increased, that credit remained

buoyant and that the gross debt of households and businesses appeared high (Haut Conseil de Stabilité Financière, 2022[16]). In December 2022, it decided to raise the rate of the credit protection reserve (the countercyclical capital buffer - CCyB) to 1.0% with effect from January 2024.

Fiscal consolidation must be intensified to reduce public debt

Public finances have deteriorated following the COVID-19 pandemic

The fiscal deficit worsened significantly in the wake of the COVID-19 pandemic due to a fall in revenue linked to the decline in activity and an increase in spending linked to measures to support the economy (Table 2.4). From 2021, the upturn in activity led to an improvement in public finances, but the fiscal balance remained in serious deficit.

At the end of 2023, public debt under the Maastricht definition reached 109.7% of GDP, down from 114.9% in 2020 but well above its 98.0% in end-2019. In addition, the cost of debt, which had fallen sharply over the previous decade, increased as interest rates rose. Net interest expenditures by general government rose by half a percentage point in 2022 to reach 1.9% of GDP.

Over the course of 2023, as inflationary pressures gradually eased, the government ended most of its support measures (Table 2.2) and announced that the price shield capping electricity prices would end in February 2025. This was a welcome decision, as it is essential that efforts to reduce the public deficit are not delayed. Future shocks similar to those experienced in the past two years will again warrant targeted responses to support households and firms most at risk, rather than broader measures such as VAT rate cuts.

The budget deficit is projected by the OECD to be reduced by 2025 (Figure 2.12, Panel A), but public debt is set to rise (Figure 2.12, Panel B). The government projects a faster reduction in the budget deficit, to 5.1% of GDP in 2024 and 4.1% in 2025, along with a milder increase in public debt, which is expected to total 112.0% in 2027. The end of support measures put in place to address the pandemic are set to help contain public spending in 2023 and 2024. They still amounted to almost 15 billion euros in 2022 (0.6% of GDP), corresponding mainly to the increase in health spending.

The fiscal stance was expansionary in 2023 and is projected by the OECD to remain so until 2025, under the assumption of a fiscal consolidation of 1.6% of GDP over two years, essentially through a reduction of public spending. This moderate pace of consolidation would be appropriate in the short run in the context of a GDP that is projected to remain below potential through 2025, with growth exceeding potential growth only in 2025.

France's fiscal policy is bound by the Stability and Growth Pact (SGP) adopted by the European Union and its Member States, which is due to be reformed in 2024. One aim of the reform is to make better use of Member States' structural reform and investment efforts and improve the implementation of European budgetary rules (European Council, 2023[17]).

Figure 2.12. Public debt is high and is being pushed higher by a large public deficit

A. Public deficit

B. Gross debt (Maastricht definition)
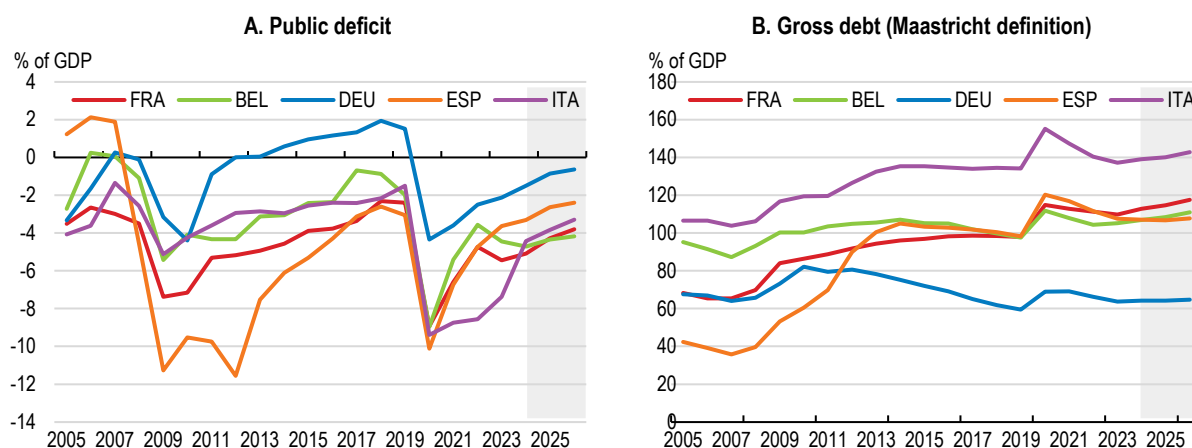
Source: OECD Economic Outlook database.

Table 2.4. Key fiscal indicators

As a percentage of GDP

	2017	2018	2019	2020	2021	2022	2023	2024¹	2025¹
Spending and revenue									
Total expenditure	57.6	56.3	55.3	61.7	59.5	58.4	56.9	56.5	55.4
Total revenue	54.2	54.0	52.9	52.8	52.9	53.7	51.4	51.4	51.1
Total revenue excluding European funding as from 2021	54.1	53.8	52.8	52.8	52.8	53.7	51.4	51.1	51.2
Net interest payments	1.7	1.7	1.5	1.3	1.4	1.9	1.6	1.6	1.7
Budget balance									
Fiscal balance	-3.4	-2.3	-2.4	-8.9	-6.6	-4.7	-5.4	-5.1	-4.3
Primary fiscal balance	-1.6	-0.6	-0.9	-7.7	-5.2	-2.9	-3.9	-3.5	-2.5
Cyclically adjusted fiscal balance	-4.1	-3.3	-3.9	-3.9	-5.4	-4.3	-4.9	-4.4	-3.8
Underlying fiscal balance²	-4.0	-3.1	-2.9	-3.9	-5.7	-4.6	-5.2	-4.6	-3.9
Underlying primary fiscal balance²	-2.2	-1.3	-1.4	-2.7	-4.4	-2.7	-3.7	-3.0	-2.2
Public debt									
Gross debt (Maastricht definition)	98.6	98.4	98.0	114.9	112.8	111.3	109.7	112.8	114.7
Net debt	77.4	76.5	76.2	90.6	83.9	68.5	72.8	75.8	77.7

1. Projections.
2. As a percentage of potential GDP. The underlying balances are adjusted for the cycle and for one-offs. For more details, see *OECD Economic Outlook Sources and Methods*.
Source: OECD (2024), OECD Economic Outlook: Statistics and Projections (database) and updates.

In the medium term, public spending should be reduced and made more efficient

According to OECD projections, more significant fiscal consolidation efforts will be required to stabilise France's public debt in the medium and long run (Figure 2.13). Under the assumption of a reduction in the primary deficit from -3.9% of GDP in 2023 to -0.5% in 2030 and kept at that level thereafter, the debt-to-GDP ratio will rise to 150% of GDP in 2060 (Maastricht definition) and could rise to close to 170% of GDP

if the rise in interest rates proves greater than initially projected. The government plans to reach a primary deficit of -0.3% of GDP in 2027, which would put its debt on a sustainable path in the long term.

Population ageing is expected to put upward pressure on public spending in the coming years though higher pension, health care and long-term care expenditure. Offsetting this phenomenon by cutting spending in these areas would lead to a substantially lower public debt trajectory. Implementing other reforms recommended in this Survey would reduce public debt further. That said, these simulations remain shrouded in uncertainty and are provided for illustrative purposes only.

Figure 2.13. Putting debt on a sustainable path requires structural reforms

Gross government debt, simulations as a % of GDP, Maastricht definition
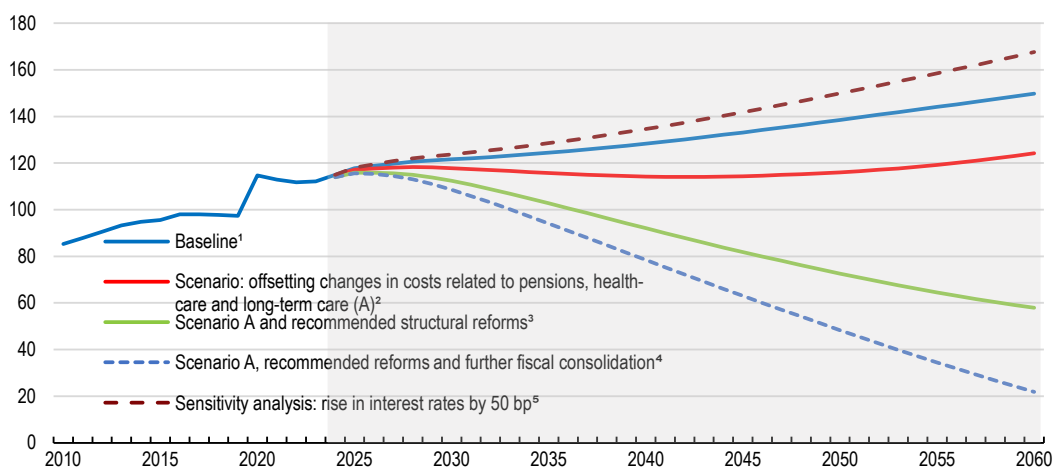
1. The assumptions are taken from the OECD EO114 projections until 2025 and from the long-term model described in Guillemette and Turner (2021) thereafter. They include nominal GDP growth of 3.2% and an average apparent interest rate of 3.9% by 2060. The primary deficit is expected to narrow gradually to -0.5% of GDP in 2030 and to remain at that level thereafter.
2. This scenario includes a compensation of the costs of ageing related to pensions, health care and long-term care as described in European Commission 2021 Ageing report (2021c). The assumptions regarding the impact of the 2023 pension reform are based on the report "Évolutions et perspectives des retraites en France" published in June 2023 by the Conseil d'Orientation des Retraites. The reform is supposed to gradually reduce public spending by up to 0.2% of GDP in 2030 and then to gradually increase it by up to 0.2% in 2070.
3. The "OECD-recommended reforms" scenario adds the estimated effects of the reforms recommended in this Survey (Box 3.1). This scenario assumes a rise of 2.3% in structural GDP by 2033.
4. Further fiscal consolidation would lift the primary deficit by one percentage point of GDP by 2029.
5. Compared to the assumptions in the baseline, the rate is 50 basis points higher in 2025 and remains stable thereafter.
Source: Adapted from OECD (2023), OECD Economic Outlook: Statistics and Projections (database); and European Commission (2021), "The 2021 Ageing Report: Economic and budgetary projections for the EU Member States (2019-2070)" Directorate-General for Economic and Financial Affairs.

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France has the highest public expenditure relative to GDP of all OECD countries (Figure 2.14). Public spending is above the OECD average in all headline items, with the exception of education (Table 2.5). Effective fiscal consolidation will involve improvements to spending efficiency, particularly with regard to spending by local governments and tax expenditures, while altering the trajectory of the government's wage bill. Short-term economic conditions will also need to be taken into account to help determine the appropriate pace of adjustment. Pension spending will need to be compatible with a reduction in public debt. Reducing spending will free up funds in education, the digitalisation of the economy and other measures to boost potential growth, as well as to finance the environmental transition (Chapters 3, 4 and 5).

Figure 2.14. France has the highest public expenditure of OECD countries relative to GDP

General government expenditures as a percentage of GDP
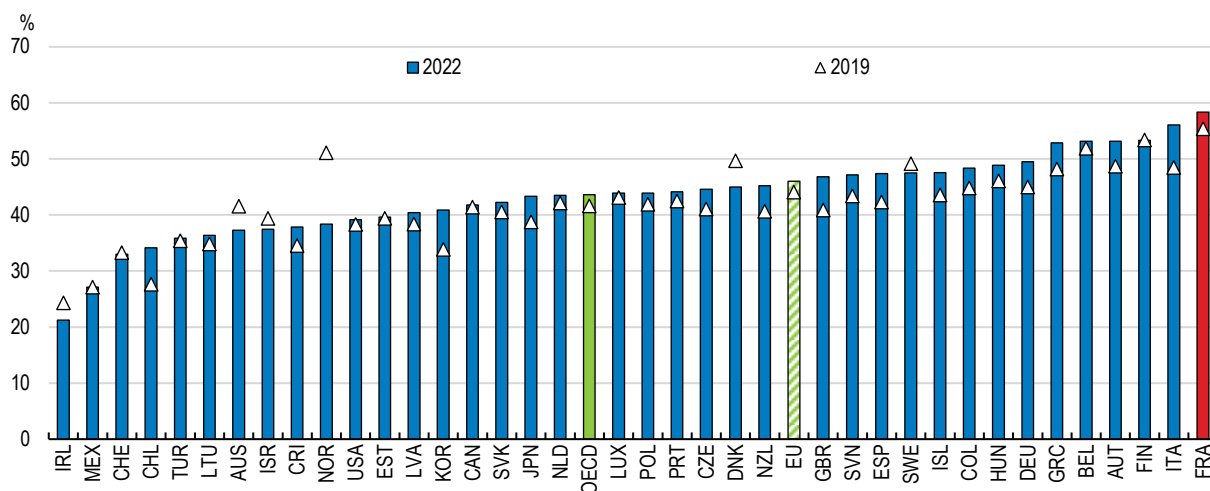
Note: OECD and EU are unweighted averages of countries with available data. Data for Colombia, the Netherlands, Türkiye and Chile are for 2021 rather than 2022.
Source: National Accounts at a Glance (database).

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Table 2.5. Composition of public spending by main component

2019

	France	Germany	Euro Area[1]	OECD[1]	France vs Euro Area (difference)	
	% of GDP	% of GDP	% of GDP	% of GDP	% points	Share in total difference (%)
Total public spending	55.4	45.0	43.5	42.1	11.9	100
Primary spending	53.8	44.1				
Compensation of employees	12.2	7.9	10.7	10.4	1.5	12
Investment	3.8	2.4	3.6	3.6	0.2	2
Education	5.2	4.4	4.9	5.3	0.4	3
Housing and collective equipment	1.1	0.4	0.6	0.6	0.5	4
Social expenditures	30.7	25.6	22.5	20.1	8.3	70
Pension	13.9	10.4	10.1	8.2	3.8	32
Health	8.5	8.3	5.8	5.8	2.8	23
Family	2.7	2.4	2.3	2.1	0.4	3
Active labour market policies	0.7	0.6	0.6	0.6	0.1	1
Unemployment	1.5	0.8	0.7	0.6	0.8	7
Housing	0.7	0.5	0.2	0.3	0.4	4

1. Non-weighted averages of available data.
Source: Annual National accounts, Government expenditure by function (COFOG) (OECD database); OECD Social Expenditure Database (SOCX).

Efforts to improve the efficiency of public spending have already been initiated and must continue. Progress has been made in modernising, digitalising and simplifying public administrations as part of the Action Publique 2022 programme launched in 2017. Since 2018, an Interministerial Committee for Public Transformation (CITP) has been meeting to decide on and monitor the implementation of public transformation measures (Ministère de l'Economie, des Finances et de la Relance, 2021[18]).

Drawing on the spending review carried out in the first half of 2023 (Ministère de l'économie, des finances et de la souveraineté industrielle et numérique, 2023[19]), the government identified a number of priorities for reducing public spending by around EUR 10 billion (0.4% of GDP) per year between 2024 and 2027. This includes reducing health spending, particularly in terms of sick pay and drug reimbursements, refocusing the Prêt à Taux Zéro (zero interest loan) scheme and the Pinel scheme to support rental investment, scaling back employment support measures during periods of falling unemployment, lowering the State's share of training costs, tightening the budgetary control of State operators and gradually phasing out tax concessions on fuel. In early 2024, the Government announced a further EUR 10 billion reduction in public spending. Savings of EUR 5 billion will be made on the operating expenses of all ministries, and of EUR 1 billion on each of public development aid, the MaPrimRenov' system and the expenses of State operators. In April 2024, additional savings of EUR 10 billion have been announced, the details of which remain to be defined. However, further efforts to reduce public spending and improve its efficiency will be needed to significantly reduce public debt. First and foremost, the proposals arising from the spending reviews should be fully implemented. For example, abolishing the intermediate VAT rate of 10% for work on residential property and extending of the Supplément de Loyer de Solidarité (additional rent), both recommended in the conclusions of the first annual spending review, correspond to recommendations already made by the OECD and should be implemented as soon as possible (OECD, 2021[20]).

Streamlining management of local government

The organisation of local government can be made more efficient. The accumulation of levels of administration creates complexity and overlaps, and the division of responsibilities between various players, including central government, is not always clear (Cour des comptes, 2022[21]). The responsibilities assigned to different administrations should be clarified and justified by clearly defined principles in order to ensure wider acceptance (OECD, 2019[22]). The 2022 "3DS" Act (differentiation, decentralisation, deconcentration and simplification) is designed to give sub-central governments more scope for action, strengthen their powers, improve their cooperation with State services and simplify access to local services for the general public. These clarification and modernisation efforts should be continued.

Mergers of small municipalities allow for economies of scale and should be developed. The number of municipalities per inhabitant in France is well above the OECD average (Figure 2.15). Since the 2015 NOTRe Act, every municipality must belong to a public establishment for inter-municipal cooperation (EPCI). However, these structures suffer from unclear governance, funding and objectives. As a result, the economies of scale that could be achieved are not obvious. The increase in expenditure and staffing levels at EPCIs over the years has not been matched by reduced expenditure and staffing levels in municipalities (Cour des comptes, 2022[21]). The 2019 Gatel Act created the possibility, which is still not widely used, of grouping municipalities together in a "community-municipality" with the status of both a municipality and an EPCI. These "community-municipalities" could be a useful way of clarifying and simplifying the governance and financing of groups of municipalities (Cour des comptes, 2022[23]).

Figure 2.15. French municipalities are fragmented

Average number of municipalities per 100,000 inhabitants, 2020
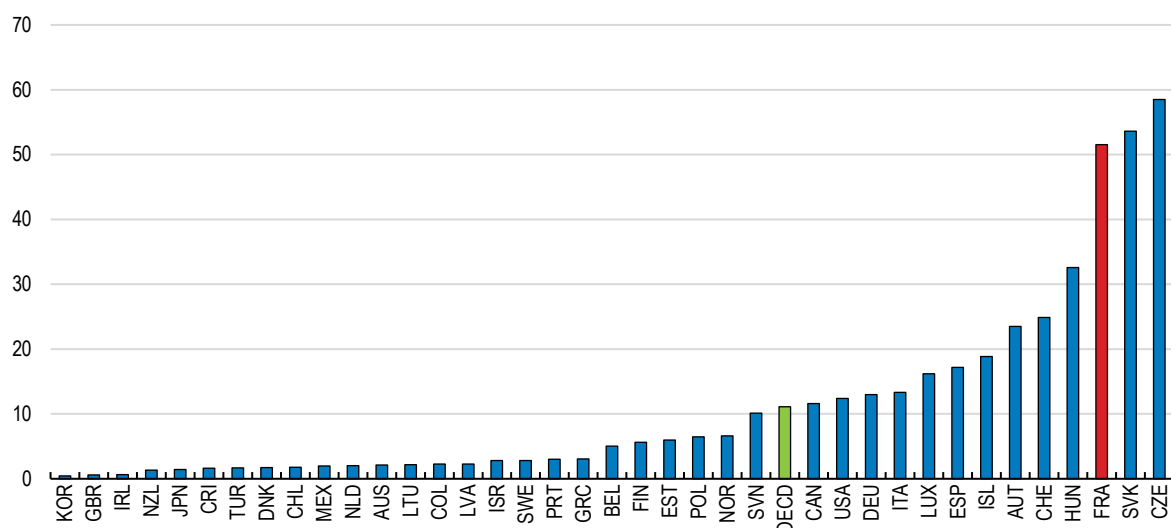
Source: OECD (2023), OECD Cities statistics (database).

Improving the efficiency of the social protection system

As a share of GDP, spending on social protection, housing and community amenities in France is the highest in the OECD (OECD, 2023[24]). France is also one of the countries with the highest levels of redistribution and, while income inequality is higher in France than in the OECD as a whole before redistribution, it is lower after redistribution (Figure 2.16). Redistribution is also efficient in terms of combating relative poverty, with France's poverty rate at 8.5% against 11.5% on average in the OECD in 2019 (share of people earning less than half of the median disposable income). However, there is still room to strengthen the French social protection system. Improvements can be made to labour market policy (Chapter 3).

Welfare programmes are scattered, making it difficult for potential beneficiaries to identify the benefits available to them. A national consultation exercise was carried out by the Government in 2019 to prepare a systemic reform of minimum income programmes (Revenu Universel d'Activité). The aim of the project was to design a single scheme merging social benefits such as the Revenu de Solidarité Active (minimum income benefit), the prime d'activité (in-work benefit) and the Aide Personnalisée au Logement (housing benefit). While designing an efficient single benefit scheme can be complex, as shown by the experience of the United Kingdom which introduced in 2018 a Universal Credit (OECD, 2019[25]), implementing such a reform would be welcome, as harmonising the calculation bases and unifying request procedures would help reduce non take-up and limit the cost of managing social benefits.

Housing policy could be more targeted at the poorest households, as three quarters of the population are theoretically eligible for social housing (Cour des Comptes, 2023[26]). Also, the annual turnover rate of social housing is low (8.0% in 2022). Setting rent supplements based on income and the duration of the tenancy, and adjusting rents according to the perceived quality of the dwelling would make access to social housing more equal between households with similar incomes.

Figure 2.16. Taxes and transfers significantly reduce income inequalities

Household income inequality (18-65 years of age), 2021
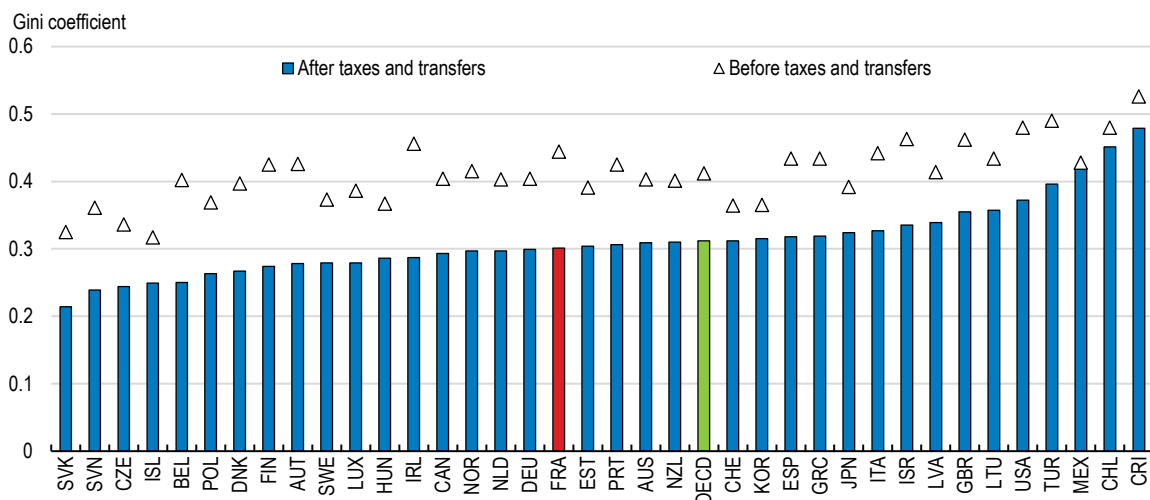
Note: The latest data refer to 2021 for all countries except Chile (2022); Australia, Germany, Israel, Mexico, New Zealand, Switzerland and Turkey (2020); Denmark (2019); Japan (2018); and Iceland (2017).
Source: OECD Income Distribution (database).

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Reducing the health care system deficit

The financing of health care spending is not balanced. The basic general social security scheme, which covers 90% of the population and is financed by compulsory contributions and related taxes, is organised into five branches corresponding to the various benefits provided (health, family, occupational injuries and diseases, retirement, autonomy) and a branch responsible for collecting contributions. In 2023, the health branch is expected to account for the bulk of the basic social security scheme's deficit. Moreover, the government scenario for the years 2023-2027 is concerning, as the deficit of the health branch expected to be EUR 9.6 billion in 2027, compared with EUR 9.5 billion in 2023, despite a reduction in spending targets (French government, 2023[27]).

The costs of managing the health system can be reduced, with administration costs accounting for a large share of spending (Figure 2.17). For instance, maternity leave is financed by the health branch of the social security system, while paternity leave is financed by the family branch. It would be more efficient to move towards joint management by the family branch (Cour des Comptes, 2023[28]). Improved and more widespread use of information systems can lead to more efficient health spending. Digital prescriptions and medical invoices, which practitioners are required to adopt by end-2024, would help combat over-invoicing of services if fully implemented and backed by automatic inspections (Cour des Comptes, 2023[28]). Medium-term financial planning is useful for establishing priorities in public health spending. However, under French law it is conducted for information purposes only, whereas other countries use planning to establish binding budget allocations (Finland, Iceland, Italy, Latvia) or to set compulsory ceilings (Greece, Israel, Netherlands) (OECD, 2023[24]). The mechanism adopted by France provides greater flexibility but does not impose strong spending constraints.

Efforts to reduce spending on pharmaceuticals are underway and should be continued. Expenditure on retail pharmaceuticals per capita was 14% above the OECD average in 2021 and France is the OECD country where the share of pharmaceuticals financed by government or compulsory insurance schemes is the highest, at 83% in 2021 against 56% on average across OECD countries (OECD, 2023[29]). This

situation is in part due to national policies, such as full reimbursement for long-term illnesses and a recent focus on developing outpatient care. Restraining pharmaceutical expenditure is one of the governments' priorities to reduce public spending (see above). The 2024 social security law aims to save more than EUR 1.5 billion on medication and medical devices while doubling the co-payments for reimbursed services, including medication.

Figure 2.17. Administrative expenditure accounts for a large proportion of health spending

Governance and Health System and Financing Administration as a % of health spending, 2021
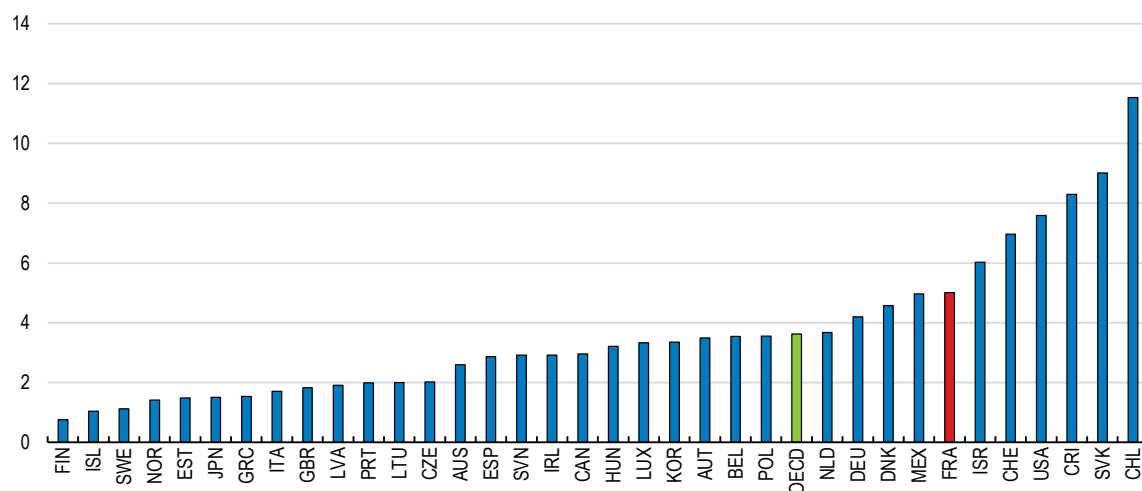
Note: The latest data refer to 2021 for all countries except Australia, Israel and Japan (2020). More information on the methodology can be found in: A System of Health Accounts 2011: Revised edition (oecd-ilibrary.org).
Source: OECD Health Statistics

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Balancing the financing of pensions

Population ageing implies, all else equal, an increase in pension expenditure. Against this backdrop, a significant reform was undertaken in 2023 to ensure the sustainability of the pension system (Box 2.3). This is a welcome change. Prior to the reform, the statutory early retirement age was 62. Following the reform, it has been set at 64, which corresponds to the average early retirement age in the OECD for people entering the labour market, taking into account reforms implemented in other countries (Figure 2.18).

In January 2023, the government predicted that the reform would enable a return to balance in pension funding by 2030 (Ministère du travail, 2023[30]). Without the reform, the deficit would have risen to 13.5 billion euros, or 0.5% of GDP. These forecasts were updated in June 2023 by the Conseil d'Orientation des Retraites (COR), the independent body responsible for analysing pension system issues, which brings together members of parliament, representatives of social partners, experts and government representatives. The COR forecasts that, despite the reform, the pension system deficit will reach 0.2% of GDP in 2030, rising to 0.8% of GDP in 2070 (Conseil d'Orientation des Retraites, 2023[31]). Furthermore, in January 2023, the Haut Conseil des Finances Publiques (HCPF - High Council of Public Finances), the official body responsible for independently assessing the overall trend in public finances, ruled that pension reform alone would not be sufficient to ensure "a return to levels of public debt that would give France sufficient room for manoeuvre", particularly to meet the investment needs to address climate change (Haut Conseil des Finances Publiques, 2023[32]).

It will therefore be necessary to keep a close eye on the impact of the 2023 reform. In this regard, the Comité de Suivi des Retraites (Pensions Monitoring Committee) is tasked with submitting a report to Parliament before October 2027 assessing its effects. Also, even if the extension of the statutory retirement

age introduced by the 2023 reform is welcome, the *2021 Economic Survey of France* nevertheless recommended introducing an increase in line with life expectancy, as is the case in several OECD countries such as Denmark, Estonia, Finland, Italy, the Netherlands, Portugal and Sweden (OECD, 2021[33]).

Figure 2.18. The minimum retirement age was low before the reform

Current and future early retirement ages for a man after a full career starting at age 22
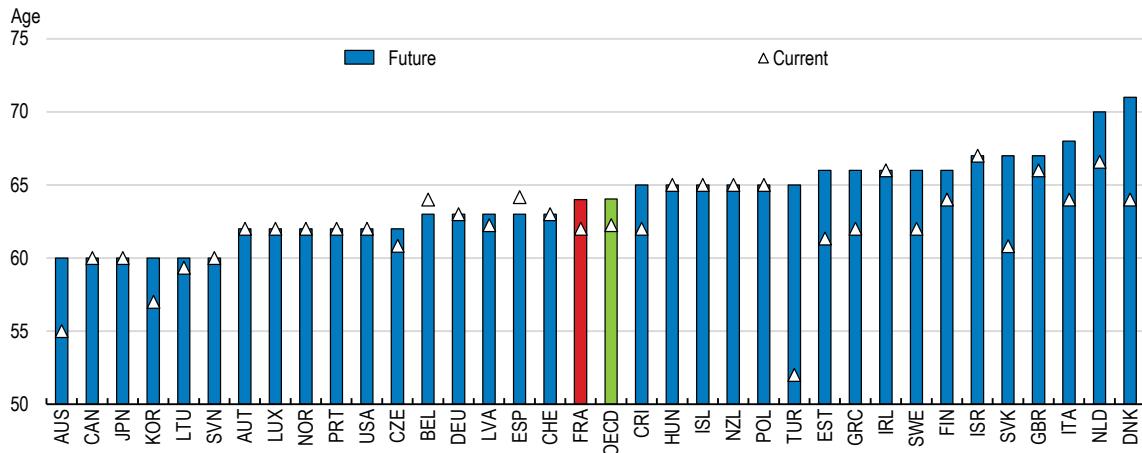
Note: Current and future refer to retiring 2022 and entering the labour market in 2022, respectively. Chile, Colombia and Mexico are not included as early retirement is possible at any age subject to reaching a minimum benefit level.
Source: OECD Pensions at a Glance Database.

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One of the desired effects of the reform is an increase in the employment rate, due to the extension of the retirement age. The French National Institute of Statistics and Economic Studies (INSEE) predicts that the reform will increase the working population by close to 700,000 by 2030. However, the distribution of this extra workforce between employment and unemployment remains uncertain. To maximise the impact of the reform on employment, it will be important to strengthen policies to support the employment of older workers. Encouraging training for people in the middle and end of their careers, particularly in digital skills, is crucial to boosting the employment of older people (OECD/Generation: You Employed, Inc., 2023[34]). In addition, age discrimination in recruitment must be tackled and barriers to the employment of older workers must be reduced as far as possible. In particular, this means restricting the impact of tenure on pay and strengthening the link between pay and skills and productivity. In Japan, for example, the government provides subsidies to help small and medium-sized enterprises integrate incorporate worker performance and ability into their wage and personnel systems (OECD, 2019[35]).

France has 42 different pension regimes, so abolishing the main special pension regimes for new entrants brought about by the reform is a welcome step. The fact that there are several different systems makes it more difficult to implement fair rules and forecast future pension expenditure. In addition, the specific rules governing special regimes have had a detrimental effect on the employment of older people in recent years. Alongside early retirement for long careers, they are one of the reasons why, in 2020, 29% of people aged 61 were already receiving a pension despite an official minimum retirement age of 62 (Boulhol, 2023[36]). Furthermore, the problems workers face in predicting their pension entitlements under the different regimes can act as a brake on labour mobility (Boulhol, 2019[37]).

Ultimately, setting up a unified pension system remains the best solution in terms of predictable expenditure, transparent information, and equity between citizens (Boulhol, 2019[37]). A draft reform was presented in 2019 that recommended introducing a universal points-based pension system (Delevoye, 2019[38]). This approach remains an interesting possibility for future developments. Under such a reform, it would be important to define clear rules for changes in pension points, taking into consideration future demographic trends.

Box 2.3. The 2023 pension reform

The pension reform entered into force on 1 September 2023. The reform's flagship measure is the gradual increase in the statutory retirement age from 62 to 64 at a rate of three months per year for people born from 1 September 1961 onwards. As such, it will reach 64 for people born in 1968 and thereafter. The retirement age is maintained at 62 for workers who can prove that they are unfit or disabled. As before, disabled workers will be able to retire from the age of 55. Specific provisions have been introduced for long careers: people who started work at 16, 18, 20 or 21 will be able to retire at 58, 60, 62 or 63.

Provisions have been introduced to encourage people to combine work and retirement: the conditions for accessing the phased retirement scheme, which allows employees at the end of their career to work part-time while receiving part of their pension, have been made more flexible. The scheme has been extended to all affiliates, and it is now possible for people who are combining work and retirement to acquire pension rights.

The contribution period required to qualify for a full pension will be increased from 42 years to 43 years in 2027, starting with the generation born in 1965. Before the reform the increase the contribution period to 43 years was planned to occur by 2035, starting with the 1973 generation. For those who would not have been able to contribute for 43 years, the retirement age for entitlement to a full pension remains 67.

The main special pension regimes (Banque de France, RATP, IEG, CESE, notary clerks and employees) will be abolished for employees recruited from 1 September 2023. Some special regimes have been retained due to the specific hardships of the professions concerned (seafarers, employees of the Paris Opera and the Comédie française). The autonomous schemes for liberal professions and lawyers, which are financed separately, have also been maintained.

The minimum pension has been increased by 100 euros per month and will now be indexed to changes in the minimum wage (SMIC), with the aim of guaranteeing a total gross pension equivalent to 85% of the net minimum wage for a person with a full career of contributions at the minimum wage and working full time.

The reform also introduces new rights targeted at families. These include survivors' pension for orphans, a contribution bonus for certain mothers, better inclusion of parental leave in the calculation of the minimum pension and in eligibility for early retirement for long careers, creation of an old-age insurance scheme for the parents of children with disabilities and the extension of certain rights to liberal professions.

Targeting tax exemptions more effectively

Tax expenditures could be reviewed with regard to their efficiency and their impact on the redistribution of income. In 2022, there were 467 tax expenditure items, representing EUR 85.6 billion (3.2% of GDP). By 2024, 60 of them are set to be abolished, and the total tax expenditure is to be reduced to EUR 78.7 billion (Ministère de l'économie, des finances et de la souveraineté industrielle et numérique, 2024[39]). However, efforts to overhaul tax expenditure could be even more ambitious. High saving rates would justify removing some tax breaks on saving flows (OECD, 2021[33]). There are a large number of reduced VAT rates and the associated loss of tax revenues represents around EUR 10 billion, including EUR 1.5 billion for the reduced rate applied to the catering sector (Central Government scope) and over EUR 2 billion for the reduced rate for work on residential property not related to energy efficiency. The abolition of the latter measure is one of the proposals in the spending review carried out in 2023. The impact of reduced VAT rates on activity and employment is debatable, and they do not always benefit the poorest households

(Ecalle, 2018[40]). The main beneficiaries of these reduced rates are the companies in the sectors concerned (Benzarti and Carloni, 2019[41]).

Reducing high taxation, particularly on labour

Taxation on labour remains high despite the successive measures to ease the burden on low income earners and the reforms of in-work benefits ("Prime d'Activité") and personal income taxation, which have reduced the tax burden of the lowest paid workers (Sicsic and Vermersch, 2021[42]) (OCDE, 2023[43]). France has the fourth highest tax wedge (income tax and social security contributions as a percentage of the labour costs) in the OECD, at 47.0%, compared with an OECD average of 34.6%. It also has the highest social security contributions paid by employers of all OECD countries, at 26.7% of labour costs. Further efforts to reduce taxation on labour would make businesses more cost competitive.

Some business taxes with distortive effects could also be eliminated (Martin and Trannoy, 2019[44]), (Martin and Paris, 2020[45]). For instance, the social solidarity contribution (C3S), based on revenue regardless of profits, makes businesses more vulnerable in times of crisis.

At the same time, to avoid jeopardising the necessary consolidation of public finances, taxation could be rebalanced by shifting tax bases from labour taxes towards other levies, especially broad-based and non-distortive taxes and environmental taxes. Raising environmental taxes would notably imply accelerating the phasing-out of fossil fuel subsidies, reduced rates and exemptions on fossil-fuel taxes (Chapter 4). The government has tasked two economists, Antoine Bozio and Etienne Wasmer, to look into "the articulation between wages, the cost of labour and the prime d'activité and its effect on employment, the level of wages and economic activity". This should help guide future policy reforms in this area.

The French government has reported a EUR 50 billion reduction in mandatory levies between 2017 and 2022, split equally between households and businesses. Income tax was lowered and the property tax on primary residences was eliminated. The French authorities also plan to reduce the tax-to-GDP ratio by one percentage point from 2022 to 2027, mainly by eliminating a tax on business ("Cotisation sur la Valeur Ajoutée des Entreprises"). Despite these changes, France will continue to have one of the highest tax rates among OECD countries (Figure 2.19). Taxation could be further reduced once public finances are balanced.

Figure 2.19. Taxation is high

Taxes as a percentage of GDP
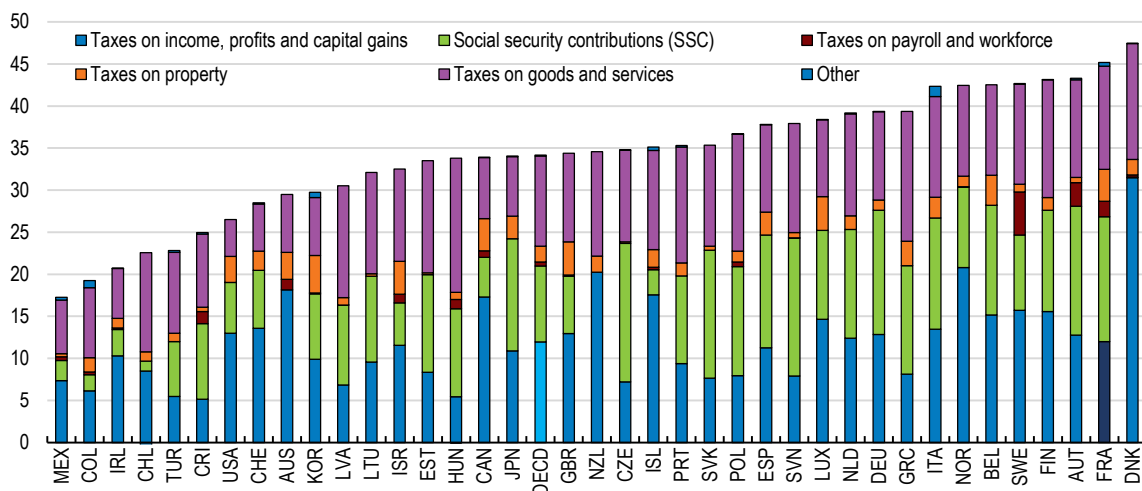
Source: OECD Global revenue statistics database.

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The governance of public finances over the medium to long term can be improved

Spending reviews are a particularly useful tool for identifying measures and structural reforms to improve the efficiency of public action. The OECD recommends implementing these reviews and has published a guide on best practices in this area (Tryggvadottir, 2022[46]). France drew on the OECD's recommendations and introduced annual spending reviews in 2023 to identify and document sources of savings needed to keep public finances on track ahead of the vote on annual draft budgets. These reviews consist of broad evaluations of public action, covering the resources allocated to administrations, subsidies paid to other entities, and tax exemptions. The first round built upon the findings of 12 thematic missions covering areas such housing and employment policies, apprenticeships and environmental taxation. To prepare for the 2025 budget bill, new spending reviews were initiated in late 2023, targeting areas such as aid for businesses and medical devices. The goal was to identify EUR 12 billion in savings. The initial findings are expected in the first half of 2024. The Cour des Comptes has welcomed the introduction of these spending reviews, while nevertheless noting that past actions in this area (RGPP, MAP, Action Publique 2022) have had only a limited impact on public spending (Cour des comptes, 2022[21]). As a result, the conclusions of the spending reviews will require close monitoring, as recommended in the OECD's guide to best practice.

The Public Finance Programming Act (LPFP), first introduced in 2008, is designed to enable the medium-term management of the State budget. The Haut Conseil des Finances Publiques (HCPF - High Council of Public Finances) is responsible for identifying any substantial discrepancies between the execution of the budget and the path set out in the LPFP, which the government then has to address by presenting remedial measures. However, the targets of the five LPFPs adopted since it was first introduced have rarely been met. In this respect, the Haut Conseil des Finances Publiques has questioned the non-binding nature of the objectives of the LPFPs and their "generally optimistic and rapidly outdated assumptions" (Haut Conseil des Finances Publiques, 2023[47]).

Independent evaluations of budget sustainability over 30, 40 or 50 years, as practised in Sweden, the United States, the Netherlands and the United Kingdom, would provide a better understanding of the relevance of fiscal and budgetary decision-making (Commission pour l'avenir des finances publiques, 2021[48]). In Australia, the Parliamentary Budget Office informs the parliament, notably on long-term fiscal sustainability, by providing independent assessments. In New Zealand, the Office of the Auditor-General publishes commentaries of the Treasury's statements on the long-term fiscal position. France does not conduct any systematic assessments of long-term trends in public finances. However, the proposed reform of the European Union's economic governance framework aims to introduce this type of projections (Conseil de l'Union européenne, 2023[49]). Independent institutions could also be given responsibility for conducting these exercises to provide alternative assessments.

The State has an important role to play in reducing gender inequalities. Factoring this into budget management is essential for reducing inequalities in all areas of public action, and in particular to ensure better access to employment for women (Nicol, 2022[50]). Since 2022, France is one of the countries to have introduced gender budgeting. Nevertheless, there is still room for progress, for example in terms of publishing information on the subject, involving civil society, and developing appropriate tools and methods (OECD, 2023[24]). To go further in this direction, the French authorities can draw on the OECD's best practices for gender budgeting (OCDE, 2023[51]), which show in particular that the countries that have made the most progress in this area, such as Canada, Austria, Iceland, Spain and Sweden, all use legal advances and specifically developed methods and data.

Table 2.6. Illustrative fiscal impact of OECD-recommended reforms

Estimated change in the fiscal balance in the medium term, as a percentage of 2023 GDP

Cut further distortive business taxes (*impôts de production*)	-0.5%
Cut further taxes on labour	-0.4%
Strengthen broad-based taxes and environmental taxation	0.5%
Review tax expenditure (remove the reduced VAT rate work in dwellings not related to energy efficiency and on hotels and restaurants, remove some tax breaks on saving flows)	0.4%
Total tax measures	*0.0%*
Broad-based spending review	0.5%
Increase the efficiency of local public spending	0.2%
Reduce the public wage bill	0.2%
Reduce costs of managing the health system and streamline reimbursements	0.2%
Increase in remuneration for primary teachers and teachers in the middle of their career	-0.1%
Total spending measures	*1.0%*
Effect on the fiscal balance	*1.0%*

Note: The estimated changes in the fiscal balance are static estimates that abstract from behavioural responses that could be induced from policy changes. These estimates are reported only for illustrative purposes. The measures concerning local government - mutualisation of purchases of goods and services by public entities and local government reforms would improve the balance by EUR 4 billion. The expected cuts in health spending correspond to halving the deficit of the healthcare branch of the basic social security scheme anticipated for 2025 in the Social Security law project (PLFSS). For the fiscal benefits from streamlining tax expenditure (remove of some tax breaks on saving flows, remove the reduced VAT rates on work in dwellings not related to energy efficiency and on hotels and restaurants), estimates available in the *Évaluation des voies et moyens Tome II – Dépenses fiscales* 2024 budget draft bill are used.
Source: OECD calculations.

Table 2.7. Past OECD recommendations to boost the efficiency of public spending

Main OECD recommendations	Summary of actions taken since the 2021 Survey
Develop a strategy to stabilise and gradually lower the public debt ratio. Publish long-term debt projections based on assumptions validated by the fiscal council (HCPF - High Council of Public Finances).	Fiscal consolidation strategy outlined in the Public Finance Programming Act.
Lower gradually and significantly public spending through a medium-term consolidation strategy based on spending reviews and improved expenditure allocation.	In 2023, France introduced annual spending reviews for the first time, under the Public Finance Programming Act.
Implement a multiannual expenditure rule that encompasses the entire public sector.	The Public Finance Programming Act sets a target for changes in government spending.
Reduce tax expenditure, in particular those that do not benefit low-income households or measures that encourage excessive household saving.	60 tax expenditure measures are to be abolished between 2023 and 2024, representing a total of 7 billion euros.
Encourage a rise in the effective age of exit from the labour market, notably by increasing the minimum retirement age in line with life expectancy.	The 2023 pension reform includes a gradual increase in the statutory retirement age from 62 to 64.
Rationalise the competences of local governments.	The "3DS" Act (differentiation, decentralisation, devolution and simplification) was adopted in 2022.

Table 2.8. Main findings and recommendations (key recommendations in bold)

MAIN FINDINGS	RECOMMENDATIONS (key recommendations in bold)
Ensuring financial stability	
The commercial real estate sector has started to slow.	Closely monitor developments in the commercial real estate sector and the financial stability of the sector.
Improving the efficiency of public finances	
Public debt has increased significantly since the start of the decade. Tax expenditures are considerable and their effectiveness could be improved.	**Step-up fiscal consolidation by reducing public spending and tax expenditures and improving their efficiency.**
The tax-to-GDP ratio is one of the highest in the OECD. Taxes on labour are particularly high. Some business taxes have distortive effects.	**Once public finances are balanced, continue to lower taxes on labour and eliminate distortive business taxes. In the short term, consider a shift in tax bases towards broad-based taxes and environmental taxes.**
The Public Finance Programming Acts provide targets that were meant to strengthen the fiscal framework and curb public debt, but their effectiveness has been limited.	**Strengthen the effectiveness of recent improvements in the fiscal framework by making the public spending ceilings binding and fully implementing spending reviews.**
The accumulation of levels of administration creates overlaps. The division of responsibilities between local governments is not always clear. The high level of fragmentation of municipalities limits the possibility of developing economies of scale in local administrations.	Continue efforts to clarify and streamline the responsibilities of sub-national governments. Encourage mergers between municipalities.
Health insurance accounts for the bulk of the deficit of the compulsory basic social security schemes, and no improvement is forecast between now and 2027. The share of pharmaceuticals financed by government or compulsory insurance schemes is the highest OECD.	Develop the use of information systems to improve the efficiency of health spending, in line with the current transition towards digital prescriptions. Continue efforts to reduce spending related to reimbursements for pharmaceuticals.
Welfare programmes, including the Revenu de Solidarité Active (minimum income benefit), the prime d'activité (in-work benefit) and the Aide Personnalisée au Logement (housing benefit) are scattered, making it difficult for potential beneficiaries to identify the benefits available to them.	Harmonise and consider merging some social benefits schemes.
The 2023 pension reform is expected to increase the working population but older workers face difficulties in the labour market. The reform does not guarantee balanced pension funding. The system remains fragmented between different schemes and regimes, which makes it more difficult to implement fair rules and forecast pension expenditure.	**Strengthen policies to support older people in employment. Closely monitor the impact of the pension reform.**

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3 Boosting productivity growth and employment

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Policy action can help to revive productivity growth, which has been low over the past two decades. Business R&D spending has been consistently below the OECD average although tax support for private R&D is amongst the highest in the OECD. Building on France's dynamic innovation ecosystems and workforce with strong scientific and technical skills can help attract R&D spending from multinationals. Barriers to entry and regulations can be eased in some services sectors where they remain elevated and complex, restraining competition and innovation. The creation of a better-connected network of public employment services, coordinated by "France Travail", can help to improve the functioning of the labour market. The unemployment rate for young people remains high. Better supporting young people who are furthest away from finding employment is key and implies focusing financial support for apprenticeships on young people with low skills and difficulties transitioning into the labour market on their own. Pursuing efforts to improve the provision of early childcare services could help support the employment rate of women.

Over the past two decades, productivity growth has been low, and in most years has fallen short of developments across OECD and European countries. Growth in GDP per hour worked has trended down since 2000, falling sharply in the manufacturing sector but easing only slightly in the services sector (Figure 3.1, Panels A and B). Weak trend productivity growth has been associated with the level and matching of skills, a slow diffusion of digital technology, low R&D efficiency and high regulatory barriers (Conseil National de Productivité, 2019[1]). In particular, after 2008, the reallocation of labour and capital towards the most productive firms slowed markedly, as some regulations hindered firm entry and growth, as well as more efficient resource allocation (David, Faquet and Rachiq, 2020[2]; Libert, 2017[3]). However, the 2019 Pacte law has since eased regulations for firm creation and growth (OECD, 2019[4]).

The slowdown in productivity has worsened since the COVID-19 pandemic, but this largely reflects temporary effects, including the strong performance of employment, where the unemployment rate declined to its lowest level in 15 years over 2022. Trend employment growth has been increasingly boosting potential growth in recent years (Figure 3.1, Panels C and D). Productivity per capita was 8.5 percentage points below its pre-COVID19 trend in the second quarter or 2023 (Devulder et al., 2024[5]). The strong increase in apprenticeships and the changing composition of the workforce, as some workers with lower productivity entered the labour market, are estimated to make up around a quarter of this difference (Devulder et al., 2024[5]). However, apprenticeships may increase human capital and support productivity over the medium term. Labour hoarding in the face of an economic slowdown perceived as temporary, is estimated to have lowered productivity per capita by 1.7 percentage points. Other temporary factors, such as rising energy prices affecting production costs and activity, may also have played a role (Conseil national de productivité, 2023[6]). Productivity growth should increase as these temporary factors ease.

While employment is close to historical highs, the employment rate remains below and the unemployment rate above the OECD average, and recent policy action aims to further support people in moving into jobs. Under the law on full employment (*loi plein emploi*), the government aims to achieve full employment and increase participation in the labour market by focusing support on those who are far from employment, including recipients of the minimum-income benefit *RSA (revenu de solidarité active*), workers with disabilities and young people. This is meant to boost the ambition of the public employment services in the face of difficult challenges, including bringing the long-term unemployed and older workers into employment. As part of these measures, the government aims to improve the efficiency of the public employment service and enhance its governance. This involves overhauling its range of services through measures such as turning Pôle Emploi into "France Travail" and creating a "network for employment" designed to promote better coordination between those involved in promoting employment and access to the labour market.

France has already taken significant policy action to foster productivity growth, including related to earlier OECD recommendations (Table 3.1). Nonetheless, scope for further policy action remains notably in the areas of education (chapter 5), supporting digitalisation and innovation policies and improving regulation and refining in the anti-corruption framework to support a strong business environment. Reforms in these areas could generate a further 2.3% of GDP growth per capita after 10 years (Box 3.1). The resulting stronger growth could be made more inclusive with efforts to move more people into better jobs, including better training and ongoing efforts to promote the employment of young people and women, with improvements in early childcare to support both women in their career choices and educational outcomes of young children.

Figure 3.1. Growth in productivity and potential output have been trending down

A. GDP per hour worked: 5-year moving average growth

B. GDP per hour worked in France: 5-year moving average growth

C. Employment rate

D. Decomposition of potential GDP growth (% points)
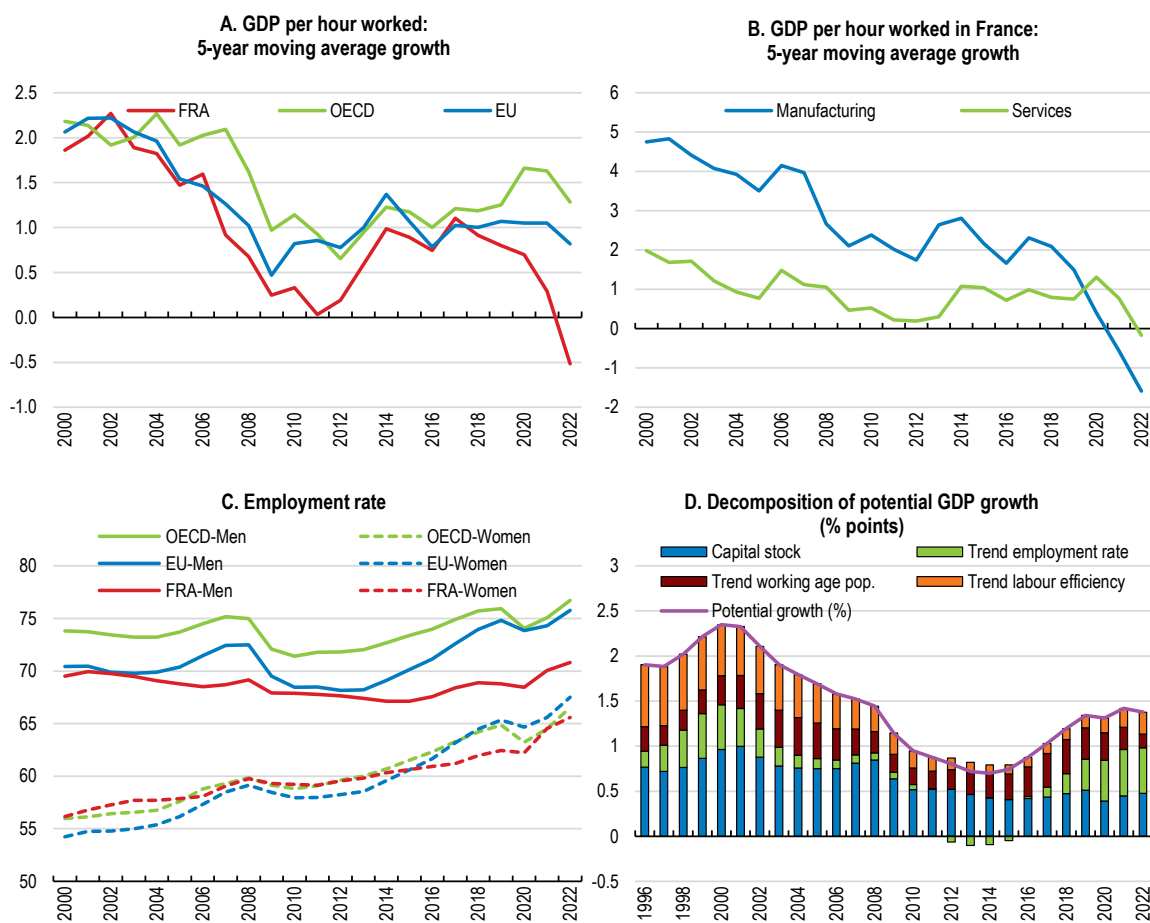
Note: Panel A: OECD is the average of 31 countries and EU of 27 countries. Services sector is business sector services excluding real estate.
Source: OECD Productivity database; OECD Labour force statistics; OECD Economic Outlook: Statistics and Projections (database)

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Table 3.1. Past OECD recommendations to boost employment and productivity

Main OECD recommendations	Summary of actions taken since the 2021 *Survey*
Allow a tax deduction for risk capital.	No action taken.
Encourage the take-up of the new, simplified preventive procedures and strengthen the capacity of commercial courts.	No action taken.
Finance a cut of the most distortive business taxes by reducing ineffective tax expenditures.	Companies' value-added contributions (CVAE) will be phased out by 2027. Sixty tax expenditures are set to be eliminated by 2024.
Provide financial support for training in digital technologies for small businesses.	France Num provides online information and free training and loans for firms with fewer than 50 employees.
Reform the financing of job seekers' support to ensure it is in line with economic conditions.	The introduction of the counter-cyclical unemployment benefit aligns the duration of benefits with the economic cycle.
Develop transparent information and effective monitoring of the quality of lifelong learning programmes through additional evaluations and counselling.	A quality certification for training bodies was implemented in 2022.
Establish local one-stop shops providing a range of activities to support human resources practices in small businesses.	The creation of the France Travail network has strengthened the connections between operators in the public employment services and is improving the support it provides to small and medium-sized businesses.
Ensure that measures to expand the youth guarantee scheme combine a financial allowance for those who need it, support to enter the labour market and streamlined procedures. Increase the share of work-based training for apprentices.	The *Contrat d'Engagement Jeune*, which replaced the youth guarantee scheme provides a monthly financial allowance of up to EUR 528 in support to enter the labour market.
Speed up the development of additional childcare services for low-income households and in the poorest neighbourhoods.	The "territory" bonus, implemented in 2020 and almost doubled since 2021, aims to encourage the creation of new facilities in disadvantaged areas. The law of 18 December 2023 on full employment includes a section on developing early childcare.

Box 3.1. These estimates assume a full and swift implementation of reforms.

The estimated impact of some of the key structural reforms proposed in this Survey is calculated using historical relationships between reforms and growth in OECD countries (Table 3.2). These estimates assume a full and swift implementation of reforms.

Table 3.2. Estimated impact of selected reforms on GDP per capita after 10 years

Policy	Scenario	Impact on GDP per capita after 10 years
More efficient tax incentives for R&D spending	Increase by 10% in business R&D spending.	0.2%
Reducing regulation, notably in the services sector	An increase in the PMR score due to involvement in business operations in services sectors and barriers to entry in service sectors easing to the average of the top 10 OECD countries	1.2%
Increasing schools' accountability	An increase in accountability to the average of the top 10 OECD countries (see box 5.2)	0.3%
Strengthening policies to support older people in employment.	An increase in the employment rate of 55–64-year-olds towards the OECD average.	0.5%
Total impact on GDP per capita		2.3%

Source: The estimate of the impact of more efficient tax incentives for R&D spending is based on B. Égert and P. Gal (2017), "The quantification of structural reforms in OECD countries: A new framework", OECD Journal: Economic Studies, Vol. 2016/1. The impact of reducing regulation is estimated using Y. Guillemette and D. Turner (2021) "The long game: Fiscal outlooks to 2060 underline need for structural reform", OECD Economic Policy Papers 29. The impact of increasing schools' accountability is estimated based on B. Egert, C de la Maisonneuve and D. Turner (2023) "Quantifying the effect of policies to promote educational performance on macroeconomic productivity", OECD Economics Department Working paper 1781.

Supporting the digital transition

While firms have increased their use of digital technologies, further progress, particularly in SMEs, would boost business productivity and support exports (Sorbe et al., 2019[7]) (Aghion et al., 2021[8]). Around 24% of large and 80% of small French firms have a very low or low digital intensity, (Figure 3.2, Panels A and B). Firms' low uptake is reflected in both basic digital technologies, such as having an online presence and receiving orders through computer networks (e-commerce) and more advanced uses, such as purchasing cloud computing.

In small businesses, a lack of training among managers and employees are a barrier to taking-up digital technologies (Figure 3.2,Panel C). Access to high-speed broadband is high and relatively widespread and France aims to roll out fibre broadband across the nation by 2025, which will help reduce geographical inequalities. By the end of 2021, around 99% of premises were eligible for high-speed broadband (above 30 Mbit/s), essentially reaching the target of *Plan France Très Haut Débit* (France's Very High-Speed Broadband Plan) to connect 100% of households by 2022. While already 68% of premises were eligible for subscribing to internet access through optical fibre, this share was only 51% in rural areas, although above 34% in the rest of Europe (France Stratégie, 2023[9]). Benefitting from funding from the Recovery and Resilience Programme (PNRR), France's 2025 ambitions appear achievable, with the implementation of public initiative areas accelerating (France Stratégie, 2023[9]). However, the envisaged funding for routine maintenance appears to be insufficient (France Stratégie, 2023[9]).

Figure 3.2. French, firms, particularly SMEs, are lagging in adopting digital technologies
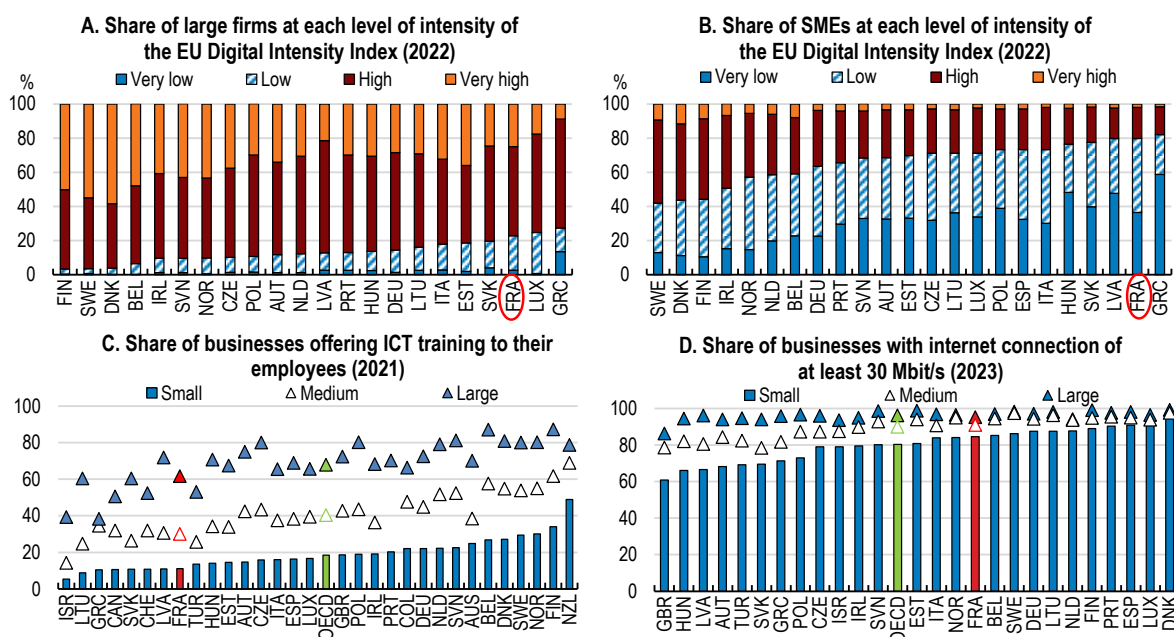
Note: Panels A and B: Businesses with 10 persons employed or more. Small enterprises have 10 to 49 persons employed, medium enterprises have 50 to 249 persons employed, and large enterprises have 250 persons employed or more. Panel C: refers to training offered over the past 12 months, and data for 2021 except for Australia (2022); Colombia, Israel, New Zealand, and Switzerland (2020); and the United Kingdom (2019). Panel D: Data for 2023, except for Australia (2022); and Israel and the United Kingdom (2020).

Source: Eurostat Database on Digital Economy and Society; OECD (2024), ICT Access and Usage by Businesses (database).

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The roll out of high-speed broadband has accelerated businesses' uptake since 2020 (Figure 3.2, Panel D). The roll out of high-speed broadband and fibre have had increasingly positive effects on the value added of firms and employment (INRAE, 2023[10]). However, 41% of firms without fibre hesitate to switch. This is largely due to the cost of such a connection, but also due to a lack of awareness about eligibility

and a lack of confidence in operators (Ifop, 2023[11]). Some firms also cite that offers are not easy to understand and there is no guarantee on the services offered (France Stratégie, 2023[9]). Improving the clarity of offers, in terms of tariffs and the services provided, as well as the indirect costs associated with installation, could support firms' uptake (France Stratégie, 2023[9]).

Strengthening R&D and innovation

Overall, France's innovation performance is strong compared to other European countries, although it has been falling in recent years (European Commission, 2023[12]). The country scores highly on environmental innovation and cooperation with innovative SMEs. Nevertheless, although France provides one of the highest levels of support for private research and development (R&D) in the OECD, both business and gross R&D spending have been consistently below the OECD averages over the past two decades (OECD, 2022[13]; 2021[14]; 2023[15]). French businesses spent around 2.2% of GDP on R&D on average between 2015 and 2021, below spending in the average OECD country of 2.5% (OECD, 2023[15]). France also lags in aspects including non-R&D innovation spending, trademark and design applications and sales of innovative products (European Commission, 2023[12]). This partly reflects the sectoral composition of the economy, where the high- and especially the medium-high technology sectors are under-represented (OECD, 2021[16]).

In 2020, the government directly financed 0.1% of GDP and provided 0.3% of GDP in indirect support through R&D tax credits, which is high in international comparison (Figure 3.3). Combined, the government financed almost 28% of business R&D spending (OECD, 2023[15]).

Figure 3.3. France offers large R&D tax incentives to firms

Direct government funding and tax support for business expenditure on R&D, 2020
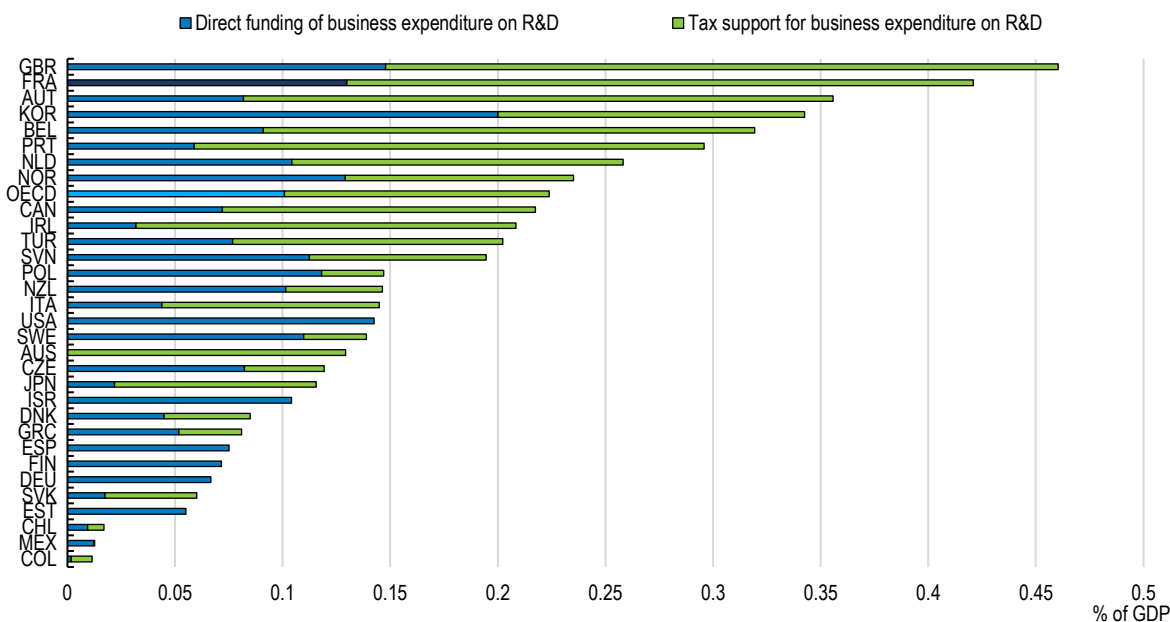
Source: OECD (2023) R&D Tax Incentive database.

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Large tax expenditure to foster private R&D could be subjected to regular evaluations, and greater targeting to SMEs could be considered to generate higher returns (CAE, 2022[17]; OECD, 2021[16]). Around 60% of support to innovation is through a volume-based tax credit (*credit d'impôt recherche*, *CIR*) of 30% for spending up to EUR 100 million, and 5% thereafter (OECD, 2021[14]; CNEPI, 2021[18]). In 2018, SMEs received 34% of the CIR and 36% went to firms with over 5 000 employees (CNEPI, 2021[18]). Several

evaluations highlight a significant impact of the CIR on very small businesses and SMEs, both in terms of R&D activities and their economic performance, but a limited effect on intermediate-sized or large firms (Bach et al., 2021[19]; CNEPI, 2021[18]; CPO, 2022[20]). For example, the number of patents varies from 1.2 and 0.8 per million euros of tax credit received for very small and SMEs compared to 0.5 for large firms (CAE, 2022[17]). While the effect of tax support for R&D has found to be stronger in SMEs than in large firms across several OECD countries, this was even more the case in France (OECD, 2020[21]). In addition, the time taken to recover the sums committed under R&D tax credit are long for small, young businesses (Kallenbach et al., 2018[22]), which tend to be more innovative. Lowering the ceiling of the CIR and increasing the subsidy rate could allow for SMEs to benefit more and increase the effectiveness of the measure on innovation and GDP growth. Such a change could bring the structure of the CIR closer to the schemes in the United Kingdom, which also have high tax incentives yet favour SMEs.

Other measures to support innovation target SMEs. The innovation tax credit, which totalled around 400 million euros in claims in 2021, supports SME's expenditure on designing prototypes and testing for new products. The status of Young Innovative Companies *(Jeunes Entreprises Innovantes, JEI)*, which provides social and fiscal benefits for startups meeting specific R&D intensity and growth criteria. Support for emerging players is another key component of the France 2030 plan, with a view to ensuring they receive at least half of the funding, which totals around EUR 54 billion euros over five years. Building on these dynamic innovation ecosystems and a workforce with strong scientific and technical skills can help attract R&D spending from multinationals.

While one goal of the research tax credit is to increase the attractiveness of France as a location for multinationals' R&D spending, its effectiveness for this purpose over the last 15 years is not clear (Lhuillery et al., 2021[23]). R&D spending by international firms has not kept pace with that of French firms and the R&D spending of these same groups globally (CNEPI, 2021[18]).

Continuing to improve regulation and fight corruption

France has overall competition-friendly product market regulations, although regulatory barriers remain in some services, potentially weighing on competitiveness and long-term growth (Figure 3.4). Since 2018, the authorities have simplified administrative and regulatory burdens and eased administrative requirements, aided by the implementation of an electronic one-stop shop for business registration. The authorities have also substantially eased barriers to entry in digital markets.

Figure 3.4. Easing the regulatory burden in services sectors would stimulate competition
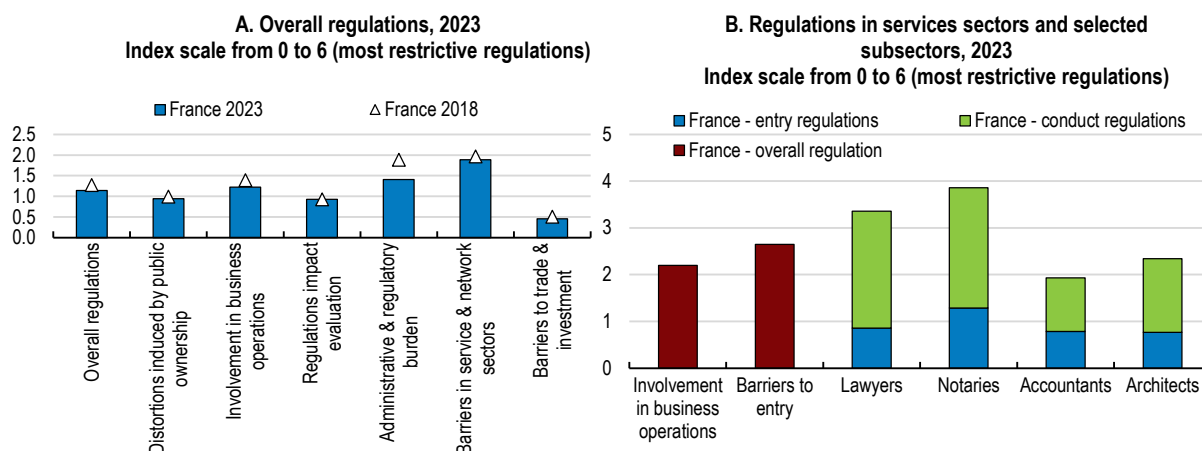
Note: Entry regulation refers to the regulations of new entrants to the profession. Conduct regulation refers to the regulation of the conduct of existing professionals.
Source: OECD (Forthcoming), Product Market Regulation indicators.

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France's most stringent regulations remain in the services sectors, which are complex and somewhat protect services firms from full competitive practices, with no simplification since 2018 (Figure 3.4, Panel B). Barriers to entry and controls on practice for architects and accountants are high, and while entry requirements for lawyers and real estate agents are more limited, controls on practice are relatively high, suggesting room for better balance between the control of quality and competition. Barriers in retail distribution and sales of medicines are also elevated, with the distribution of many over-the-counter drugs and tests still restricted to pharmacies. Easing regulations and administrative burdens could stimulate competition and innovation.

France's insolvency regime is relatively efficient compared to OECD countries, although barriers to restructuring are around the OECD average (Figure 3.5) and have increased in recent years. Easing barriers would allow a more timely exit of non-viable companies and better allocation of capital, supporting business dynamism (Adalet McGowan, Andrews and Millot, 2017[24]; Adalet McGowan and Andrews, 2018[25]; André and Demmou, 2022[26]). France introduced an indefinite length of stay on assets in restructuring, which slows asset recovery, and new financing continues to have priority over both secured and unsecured creditors in the event of restructuring, which could adversely affect the long-term availability of credit and legal certainty (Adalet McGowan and Andrews, 2018[25]; André and Demmou, 2022[26]). The number of insolvencies in France returned to its pre-pandemic trend in 2023, after government support measures helped limit the number of insolvencies during the pandemic (OECD, 2023[27]). Continuing to streamline procedures will help to free up resources for new entrants to grow.

Figure 3.5. Easing barriers to firm restructuring would further support business dynamism

Barriers to firm restructuring, 2022, zero represents no barriers
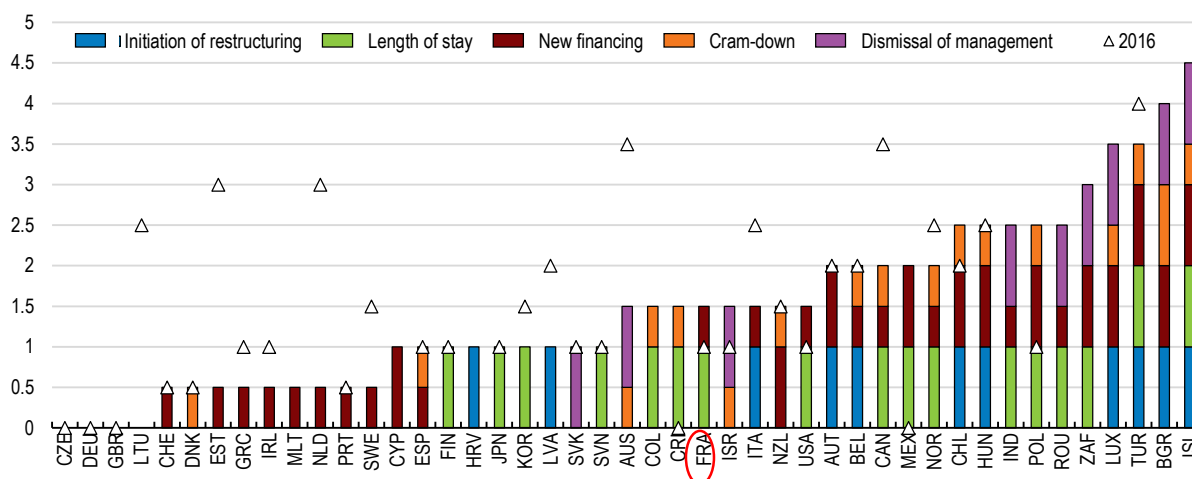
Note: The more effective the insolvency regime, the lower the value of the indicators. .
Source: André and Demmou (2022[26]).

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Effective anti-corruption frameworks support a strong business environment. Corruption and challenges in public sector integrity reduce economic efficiency, waste public resources and widen economic and social inequalities (OECD, 2017[28]). Corruption also undermines equality of opportunity and erodes trust in institutions, making the structural reforms more difficult to implement. France performs above the OECD and EU average on international indicators of domestic corruption, although below some other high-income countries, such as Germany and the United Kingdom (Figure 3.6).

Figure 3.6. Perceptions and control of corruption are above the OECD average

A. Corruption Perceptions Index
Scale: 0 (worst) to 100 (best), 2023

B. Control of corruption
Scale: -2.5 (worst) to 2.5 (best), 2022

C. Evolution of "Control of Corruption"
Scale: -2.5 (worst) to 2.5 (best), 2022

D. Corruption by sector, "Control of Corruption"
Scale: 0 (worst) to 1 (best), 2021

E. Tax transparency:
Exchange of Information on Request

F. Anti-money laundering measures
Scale: 1 (low) to 4 (high effectiveness)

Note: Panel B shows the point estimate and the margin of error. Panel D shows sector-based subcomponents of the "Control of Corruption" indicator by the Varieties of Democracy Project. Panel E summarises the overall assessment on the exchange of information in practice from peer reviews by the Global Forum on Transparency and Exchange of Information for Tax Purposes. Peer reviews assess member jurisdictions' ability to ensure the transparency of their legal entities and arrangements and to co-operate with other tax administrations in accordance with the internationally agreed standard. The figure shows results from the ongoing second round when available, otherwise first round results are displayed. Panel F shows ratings from the FATF peer reviews of each member to assess levels of implementation of the FATF Recommendations. The ratings reflect the extent to which a country's measures are effective against 11 immediate outcomes. "Investigation and prosecution[1]" refers to money laundering. "Investigation and prosecution[2]" refers to terrorist financing.

Source: Transparency International; World Bank, Worldwide Governance Indicators; Varieties of Democracy Project, V-Dem Dataset v12; OECD Secretariat's own calculation based on the materials from the Global Forum on Transparency and Exchange of Information for Tax Purposes; and OECD, Financial Action Task Force (FATF).

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Fully implementing the recommendations in the *Groupe d'États contre la corruption*'s latest evaluation would help to more effectively prevent corruption amongst persons with top executive functions and members of law enforcement agencies (GRECO, 2022[29]; 2020[30]). In particular, as recommended in the 2021 *Economic Survey*, the members of the executive, including the President of the Republic, should regularly and publicly disclose which lobbyists they have met and what they discussed (GRECO, 2022[29]; 2020[30]; OECD, 2021[16]). In 2022 the French Anti-Corruption Agency (*Agence Française Anticorruption*, AFA) was commissioned to develop a new anti-corruption plan for 2024 to 2027, following the end of the previous plan (AFA, 2023[31]). Over 2022, the AFA developed seven guides promoting good practices. This includes guides on the risks of breaches of professional ethics and concerning gifts and invitations to public officials and two on integrity for operators of sports federations and the Ministry of Sport and the Olympic and Paralympic Games (AFA, 2023[31]).

Supporting employment

In recent years, France has implemented ambitious reforms to support employment, including labour ordinances and unemployment insurance reforms aimed at streamlining the labour market and strengthening incentives for those returning to work (Box 3.2). Reforms in 2016 and 2017 aimed to reduce the uncertainty around terminating permanent contracts for both employers and employees and reduce the use of temporary contracts (OECD, 2019[4]). These reforms reduced previously high levels of employment protection, although it remains above the OECD average (OECD, 2024[32]). The share of temporary workers has declined since 2017, but at 16.2% in 2022, remains above the OECD average of 11.3% (OECD, 2024[33]). Temporary employment is particularly high for 15–24-year-olds, at 55.7% compared to 25.3% for the average OECD country. The vocational training reform, the development of apprenticeships and the significant investment in skills have all aimed to improve the employability of workers, facilitate their integration or retraining, and better match job supply to demand. The move to turn the employment competitiveness tax credit (*Crédit d'impôt compétitivité emploi*, CICE) into a permanent reduction in social contributions and build on broad reductions for low wages have sought to reduce labour costs and make it easier to hire new employees. In 2022, the unemployment rate reached its lowest level in forty years, averaging 7.3% for the year. The government will need to continue its reforms to achieve the goal of full employment.

To reach this goal, the government is reforming the governance of the public employment service by implementing a network of stakeholders to promote employment and integration. This "network for employment" *(Réseau pour Emploi)* is coordinated by a new operator, *France Travail (*formerly *Pôle Emploi)*. The network will better connect key operators and institutions through common practices and data sharing to better address jobseekers' difficulties in areas such as health, housing, childcare and mobility (Box 3.2) (Ministère du Travail du Plein Emploi et de l'Insertion, 2023[34]). Under the reform, all minimum-income RSA benefit recipients will automatically be enrolled with the employment service as of 1 January 2025 at the latest, to ensure that everyone benefits from tailored support and to address potential barriers to employment. The reforms to improve the public employment service are a welcome move, but the level of complexity of the task and the required coordination efforts will be challenging and require careful implementation. A scientific committee has been set up to assess the benefits of these reforms over the coming years to continuously improve the effectiveness of public employment services.

The *France Travail* reform also aims to improve the matching of the supply and demand for workers by developing a new range of services for businesses. This will help to better support businesses' recruitment needs, which have been particularly challenging in the current tight labour market (see Chapter 2). The goal is to reduce the length of recruitment processes and help 80% of recruiting companies find the employees they need. A survey of business leaders conducted in 2019 showed that only 49% were satisfied with quality of services provided by *Pôle Emploi* (Canevet and Kennel, 2020[35]; Ministère du Travail du Plein Emploi et de l'Insertion, 2023[34]). *France Travail* will work with stakeholders in the network for employment to target this intensified support at small and medium-size businesses, as recommended

in the 2021 Economic Survey (OECD, 2021[16]). The reform facilitates procedures for businesses by creating a single entry point for posting job vacancies and a single point of contact. It also increases support to businesses to help reduce early terminations, improve the attractiveness of employers and boost the inclusiveness of companies by raising the awareness of companies so that they hire more young, older and disabled workers. Combined with a reinforced training offer, the reforms are a welcome step to provide better guidance to businesses in search of information and support.

Box 3.2. Recent labour market reforms to address labour shortages and boost employment

Reform of the public employment service

Under the law on full employment (*loi plein-emploi*), *Pôle Emploi* became *France Travail* on 1 January 2024. The "network for employment" *(Réseau pour Emploi)* will come into force no later than 1 January 2025. In addition to the government and local authorities, the network connects three operators: the jobseeker support agency, *Pôle Emploi*, now renamed *France Travail*, local missions supporting young people and the agency supporting people with disabilities, *Cap Emploi*. It also connects other stakeholders such as social security offices (CAF). Each operator retains its responsibilities within a network of common governance and practices, shared tools and connected information systems. The *France Travail* reform will significantly improve its training and employment support, refresh its governance structure and increase its territorial coverage.

Reforms to the unemployment benefits

An unemployment insurance reform linking unemployment benefit durations to the economic cycle came into force on 1 February 2023. This reform aims to respond to shortages in workers and promote full employment by aligning benefit duration with the economic cycle, recognising differences in the trade-off between insurance and incentives at different points of the business cycle. The previous unemployment benefit duration of up to 2 years for those aged 53 and below may have played a role in the structural mismatch between the demand and supply of labour (Bénassy-Quéré, 2023[36]). Under the new rules, unemployment benefit duration is reduced by 25% whenever the unemployment rate is below 9% and increased by less than 0.8 percentage points in the past quarter, while maintaining a minimum duration of six months.

Source : Ministère du Travail du Plein Emploi et de l'Insertion (2023[34]; 2023[37]).

Stronger productivity and employment will also hinge on effectively supporting young people in improving their skills and mastering the transition into the labour market. At the same time, young people's labour market outcomes are often more impacted during economic downturns and some are still suffering from the legacy of the pandemic-related recession. While the government provides significant support to young people, in 2022, 17.3% were unemployed and 55.7% of those working were on temporary contracts, higher than the respective rates for the overall working population (Figure 3.7).

The forthcoming evaluations of the *Contrat d'Engagement Jeune*, which provides personalised guidance and financial support to under-26-year-olds struggling in the labour market, could help to improve the effectiveness and targeting of the programme. A recent study highlighted the significant positive impact of the Youth Guarantee *(Garantie Jeunes)* scheme on helping young people find work: beneficiaries had an employment rate of 54%, averaging 21% higher than those who had not benefited from the scheme. However, this impact was primarily due to fixed-term and temporary contracts (Filippucci, 2023[38]). In early 2022, France replaced its Youth Guarantee benefit with the *Contrat d'Engagement Jeune* programme, where recipients can receive a monthly allowance of up to EUR 528. Between its implementation in March 2022 and end-November 2022, the programme had contracts with around 278,000 young people (an increase of 59% compared with the Youth Guarantee scheme), and particularly with those under 21 years old and with low levels of qualifications (Conseil d'Orientation des politiques de Jeunesse, 2022[39]). A

survey conducted a few months after the programme was implemented showed a promising start but noted access-related challenges for those most at risk (Conseil d'Orientation des politiques de Jeunesse, 2022[39]). Most young people in the programme were already known to the public employment services, which may be a result of the rapid implementation of the programme. Continuing to reach out to young people on the margins of society, increasing support for the obstacles that some young people face, including accessing healthcare and housing and meeting the activity requirements, as planned in the reforms to the public employment services, and preventing breaks in payments will better support young people to transition into the labour market (Conseil d'Orientation des politiques de Jeunesse, 2022[39]). In addition, reducing the administrative burden for operators and providing the financial resources for operators to monitor young people's career paths after they join the labour market could help guarantee the long-term integration of young people (Conseil d'Orientation des politiques de Jeunesse, 2022[39]).

Figure 3.7. Young people struggle to enter the labour market

A. Unemployment rate, 2022

B. Share of temporary contracts, 2022
% of dependent employment
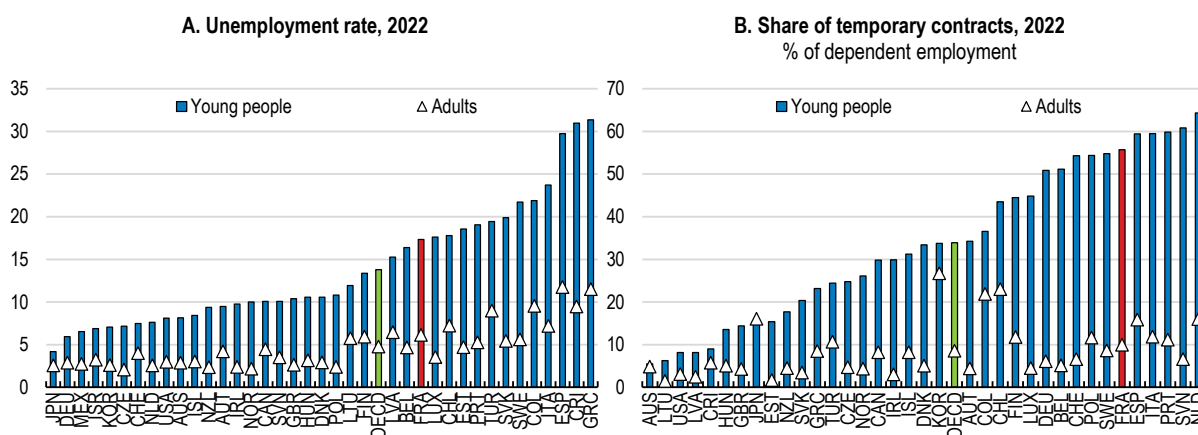
Note: Young people refers to 15- to 24-year-olds. Adults refers to 25- to 64-year-olds. Panel B: Data for Australia and the United States is from 2017.
Source: OECD Labour Force Statistics (database).

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Apprenticeships are an effective way to give young people experience in the labour market during their training, although targeting substantial support could better support labour market outcomes. In France, apprenticeships are available for those aged 16 to 29, can last for between six months to 3 years depending on the qualification and are available for both vocational and tertiary qualifications, unlike in many other countries. The government introduced additional and unprecedented support for apprenticeship schemes in 2020, which was extended into 2022. This was in addition to the existing benefits of an exemption of employee social security contributions and income tax. As a result, the number of apprenticeships increased from around 440,000 contracts at the end of 2018 to around 1,020,000 contracts at the end of 2023. Since the end of 2019, the exceptional support is estimated to have generated around 240,000 jobs by the third quarter of 2022 (Dares, 2023[40]), and 250,000 jobs by the end of 2022 (Heyer, 2023[41]). Continuing trends in employment and apprenticeships suggest that around 210,000 jobs were substituted from other forms of employment towards apprenticeship (Coquet, 2023[42]). In its final report, the France Relance Evaluation Committee estimated the introduced of the exceptional support for apprenticeships for 2020 alone created some 80,000 jobs, which would equate to around 200,000 contracts since the programme's inception, assuming a constant number of new apprentices over time (Comité d'Evaluation du Plan France Relance, 2024[43]). By 2022, tertiary graduates took up the majority of apprenticeships, whose entry into employment is already very good in a number of sectors and only marginally improved by apprenticeships (Cour des Comptes, 2022[44]). Nevertheless, the development of apprenticeships in higher education has indirect economic effects, by helping to improve the image of apprenticeships, strengthening the equality of opportunity for students who would not otherwise have been able to access

higher education without remuneration and promoting the economic development of small firms, which are able to integrate new skills. Since 1 January 2023, all businesses taking on apprentices have received financial aid set at EUR 6,000 per apprentice, irrespective of their age, up to master's level. Increasing the targeting of financial support to young people with low skills and who are the furthest away from the labour market could improve the support for those most in need whilst generating substantial fiscal savings.

The share of women participating in the labour market has steadily increased in recent decades although it remains below that of men (Figure 3.8, Panel A). Around 66% of working-age women were employed in 2022, similar to the OECD average, up from around 62% pre-pandemic. The gender employment gap narrowed to around 5 percentage points in 2022, compared to 10 percentage points for the OECD average. The increase in the employment rate of women has occurred across age cohorts, and particularly for workers above 45 years. In 2019, 35% of people in France said that gender may put a candidate at a disadvantage when a company wants to hire someone compared to 28% in the European Union (Eurostat, 2019[45]).

France has implemented numerous measures to equalise labour market outcomes, but additional efforts could accelerate progress further. The gender wage gap is around the OECD average. A full-time female worker earns almost 12% less than her male counterpart on average, increasing to 24% for a female worker in the top income decile. More women hold senior positions than the OECD average, although the share remains unequal. Almost 40% of managers in France are women, above the OECD average of 34%, and women hold around 45% of seats on boards of the largest publicly listed companies, well above the OECD average of 30%. Since 2019, France has imposed that firms with over 50 employees must publish their "Index of professional equality" (*index de l'égalité professionnelle*) annually and since 2022, and poorly performing firms must publish corrective measures and improvement targets. Since 2022, firms with over 1000 employees must publish gender representation across their senior executives and management, with a target of 30% of women and men in senior management and management bodies by 2026 and 40% by 2029. Firms will have two years to comply or be subject to financial penalties. OECD data suggests that on average France already meets these targets. Accelerating the time frame of these targets could more rapidly equalise labour market outcomes between genders. In the national administration, only 31% of women hold senior management positions compared to 42% in the average OECD country, a share that has remained broadly unchanged over the past decade.

Figure 3.8. Disparities in labour market outcomes remain between men and women

A. Labour force participation rate

B. Participation rates in early childhood education and care
0- to 2-year-olds, by equivalised disposable income tercile, 2020
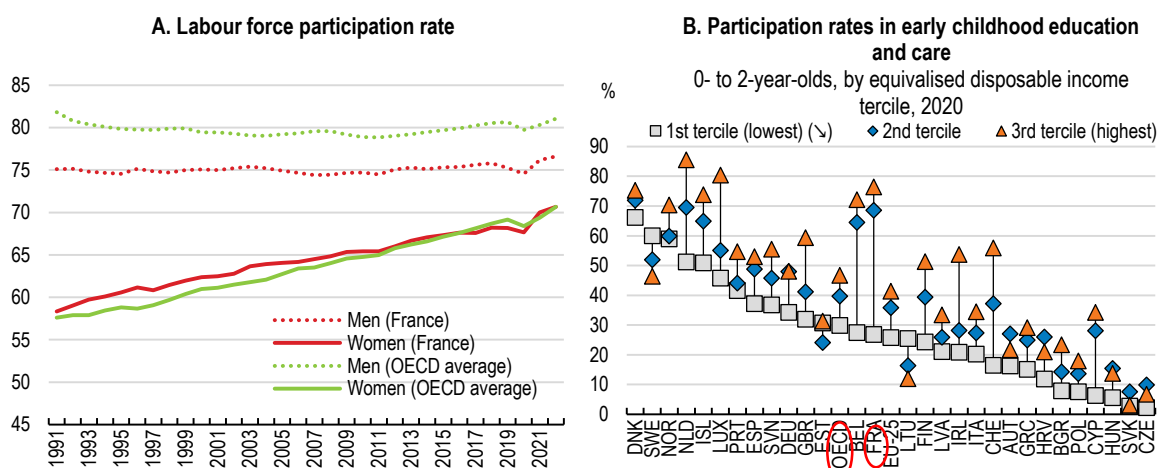
Note: Panel A: The labour force participation rate is calculated as the labour force divided by the working-age population (15-64 years old). Panel B shows the difference in median wages of men and women, relative to the median wages of men.
Source: OECD Labour Force Statistics (database); OECD Family Database.

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Further developing the provision of early childcare services, particularly for the lowest income households, could further support women's labour market outcomes as well as children's learning opportunities (see Chapter 5). Around 76% and 68% for 0–2-year-olds from families in the first and second income terciles attend formal childcare compared to 27% for 0-2 year olds from families in the bottom tercile, the largest gap across OECD countries (Figure 3.8, Panel B). The main barrier appears to be the supply of places, particularly in childcare centres, (HCFEA, 2023[46]) (HCFEA, 2023[47]) (Direction générale du Trésor, 2023[48]), while costs are below the OECD average. The government has ambitious plans to increase the capacity of childcare centres, with targets in the 2013-2017 and 2018-2022 agreements unmet. The law of 18 December 2023 on full employment includes a number of different measures related to childcare facilities and aims to make 200,000 new places available by 2030. The goal is to make jobs in childcare facilities more attractive to address shortages of qualified staff. The government also plans to replace current provisions for parental leave of up to three years with a shorter, six-month, better-paid leave scheme following the birth of a child, available to both parents at the same time. This targets the issue of extended periods of absence from work, which can create a barrier to employment for some people under the current system of parental leave, predominantly affecting women.

Table 3.3. Recommendations to boost employment and productivity

MAIN FINDINGS	RECOMMENDATIONS (Key recommendations in bold)
Tax incentives for private R&D are amongst the highest in the OECD, yet R&D spending is consistently below the OECD average. Tax credits reach SMEs but provide more support to large firms.	**Build on dynamic innovation ecosystems and a workforce with strong scientific and technological skills to attract R&D spending from multinationals.** Evaluate the efficiency of the R&D tax credit and consider rebalancing them towards SMEs.
French firms, particularly small ones, have low digital intensity, people's digital skills are relatively low and businesses' uptake of high-speed broadband does not reflect the high and relatively widespread access.	Monitor measures supporting the lifelong acquisition of digital skills and adapt them if necessary. Support firms' uptake of high-speed broadband by improving the clarity of tariffs and services and better controlling the indirect costs of switching.
Product market regulations remain elevated and complex in some services sectors, limiting competition and innovation. France's insolvency regimes are relatively efficient, but barriers to restructuring remain.	Ease barriers to entry and regulations in the protected services sectors. Cap the length of stay on assets during restructuring.
Some of the recommendations of the recent evaluation on anti-corruption policy are yet to be implemented fully, including with respect to the disclosure of lobby contacts.	Require that members of the executive regularly and publicly disclose which lobbyists they have met and what they discussed.
France's public employment service is creating a network of better-coordinated stakeholders built around the operator *France Travail* and members of the network for employment by implementing common practices and data sharing.	Ensure the careful implementation of significant reforms to the public employment service and evaluate the benefits over the coming years.
The unemployment rate for young people is well above the rate for adults, with low-skilled young people struggling to enter the labour market. Broad support for apprenticeships has accelerated their use since 2018. Such contracts may be replacing other forms of employment.	Better target support to young people who are the furthest away from finding employment, reduce the administrative burden for operators and better monitor young people's career paths following intense support. **Target financial support for apprenticeships to young people with low skills and difficulties to join the labour market on their own.**
Although the gap is below the OECD average, the employment rate of women remains below that of men.	**Pursue efforts to improve the provision of early childcare services.**

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4 Supporting the green transition

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France will need to accelerate reductions in emissions to achieve ambitious green targets. Greenhouse gas emissions declined by 25% between 1990 and 2022. Average carbon prices are relatively high but uneven across sectors, with substantial implicit fossil fuel subsidies, particularly for farmers and fisheries. Accelerating the phase-out of these subsidies and tax expenditures while aligning prices across sectors will strengthen the effectiveness of carbon pricing. More effective sectoral policies, including across transport, buildings, industry, energy, farming practices and land use, will help reduce emissions and support biodiversity. Paying close attention to the political economy of green policies and supporting vulnerable groups will be key to their success. Planning the adaptation of the country to climate-related risks will help to reduce the associated uncertainty and costs.

Accelerating the transition towards a greener and more sustainable economy

France has set ambitious climate goals to reduce greenhouse gas (GHG) emissions but will need to accelerate abatement to reach its targets for 2030. In 2022, emissions excluding land use, land-use change and forestry (LULUCF) fell by 25% compared to 1990 levels, meeting France's overall objective in its second climate budget, which had been revised down from the previous budget (Figure 4.1). However, the country did not meet all of its sectoral-level targets, with emissions increasing for energy industries and transport (Citepa, 2023[1]). Moreover, its EU target for renewable energy for 2020 remained unmet. The first estimation for 2023 shows a 4.8% decline in emissions, not including LULUCF, which meets the national target for 2023. To comply with EU climate law, France's provisional national goal is to cut total GHG emissions to 270 Mt CO2-equivalent by 2030, representing a 50% reduction from 1990.

Figure 4.1. The decline in net emissions will need to rapidly accelerate to meet 2030 climate targets

Historical and budgeted GHG emissions, Mt CO_2-e
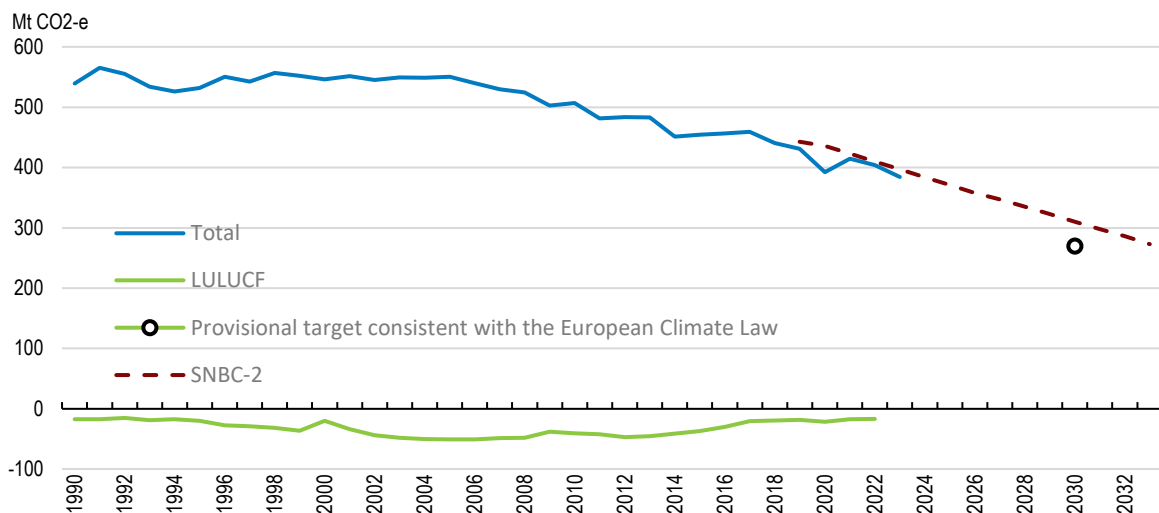
Note: The total excludes land-use, land-use change and forestry (LULUCF), which in France is a net carbon sink and therefore represents negative emissions. Mt CO2-e stands for million tonnes of carbon dioxide equivalent. Emissions for 2022 are an estimate. The 2030 target is a provisional goal. The SNBC-3 will put forward definitive carbon budgets.
Source: UNFCCC (2023), 2023 Submission by France to the United Nations Framework Convention on Climate Change, General Secretariat for Environmental Planning.

StatLink 🔗 https://stat.link/irshm8

France has some of the most stringent environmental policies in the OECD. However, reinforcing the role of net effective carbon prices in sectors where prices are well-below the average carbon price and further developing mitigation policies across the transport, building, industry, renewable energy and agricultural sectors would support France to attain its climate goals.

France's domestic emissions are relatively low compared to other countries, in part reflecting low greenhouse gas (GHG) emissions from electricity generation due to the high share generated from nuclear sources. Emissions produced in the country per unit of GDP were 140kg per USD 1000 compared to 230kg for the OECD average in 2021 (Figure 4.2, Panel A). Demand-based emissions, which include imports, are significantly higher than domestic emissions, although also remain below the OECD average (Figure 4.2,Panel B).

Figure 4.2. Demand-based emissions per capita are well above domestic emissions per capita

A. GHG emissions per unit of GDP, 2021

Kilos per USD 1 000

B. Emissions and demand based emissions

Tonnes per capita

◆ GHG emissions, 2021 — Demand-based CO2 intensity, 2018
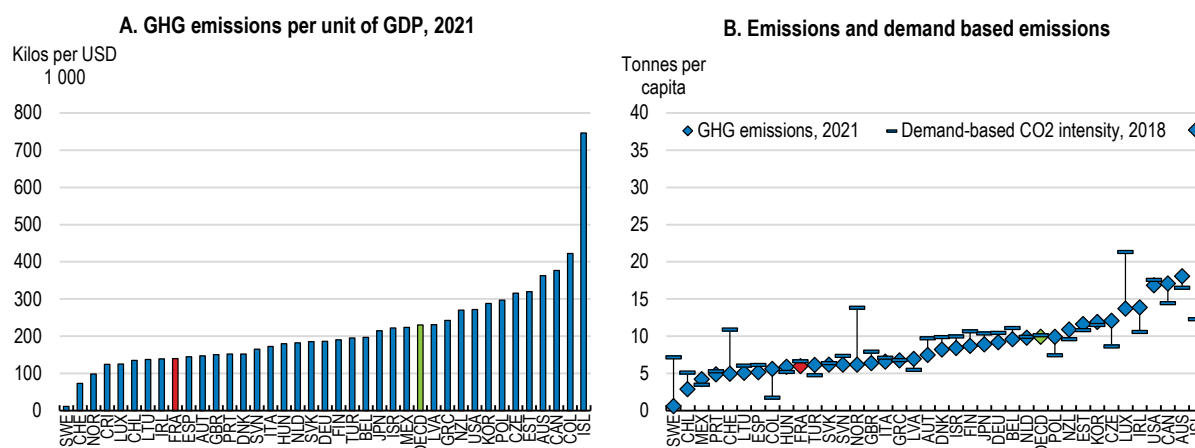
Note: Greenhouse gas (GHG) emissions include land-use, land-use change and forestry (LULUCF).
Source : OECD Environment Statistics database.

StatLink 📊 https://stat.link/uf6owe

Significant progress in policies has been made in recent years, including related to previous OECD recommendations (Table 4.1). France's climate goals have been set out in several laws, plans and strategies, which are governed at both the national and local level. France committed to carbon neutrality by 2050 in the 2019 Energy and Climate law (*loi énergie-climat*). The 2015 Law on the Energy Transition for Green Growth (*loi relative à la transition énergétique pour la croissance verte*) requires that climate budgets are set for five-year periods under the National Low-Carbon Strategy (*Stratégie Nationale Bas-Carbone*, SNBC). The third budget is due to be published in 2024 (Box 4.1). These carbon budgets are non-binding and are re-evaluated based on observed overruns. The Multiannual Energy Plan (*Programmation pluriannuelle de l'énergie*, PPE) sets out a general framework for long-term energy policies to support the SNBC. Since 2022, there has been overall coordination between environmental policies in line with a medium to long-term outlook under the *France National Verte* plan (Box 4.1).

Box 4.1. The National Low-Carbon Strategy and Green Nation Plan

The National Low-Carbon Strategy (*Stratégie Nationale Bas-Carbone, SNBC*) outlines the transition to a low-carbon economy across all sectors. It sets out a pathway for reducing greenhouse gases to achieve carbon neutrality by 2050. It establishes short-to-medium term carbon budgets and strategies to reduce the carbon footprint of French consumption, focusing on i) decarbonising energy through electrification and decarbonisation of electricity, ii) reducing energy consumption through efficiency and moderation, iii) reducing non-energy emissions, primarily from agriculture and industrial processes, and iv) improving carbon sinks. The third SNBC will be published in 2024 and will update the third and fourth carbon budgets (2024-2028 and 2029-2033) and establish the fifth budget (2034-2038).

Since 2022, France has been developing environmental planning led by the General Secretariat for Environmental Planning *(Secrétariat général à la planification écologique, SGPE),* which reports to the prime minister. The **"Green Nation" (France Nation Verte) plan** aims to determine tangible actions within a comprehensive, medium to long-term environmental transition strategy to reduce greenhouse gas emissions, adapt to the effects of climate change, restore biodiversity, decrease use of natural resources, and curb pollution that impacts health. The SGPE's first plan, published in July 2023, highlights measures for reducing greenhouse gas emissions, aiming to enhance cross-sector synergies, improve resource allocation for environmental transition, and better involve citizens and businesses in these efforts.

The average stringency of France's climate policies in 2022 was well above the OECD as classified by the OECD's Climate Action Policy Measure Framework (6.2 out of 10 compared to 4.8 for the OECD average) (Nachtigall et al., 2022[2]; OECD, 2023[3]). The OECD's Environmental Policy Stringency Index, which additionally covers water and air quality, also shows France's policies in 2020 as amongst the most stringent in the OECD (Kruse et al., 2022[4]). However, while France's plans are generally well-framed, defining priorities, actions and mobilising stakeholders, their monitoring and evaluation is often incomplete, with gaps in operational arrangements and timeframes (HCC, 2023[5]).

In addition to carbon pricing, other often sector-specific policy instruments, such as standards, bans, targeted adoption incentives and an intensified green R&D efforts will help address the range of environmental challenges that France is facing (D'Arcangelo et al., 2022[6]; Blanchard and Tirole, 2021[7]). In France, the transport sector is the most emitting sector, responsible for 30% of emissions in 2021, while the industry, building and agricultural sectors are responsible for smaller but similar shares of 21%, 18% and 16% of emissions (Figure 4.3). The relatively high share of transport and low share of energy generation differs substantially from some other OECD countries, largely due to France's high share of nuclear energy in its energy generation.

Main sources of GHG emissions are also closely linked to pollution and the loss in biodiversity. As a result, success in curbing GHG emissions in these sectors will also bring benefits for air, soil and water quality and biodiversity. For example, agricultural land can help to store carbon dioxide, provide nitrogen and water to cultivated plants and regulate water quality. Limiting urban sprawl, as in France's national biodiversity strategy, can reduce transport emissions and air pollution while supporting biodiversity and natural ecosystems.

The decline in emissions is uneven across sectors, with the industry and residential sectors significantly reducing their emissions, while those in the transport sector increased between 1990 and 2022 (Figure 4.4). In 2023, the General Secretariat for Environmental Planning published provisional targets for different sectors, updating those released in SNBC-2, in compliance with European climate law. While all sectors will contribute to meet France's national climate objectives for 2030, emissions in the transport and building sectors will need to decrease sharply. Targets for the reduction in emissions in the agricultural sector are more modest.

Figure 4.3. France's emissions by sector differ from other OECD countries

Greenhouse gas emissions by sector, as a percentage, 2021
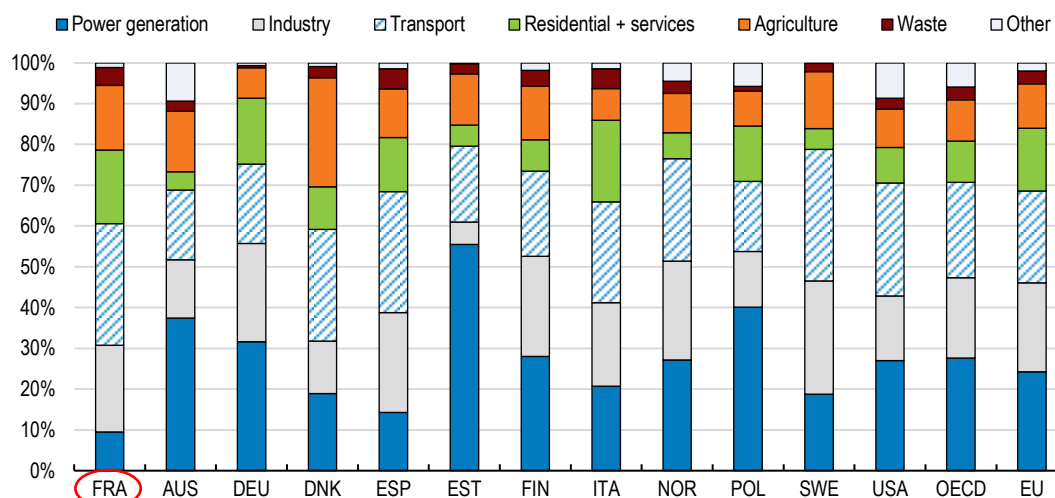
Note: Emissions source categories are defined according to the International Panel on Climate Change (IPCC) guidelines.
Source: OECD Environment Statistics.

StatLink https://stat.link/ie7l46

Figure 4.4. The transport and building sectors must rapidly decrease GHG emissions

Historical and projected GHG emissions, Mt CO_2-e
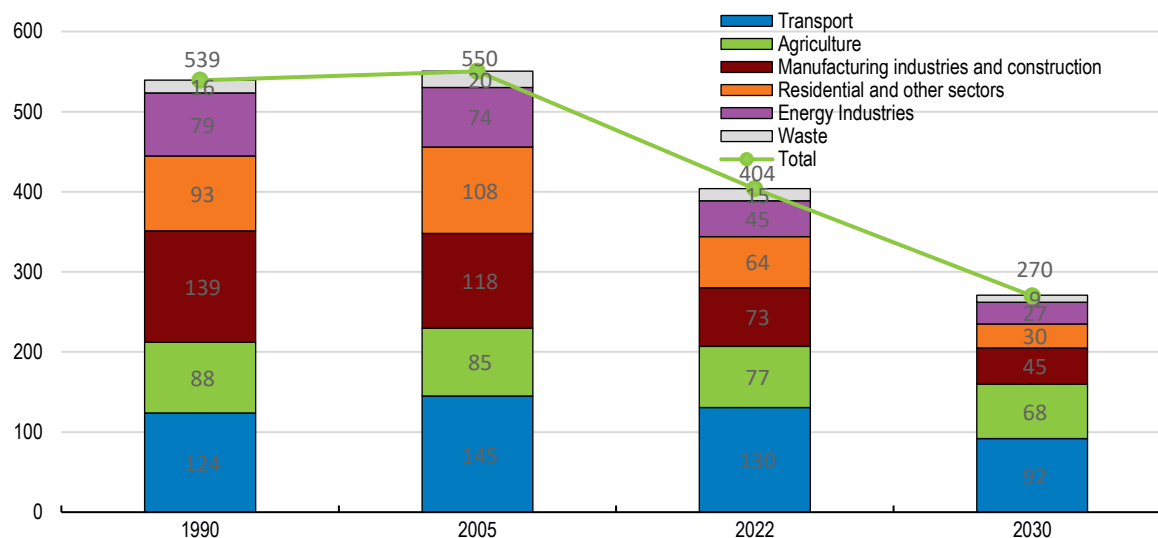
Note: The total excludes land-use, land-use change and forestry (LULUCF), which in France is a net carbon sink and therefore represents negative emissions. Mt CO2-e stands for million tonnes of carbon dioxide equivalent. Emissions for 2022 are an estimate. The 2030 target is a provisional goal. The SNBC-3 will put forward definitive carbon budgets. Emissions source categories are defined according to the National Air Pollutant and GHG Emissions Inventory System, as defined by the French Ministry of the Ecological Transition and the Cohesion of Territories. Source: Citepa, Greenhouse gas emissions inventory, Secten data, 2023 edition, General Secretariat for Environmental Planning; authors' calculations.

StatLink 🔗 https://stat.link/7dyao9

Table 4.1. Past OECD recommendations to support the green transition

Recommendations in past surveys	Actions taken since 2021
Gradually withdraw exemptions and reduced rates on environmental taxes. Prioritise the progressive alignment of carbon prices across sectors while resuming the gradual upward trend of the carbon component of energy taxes.	France provided significant financial support during the energy crisis, incentivising the use of fossil fuels. The government continued to provide energy support for low-income households and those requiring a vehicle to reach their workplace into early 2024. The preferential tax treatment for diesel is planned is planned to be phased out by 2030 in the construction sector.
Link economic incentives with measures to increase their social acceptability when needed.	Some support measures for low-income households have increased, such as the environmental bonus, the conversion premium to purchase an electric car and support for building renovation.
Make the eligibility criteria for the conversion premium and the environmental malus scale more stringent.	The environmental malus scale became more stringent, will start from a lower weight threshold and is no longer capped. While the CO2 threshold for a vehicle to receive the conversion premium declined, it remains above European standards for newly constructed vehicles. The conversion premium will no longer apply to the purchase of new internal-combustion-engine vehicles.
Make aid conditional on achieving a minimum energy efficiency standard and tighten controls on major projects.	The MaPrimeRénov programme includes an "efficiency" criterion focusing on decarbonising heating systems and excludes energy-inefficient homes. The bonus for purchasing a high-performance gas boiler was discontinued on 1 January 2023.
Reallocate support to the agricultural sector towards payments for agro-environmental services.	The payments for agro-environmental services have increased.

Reinforcing economic incentives to accelerate reductions in emissions

Carbon pricing plays a key role in France's climate policies. In Europe, the Emission Trading Scheme (ETS) determines a market-based price for carbon in some sectors (OECD, 2023[8]). In 2021, 21% of France's emissions were covered by the EU Emission Trading Scheme (ETS) (OECD, 2022[9]). Overall, the average net effective carbon rate, which includes fuel excise and carbon taxes and fuel subsidies, increased from EUR 76.6 per tonne in 2018 to EUR 82.82 per tonne in 2021, well above the OECD weighted average (EUR 34.51 per tonne). At the same time, this is still lower than in several European countries (OECD, 2022[10]).

Despite the relatively high average carbon price, net effective carbon prices are highly uneven across sectors, with France continuing to offer some substantial implicit subsidies, particularly to its farmers and fisheries. Carbon pricing must be universal to reach its full potential (Blanchard and Tirole, 2021[7]). Uneven carbon prices result in varying abatement incentives and reduce the effectiveness of France's climate policy (HCC, 2023[5]). Carbon is priced at EUR 228 per tonne in road transport, above the OECD and EU average, falling to EUR 41 per tonne in energy use excluding road transport and EUR 13 per tonne in agriculture and fisheries (Figure 4.5). In 2021, nearly 29% of all emissions were not subject to a positive carbon price, unchanged from 2018 (OECD, 2022[10]). From 2027, the European Union's ETS 2 will cover emissions from fuels used in road transport, buildings and certain industrial processes not currently covered, which will establish a uniform carbon price across these sectors (OECD, 2023[8]). However, there is further scope to increase the effectiveness of France's climate policy mix by aligning carbon prices and taxing polluting activities in line with their environmental impacts.

Figure 4.5. Carbon pricing differs considerably across sectors

Average net effective carbon tax[1], EUR per tCO2, 2021
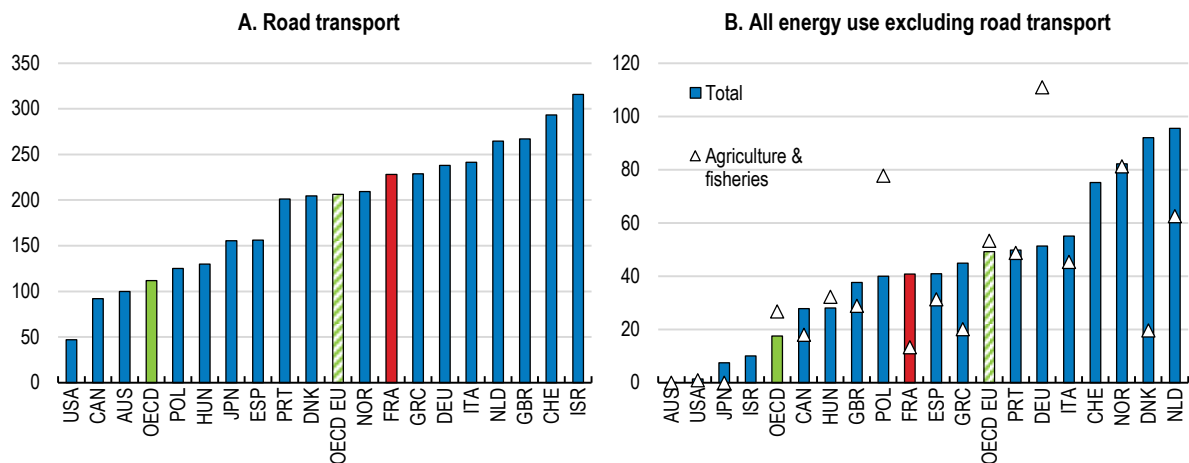
Note: 1. The net effective carbon rate is the net effect of fuel excise taxes, carbon taxes, permit prices and fuel subsidies.
Source: OECD Net Effective Carbon Rates (database).

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Accelerating the phase-out of fossil fuel subsidies, including reduced rates and tax exemptions, would help better align carbon prices across sectors. France provided the highest amount of fossil fuel subsidies in the EU in 2021, at a total of EUR 11 billion, or 0.5% of GDP (European Commission, 2022[11]). France plans to gradually phase out tax exemptions in the construction sector by 2030. A similar goal for the agricultural sector was dropped in January 2024, against a backdrop of crisis in the sector. As allocated in the draft budget law for 2024, France plans to give out over EUR 1.6 billion in tax exemptions on fuel in agriculture and forestry, EUR 1.35 billion to diesel fuel for road haulage vehicles of at least 7.5 tonnes, despite diesel's higher carbon content and EUR 780 million for non-road fuels outside of the agricultural

sector (Ministère de l'économie, des finances et de la sourveraineté industrielle et numérique, 2023[12]). Coal-related fiscal expenditure was maintained at EUR 15 million for 2024. Non-green tax expenditures, whose classification depends on methodological choices, risk being even higher. In France's "green budget" for 2022, the government estimated that it spent EUR 7.6 billion on non-green tax measures, and applying alternative methodological choices could have re-evaluated this number up to EUR 19 billion, including the effect of the exceptional price shield introduced to help households cope with the inflationary shock (I4CE, 2022[13]).

Paying close attention to the political economy of carbon pricing will be key for its success. Increasing public revenues is not the main objective of carbon pricing, which relies on a limited base and set to decrease. As carbon pricing falls unevenly on certain groups, it is also important to ensure that environmental policies are socially acceptable. In France, the 10% of households with the lowest incomes spend 22.2% of their income on energy in 2022, compared with 4.3% for the wealthiest 10% of households (Ministère de la Transition Energétique, 2023[14]). Channeling some of the potential revenues from carbon taxes back to households can help to cushion losses, particularly for low-income households (Immervoll et al., 2023[15]). This would also improve the political viability of carbon pricing. For example, Switzerland redistributes revenues from the CO_2 levy to the population and towards green investment (OECD, 2024[16]). Two thirds goes directly to the population and the economy, with roughly one third of this going uniformly to all residents and the remainder going to companies, based on paid wages. The remaining third of the revenue is used to support energy-efficient renovations and heating systems using renewable energy sources.

One use of funds from carbon pricing is investment in the green transition, which will need to accelerate rapidly both in the public and the private sector to reach climate goals. Around EUR 66 billion of additional investment is estimated to be needed per year between 2021 and 2030 to meet emission objectives for 2030 compared to a business-as-usual scenario. This calculation includes eliminating EUR 35 billion of non-green investments (Pisani-Ferry and Mahfouz, 2023[17]).

Supporting low-carbon mobility

Emissions in the transport sector increased by around 5.5% between 1990 and 2022. Road transport generates most emissions, divided across passenger cars (52%), heavy goods vehicles (25%) and light commercial vehicles (15%) (HCC, 2023[5]). Emissions will need to decline by around 29% between 2022 and 2030 to meet provisional climate goals. Overall, the sector is estimated to need an additional EUR 3 billion of investment per year, with an additional EUR 32 billion of green investment partly funded by an elimination of EUR 29 billion of non-green investment (Pisani-Ferry and Mahfouz, 2023[17]).

France's low-carbon mobility strategy, part of the Green Nation plan (Box 4.1), focuses on using less energy-intensive modes of transport and promoting transport efficiency. It sets goals for various types of transport, relying on investment measures, fiscal incentives and information campaigns.

Boosting the carbon efficiency of cars through the large-scale deployment of electric vehicles is a key component of the country's mobility strategy, which targets 15% of vehicles being 100% electric by 2030, compared with 1.2% in 2023. France is using a number of levers, including subsidies to convert internal-combustion-engine vehicles to electric and an environmental bonus/malus scheme providing subsidies for the purchase of low-carbon vehicles, along with a tax on the purchase of polluting vehicles. It also provides for deployment of recharge points nationwide. The number of public charging stations per capita is still below the euro-area average (OECD, 2023[8]) and some remote areas remain relatively underserved. To support the deployment of charging stations, the government extended the ADVENIR programme, aiming to finance 175,000 recharge points by 2025 (ADVENIR, 2023[18]). Further developing the charging network will reduce barriers to the take-up of electric vehicles (ITF, 2023[19]). Closer monitoring of obligations to

electrify commercial fleets of over 100 vehicles would also support the electrification of the car fleet while supporting the development of the second-hand market in coming years (HCC, 2023[5]).

Encouraging greater use of alternative modes of transport for people and active mobility will help to reduce transport emissions. There were around 571 cars per 1000 inhabitants in France in 2021, around the EU average (Eurostat, 2023[20]). France reduces the attractiveness of conventional car use through one of the highest rates of excise duty on petrol and diesel in Europe (OECD, 2023[8]). As recommended in the 2021 Economic Survey of France, congestion charges in large towns and cities could further disincentivise car use whilst the revenue could be used to invest in public transport (OECD, 2021[21]). This type of toll should focus on existing low-emission areas *(Zones de Faibles Emissions, ZFE),* which limit the use of the most-polluting vehicles. Taxes on road users could be a source of funding for local public transport, such as in the Île-de-France region (Cour des Comptes, 2022[22]). Aligning energy taxes on flights and trains more closely with their emissions could help to encourage the use of trains and reduce transport emissions.

The political acceptability of vehicle taxation and road pricing policies can significantly increase if coupled with policies that encourage alternative modes of mobility (OECD, 2021[23]; 2022[24]). The Green Nation plan promotes cycling, using public transport and car sharing. It also earmarks investment of EUR 2 billion between 2023 and 2027 to develop cycle paths and EUR 100 billion to develop railways by 2040. The 2023-2027 plan for cycling and walking *(Plan Vélo et Marche)*, which includes efforts from local authorities, includes EUR 6 billion of investment to promote cycling. Continuing to limit urban sprawl can help reduce distances travelled and make walking, biking and public transport options feasible (OECD, 2021[21]; ITF, 2023[19]).

With heavy goods vehicles contributing to one quarter of transport emissions, shifting freight transport from road to rail is also key to reduce transport emissions. While in 2021 maritime transport accounted for around 64% of freight in France, slightly below the 68% in the EU, the share of freight transported by rail was lower (3.8% compared to 5.4% in the EU) and the share of road transport was higher (31% compared to 25%) (Eurostat, 2023[25]). Reducing the gap in fuel taxes between passenger and heavy vehicles, which is expected to cost around EUR 1.35 billion in 2024, would improve incentives to shift freight towards rail (Ministère de l'économie, des finances et de la sourveraineté industrielle et numérique, 2023[12]).

Improving the energy performance of buildings

The building sector, responsible for 64 million tonnes of CO_2-equivalent, or around 16% of emissions according to the measure used by national sources, would most efficiently reduce emissions by improving the insulation of buildings and moving from fuel and gas heating to heat pumps. The sector reduced its emissions by nearly 30 Mt CO_2-equivalent between 1990 and 2022. This initiative and others will need to be repeated to achieve the provisional targets for 2030, which require a reduction of around 34 Mt CO_2-equivalent. Around two-thirds of reductions are planned to come from reducing the use of oil- and fuel-fired boilers and around one-third will come from improving insulation. The reductions entail an investment cost of an additional EUR 21 billion euros in residential buildings per year by 2030 and EUR 27 billion in tertiary buildings (Pisani-Ferry and Mahfouz, 2023[17]).

France has several programmes to support and fund residential renovations, which were intensified for 2024, in part to encourage more comprehensive renovations. While France's strategies provide a clear framework for action, they lack the evaluation and monitoring that would ensure that they meet their objectives (HCC, 2023[5]). The *MaPrimeRenov'* renovation subsidy provides grants, with greater support for low and middle-income households and the *Éco-prêt à taux zéro* provides interest-free loans, up to a certain income threshold, to improve a dwelling's energy performance. Alongside a goal of 200,000 complete renovations in 2024, a three-times increase from 2022, the government increased expenditure ceilings in some programmes, including the *MaPrimeRenov'* renovation subsidy and zero-interest loans. These increases will reduce costs for low and middle-income households, covering up to 90% of costs for

the lowest-income households and reducing the time to reach a positive return on investment for low and middle-income households. It also increased the income threshold for households to benefit from zero-interest loans. Support for comprehensive renovations represented only 1.7% of beneficiaries in the first six months of 2023 and the 2023 draft budget bill significantly boost the appeal of these projects (Comité d'Évaluation du Plan France Relance, 2024[26]). Consequently, the total budget for renovation subsidies was increased from EUR 3.4 billion to EUR 4.0 billion.

Despite significant public support, the up-front investment cost for low- and middle-income households can remain substantial share of income and require borrowing. The resulting high debt ratio for low-income households can remain a barrier, with total household debt increasing over the past decade and above the European average (see Chapter 2). Obtaining an interest-free loan includes many obstacles, including the complexity of the administrative procedures (I4CE, 2023[27]).

Training systems must also be ready to respond and continue to train and upgrade the skills in the various sectors involved, with the renovation sector estimated to require an additional 170,000 to 250,000 workers by 2030 (France Stratégie / Dares, 2023[28]; 2023[29]; HCC, 2023[5]).

The authorities continue to simplify programmes and services, although these remain complex. The *Mon Accompagnateur Rénov'* programme provides an approved professional advisor to help define the project, provide advice on selecting contractors and administrative tasks and mobilise financing. Using its services is now compulsory to benefit from certain financial support, for example for a comprehensive renovation. In 2022, the existing *France Rénov'* online platform became the single point of entry for public services and financial assistance for renovation projects, simplifying procedures. Centralising the numerous public support programmes in a single agency could further simplify the renovation process. There is also support for energy renovation of buildings. The REPowerEU proposal presented by France under the European Recovery and Resilience Facility (RRF) will partially fund this initiative, with expected effects as of the winter of 2023-2024.

Supporting the decarbonisation of industry

The manufacturing industry was the sector that contributed the most to the fall in emissions since 1990, with a 1.5% decline per year on average, even though this drop in emissions coincided with the manufacturing industry's decline from around 16% of GDP in 1990 to 10% of GDP in 2022. Nonetheless, first estimates suggest that the sector failed to meet its 2019-2023 carbon budget targets. Emissions will need to drop by 28 million tonnes of CO_2-equivalent or 38% of their 2022 level to reach the provisional climate goals for 2030 (Figure 4.4). Manufacturing industries are subject to carbon prices in the EU ETS, though not all emissions are priced due to free allocations reducing effective coverage.

The government is collaborating closely with industry to develop a decarbonisation strategy and provide financial support. The 50 most polluting sites in France have published decarbonisation roadmaps and the France 2030 plan is providing EUR 5.6 billion to help attain these targets, which could be increased up to EUR 10 billion if decarbonisation targets are doubled (DGE, 2023[30]; HCC, 2023[5]). The development of carbon capture, use and storage (CCUS) solutions is an important part of this decarbonisation strategy, which is currently being drawn up on a national scale. The national hydrogen development strategy (*Stratégie national pour le développement de l'hydrogène*), funded under the France 2030 plan will develop the use of low-carbon hydrogen in industry. While several climate-related strategies aim to support the reallocation of workers and promote workforce skills, the short time frame and careful planning required combined with the skills shortages that have surfaced in recent years will pose a challenge.

The Green Industry Law (*loi industrie verte*) aims to support a reindustrialisation of the economy in sectors required for the green transition and for France to become a European leader in green industry. The bill simplifies administrative procedures and facilitates factory openings, particularly supporting industry in wind power, photovoltaics, heat pumps, batteries and low-carbon hydrogen. The law provides tax credits

of up to 40% for investments, aiming to trigger EUR 20 billion of investments by 2030, as well as loans or guarantees for firms for green investment. The law also gives the State control to exempt projects of "major national interest" from the Environmental Code, which is normally the responsibility of local authorities. These are projects deemed to make a significant contribution to sovereignty or the green transition. While this clause may help provide more certainty for firms it may take local environmental issues less into consideration.

Accelerating renewable energy

Continuing to expand renewable electricity sources will be one pillar of decarbonising energy generation and will also support energy security. This would also help accommodate greater demand for electricity due to greater use of electric vehicles and heat pumps.

Already, the 36% share of nuclear energy in total primary energy supply results in relatively low emissions from energy (Figure , Panel A). France also reduced electricity produced from coal, which is entirely imported, by 81% between 2010 and 2020 (IEA, 2021[31]). The last two French coal-fired power plants were initially due to be closed in 2022. They are now scheduled to be converted to biomass production by 2027, which will help France achieve its emissions targets.

However, France is yet to reap the full potential of renewable energy sources to aid the climate transition. The share of primary energy supply from renewables has increased gradually over the past decade, catching up with the OECD average in recent years but remaining well below the EU average (Figure 4.6, Panel B). The share of renewables in gross final energy consumption reached 21% in 2022, below its 2020 EU-level target of 23%, and below the 2021 EU average (Eurostat, 2023[32]). While there was an unprecedented installation of renewable energy production in 2022 (RTE, 2023[33]), France will likely remain below its targets for 2023 (HCC, 2023[5]).

The transition to low-carbon energy must be accelerated to ensure France's decarbonisation and energy security. Replacing fossil fuels with low-carbon energy means massively accelerating investments in renewable energies. Decarbonising the energy mix could also involve stepping up nuclear production, which does not suffer from fluctuations related to weather conditions like sun and wind energy and can provide a constant base load of electricity, guaranteeing a certain degree of security of supply. The French government therefore reversed earlier plans to reduce the share of nuclear energy production, renationalised the electricity utility EDF in 2023 and began investing in extending the existing fleet and building new high-power reactors (EPR). In November 2023, the government announced an agreement with EDF on the regulation of nuclear electricity prices, which will replace the preceding ARENH agreement, consistent with EU state aid rules and consistent with allowing EDF to finance new investments in nuclear power capacity.

France is building a new Industrial Centre for Geological Disposal, scheduled to open in 2035, where waste will be stored in drifts hollowed out 500 metres below ground. The costs of decommissioning nuclear power plants and restoring land on former sites are still uncertain, and the process may take between 20 and 25 years (Cour des Comptes, 2020[34]). This cost will need to be factored into economic choices about future energy supply.

France must continue to diversify its energy mix and sources of supply against a backdrop of increasing climatic events and geopolitical tensions, while ensuring that its energy security is maintained over the long term. For example, there were several intense heatwaves and a historic drought in the 2022 summer, which made it necessary to impose temporary regulations on thermal discharges into rivers from several nuclear power plants (Autorité de sûreté nucléaire, 2022[35]). This has resulted in some nuclear power plants having to reduce their output and also in a reduction of hydroelectric production (RTE, 2023[33]). Around 99 % of French uranium imports came from five countries in 2023 –Niger, Kazakhstan, Namibia, Uzbekistan and Australia (OECD calculations according to DGDDI (2024[36])). In addition, some fuel

services like uranium enrichment and conversion of reprocessed uranium have been imported. France has large stocks of uranium, equivalent to around 10 years of consumption. Nevertheless, these risks will have to be managed with caution.

In recent years delays in obtaining permits, land constraints and long wait times have deterred investment in renewable energy, with development timelines reaching double those of neighbouring EU countries (IEA, 2022[37]; IEA, 2023[38]). Obstacles in developing wind power have been the main cause of delays (Cour des Comptes, 2023[39]). Renewable energy auctions were undersubscribed by around 40% in 2023. Regulatory procedures have been simplified in recent years, cutting the processing time of authorisation procedures by two years (Cour des Comptes, 2023[39]). In a welcome move, the government implemented the Renewable Energy Acceleration Act in early 2023 (Box 4.2). The law aims to remove all obstacles that delay the deployment of renewable energy projects, including simplifying procedures, streamlining permit delivery, shortening connection delays and enhancing citizen participation.

Figure 4.6. The share of renewables is increasing but remains low
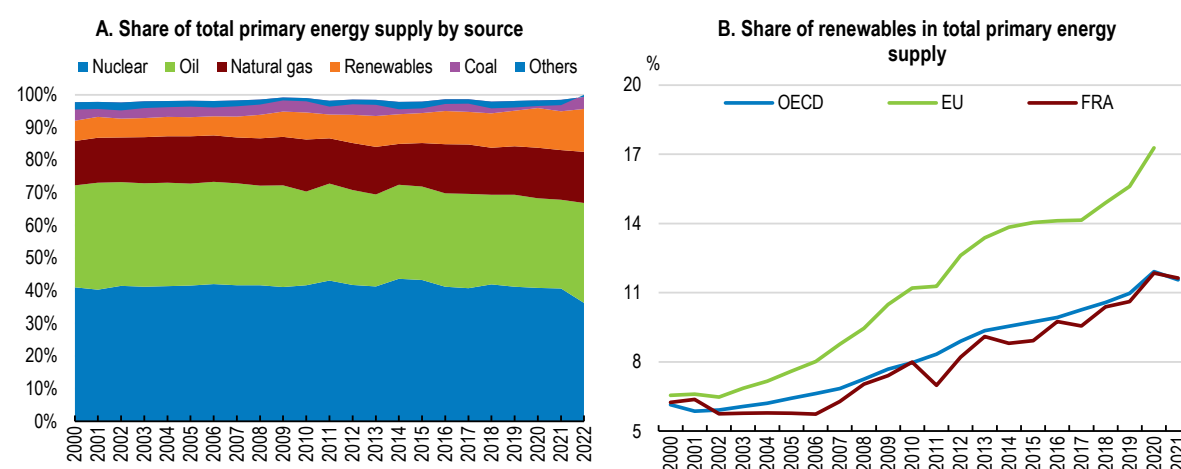
Note: Total primary energy supply is energy production, plus energy imports, minus energy exports. Data for 2022 is provisional.
Source: OECD Green Growth Indicators Database; IEA (2023), World Energy Balances (database).

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Box 4.2. The Renewable Energy Acceleration Act

The Renewable Energy Acceleration Act (*Loi d'accélération de la production d'énergies renouvelables*) of March 2023 is structured around four pillars, including speeding up administrative procedures without compromising on environmental requirements, accelerating the development of offshore renewable energy production facilities, improving the financing of renewable energies and introduce value-sharing mechanisms and developing regional planning for renewable energies led by local elected representatives.

The Act simplified access to degraded land, which is already artificialised or does not present any major environmental challenges, such as car parks, or the edges of motorways. This simplification included empowering local authorities to create preferred "go-to" and "no-go" areas for the development of renewable energy (IEA, 2023[38]). The government has developed a mapping tool that provides information to local authorities and the public on the development of renewable energies in their region. A portal also provides local authorities with data on renewable energies in their area and the potential for their development.

Source : Ministère de la Transition Écologique et de la Cohésion des Territoires (2024[40]) and IEA (2023[38]).

Shifting towards more sustainable farming practices and land use

The agriculture sector must gradually shift to more sustainable practices to reduce its GHG emissions and preserve biodiversity. GHG emissions must fall by around 11% between 2022 and 2030 to achieve provisional national targets. Reductions will be most efficiently reached by decreasing cattle numbers, reducing emissions from agricultural machinery, engines and boilers and improving manure management and reducing the use of fertilisers (IEEP, 2022[41]). France's National Strategic Plan 2023-2027 to implement the European Union's Common Agricultural Policy (CAP) allocates EUR 12 billion of France's total around EUR 50 billion CAP budget to interventions contributing to green objectives (IEEP, 2022[41]). The Climate and Resilience law sets a goal for 8% of agricultural land to be used for legumes by 2030. In addition, the National Plant Protein Strategy (*Stratégie nationale sur les protéines végétales*) encourages citizens to consume more plant protein, including through a planned consumer campaign and enable farmers to feed their animals more self-sufficiently (FranceAgriMer, 2023[42]). Given that the carbon footprint of food consumed in France is twice as high as the nation's agricultural sector (Li et al., 2022[43]), accompanying measures to green the agricultural sector with those promoting more sustainable diets would avoid an increase in emissions-intensive imports.

To trigger the structural changes needed to meet climate goals, France's CAP National Strategic Plan mainly focuses on reducing emissions from crop production (IEEP, 2022[41]; HCC, 2023[5]). While cattle numbers have been falling due to declining profitability in the sector, numbers will need to fall significantly further to meet France's methane commitments (Cour des Comptes, 2023[44]). Around 93.6% of methane emissions from cattle farming are a result of enteric fermentation and only 6.4% are from livestock manure. This suggests that an improvement in manure management and genetic progress will help, but the main driver of declines in methane emissions is cattle numbers (Cour des Comptes, 2023[44]). The National Strategic Plan aims to revise the criteria for coupled support for cattle to encourage deintensification and enhance the resilience of grassland farming systems.

Specifying reduction targets and the precise sectors in which these will occur, would help to clarify France's contribution to the Global Methane Pledge (HCC, 2023[5]). Additionally, some climate indicators in the National Strategic Plan for the CAP do not consider their final impact on emissions. For example, increasing grassland areas could actually raise GHG emissions if it leads to more livestock emitting more GHGs than grasslands can sequester (Cour des Comptes, 2023[44]). As outlined in the 2021 Economic Survey of France, reallocating support for farmers towards payments for agro-environmental services would better support achieving climate objectives and improving the design of these payments could also enhance their effectiveness (OECD, 2021[21]). The political economy of such reforms must be considered carefully.

The amount of carbon stored by carbon sinks in the land use, land-use change and forestry (LULUCF) sector was 17 Mt of CO_2-e in 2021, totalling around 4% of emissions. However, this is not even half of the 41 Mt of CO_2-e that had been projected in the SNCB 2 climate budget. Reversing the sharp decline in forest carbon sinks since 2013 due to increased forest mortality, reduced tree growth and increased harvesting will require large-scale action to regenerate forests and meet 2030 targets (HCC, 2023[5]).

To support a reduction in emissions and support natural ecosystems, France's national biodiversity strategy (*Stratégie nationale pour la biodiversité*) includes a target of zero net artificialisation (*Zéro Artificialisation Nette*, ZAN) by 2050: for one additional artificialised hectare, one hectare is restored to its natural state, with land deemed "artificialised" when it is waterproofed, built-up or paved. This strategy follows a 72% increase between 1982 and 2018, the year in which it was announced (HCC, 2023[5]). This goal requires local and subnational jurisdictions to reduce the consumption of natural, agricultural and forest areas by 50% by 2030, compared to the rate between 2011 and 2020 (OFB, 2023[45]). However, achieving this goal would be easier with a clear operational strategy to back it up (HCC, 2023[5]).

Preparing the necessary adaptation to climate change

France faces several hazards related to climate change, notably as a result of higher temperatures, higher rainfall in some areas and less in others, stronger winds, or rising sea levels. The number of days of extreme heat has considerably increased in recent years (Figure 4.7.). The number of wildfires has strongly risen over the past decade. Wildfires burnt 35,500 hectares per year on average between 2019 and 2023, 4.4 times the surface burnt on average between 2014 and 2018 (EFFIS, 2023[46]). Agricultural drought has worsened, with cropland soil moisture 3.9% lower on average in years 2018-2022 compared with 1981-2010. However, precipitation has increased overall, and 13.5% of the population is exposed to river floods on average every ten years or more (OECD, 2023[47]). Finally, more than half of the population has been exposed to windstorms over between 2018 and 2022 (Maes et al., 2022[48]).

Efficiently planning the responses to consequences of the climate change can reduce uncertainty and related costs. In 2006, to prepare for climate-related hazards, France drew up a National Climate Change Adaptation Strategy. In 2018, it released its second National Adaptation Plan (PNACC2) (ONERC, 2018[49]). This plan, implemented in 2018, precedes the third National Adaptation Plan (PNACC3), which will be published in the second half of 2024 to take into account the rapid evolution of climate-related risks.

France has a specific insurance scheme for covering damage linked to natural disasters, based on a partnership between the State and insurers. This scheme comprises reinsurance and a guarantee of last resort from the State, which keeps insurance premiums at moderate levels. Insurance industry estimates put the cost of climatic events at 143 billion EUR over the period 2020-2050, almost double the 74 billion EUR damages during the period 1989-2019 (France Assureurs, 2022[50]).

Given this sizeable increase in damage volumes, a first step would be to inform citizens and political and economic decision-makers about all the risks linked to climate change, so that they can take more informed choices and limit the overall burden on the economy. There is clearly scope for progress in this area: according to an opinion survey, half of the people questioned considered themselves poorly informed about the natural risks that could affect their living area (Harris Interactive pour Assurance Prévention, 2022[51]).

Figure 4.7. Population exposure to hot days is increasing

Population exposed to hot days (%)
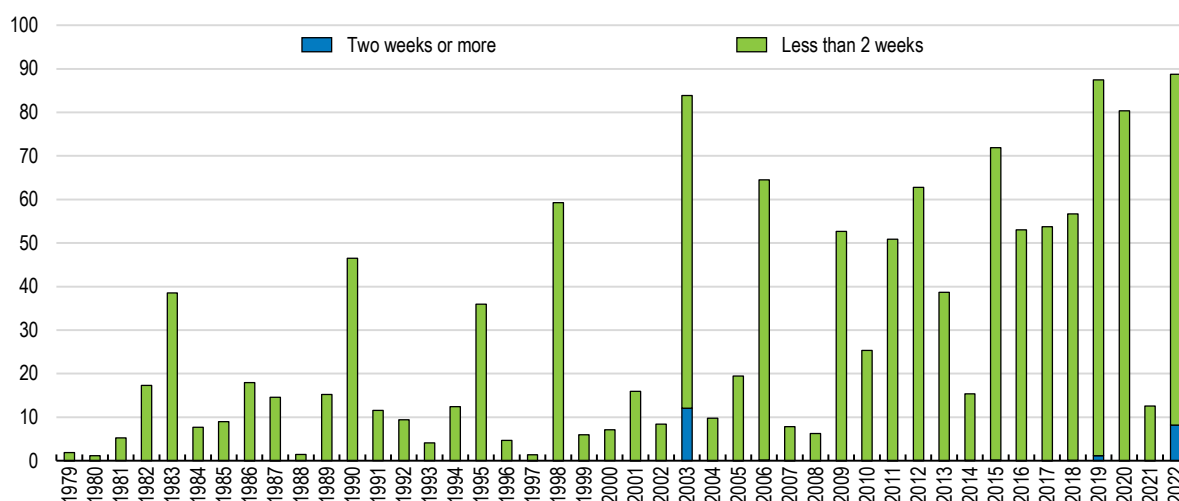
Note: The above chart does not include the percentage of the population not exposed to any hot days in summer. Indicator developed in partnership with the International Energy Agency.
Source: OECD IPAC Climate Action Dashboard, OECD (Maes, M. J. A., et al. (2022), 'Monitoring exposure to climate-related hazards: Indicator methodology and key results').

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Table 4.2. Recommendations to support the green transition

MAIN FINDINGS	RECOMMENDATIONS (Key recommendations in bold)
Carbon prices are highly uneven across sectors, particularly in agriculture and fishing, reducing their incentives to reduce emissions.	**Accelerate the phase-out of fossil fuel subsidies, reduced rates and exemptions on fossil-fuel taxes.** **Further align carbon prices and tax polluting activities in line with their environmental impacts.**
Carbon pricing significantly affects low-income households.	Channel some of the potential revenues from carbon taxes back to low-income households to cushion losses and support significant investment needs.
Past declines in transport emissions are insufficient to reach targets. The energy intensity of freight transport is high and the share of freight transported by rail is low. Heavy vehicles continue to benefit from significant tax exemptions for diesel fuel. Initiatives encouraging the purchase of electric vehicles could provide stronger incentives. The number of public charging stations per capita remains below the euro-area average.	**Remove tax exemptions on diesel fuel for heavy vehicles to encourage a shift of freight transport from road to rail.** Continue to incentivise alternative modes of transport whilst improving public transport and cycling infrastructure. Continue to support the deployment of on-demand charging stations for electric vehicles.
France's numerous programmes to support and fund residential renovations are complex and the up-front investment can be a significant barrier.	**Reduce the barriers to complete renovations by simplifying administrative procedures and making it easier for low and middle-income households to obtain interest-free loans.** Centralise public support programmes into a single agency. Increase the evaluation and monitoring of support programmes to ensure they meet their objectives. Adapt programmes that support and fund energy-efficiency renovations to increase help for landlords.
France is yet to attain its EU 2020 objectives for the share of renewable energies. Tax expenditures on coal have not yet been fully eliminated and the closure of the last French coal-fired power stations has been postponed from 2022 to 2027.	Closely monitor the simplifications implemented in the 2023 Renewable Energy Acceleration Act. Pursue efforts undertaken in the past two years to convert French coal-fired plants to biomass production.
The agricultural sector should implement a shift towards more sustainable practices to curb GHG emissions and preserve biodiversity. GHG emissions will not be reduced by around 17% between 2021 and 2030 to achieve climate goals.	Continue to increase the share of payments for agro-environmental services and improve the design of these payments.
The cost of climate events is estimated at EUR 143 billion between 2020-2050 but many people are poorly informed about the natural risks that could affect their residential area.	Better inform citizens and decision makers about all the risks linked to climate change and options for adapting to those risks.

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5 Improving educational outcomes

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France's educational system is facing many challenges despite a strong commitment to providing quality education. The country spends more on education per student than the average OECD country, notably in secondary education, and has undergone numerous reforms aimed at improving students' educational performance, which remains however around the OECD average, and performance in reading has been declining over the past decade. The link between socio-economic background and educational outcomes is particularly strong in France. Continuing to raise school autonomy and accountability, promoting modern teaching approaches and boosting the attractiveness of the teaching profession could help ensure a high-quality education. Allocating more resources to disadvantaged students and continuing to work with the network of private schools under contract to encourage them to change their selection practices could help to provide more equal opportunities. Encouraging more young people, and especially girls, to pursue scientific careers could ensure sufficient skills for the green and digital transitions. Better training teachers to enforce discipline in classrooms could further support students' wellbeing. Hiring additional assistants would offer better learning conditions to students with special needs.

France's education system is facing challenges

France's commitment to providing quality education for young people is strong, spending on education per student is above the OECD average, notably in secondary education, and school closures were limited during the pandemic. Yet, the French educational system is facing numerous challenges. The OECD's Programme for International Student Assessment (PISA) test scores show that French students' performance is around the OECD average. Nevertheless, students' PISA scores fell by more than the OECD average in 2022, and particularly sharply in mathematics. Students' reading scores have been declining since 2012. While students from disadvantaged socio-economic backgrounds typically perform less well than advantaged students, this effect is even larger in France compared with the OECD average. Average public spending on education per student and as a share of GDP is higher in France than in other OECD countries. However, while France spends one-third more per upper secondary student than the OECD average, spending per primary student is 9% lower.

Teachers in France are amongst the most qualified across OECD countries but fewer feel prepared in general pedagogy than their peers in other OECD countries and the use of more modern cognitive activation practices is less widespread. Several factors are reducing the attractiveness of the teaching profession, including wages and limited career perspectives.

Finding a job is difficult for young people without a tertiary qualification, notably those who have followed vocational education. The current mismatch between skills and knowledge to labour market needs is high, with significant lacks in the areas of health, science and education. Few young girls are pursuing scientific careers, limiting diversity in the field. Also, skill needs related to digital and environment protection is expected to increase in the coming years. Numerous structures provide a range of career guidance information that can help improve the transition from school to employment. However, career guidance is mainly provided by teachers and psychologists, and not enough by labour market specialists.

France could improve the wellbeing of its students. France, like other countries, is affected by bullying and violence at school, and a lack of classroom discipline is particularly prevalent. Ensuring an inclusive education remains challenging. The number of students with special needs enrolled in schools has steadily increased in recent years and recruiting enough assistants is proving difficult.

This chapter reviews recent reforms and proposes directions to improve the effectiveness of its educational policies. The first section describes the structure of the education system. The second section discusses how to support a high-quality education system, by improving the efficiency of public spending, finding the right balance between centralisation and school autonomy and supporting innovative and effective teaching practices. The final sections explore policy options to support quality teaching and make the teaching profession more attractive, reduce inequalities in educational outcomes, ensure a smooth transition from education to employment and improve student well-being.

Overview of the French education system and its outcomes

The governance of the French education system is highly centralised

France has a centrally governed education system, mostly funded by the State (OECD, 2020[1]). The Ministry of National Education and Youth (*Ministère de l'Éducation Nationale, de la Jeunesse*, MENJ) is responsible for pre-primary to upper-secondary schooling. The State defines curricula and recruits, trains and oversees school managers and teachers in public institutions (OECD, 2020[1]). The Ministry develops national standards, organises exams and defines national qualifications (Box 5.1).

Box 5.1. The French school system

Students attend from pre-primary through to a general or vocational high school

Since 2019, France is one of the few countries where school at the age of 3 is compulsory, remaining so until the age of 16, and almost 100% attend school between the ages of 3 to 17 (OECD, 2022[2]). Since 2020, some form of training is compulsory for 16-18-year-olds who leave school but are not employed (MENJ, 2023[3]). Children begin with three years in pre-primary school, followed by five years in primary school four years of lower-secondary school and three years of upper-secondary school (Table 5.1).

Table 5.1. The French primary and secondary education system

ISCED	Cycle	Starting age	School level (bold) or year in the school system		
			Primary school / Premier degré		
020		**3**	**Pre-primary school / École maternelle**		
	1		*Petite section (PS)*		
			Moyenne section (MS)		
			Grande section (GS)		
1		**6**	**Primary school / école élémentaire**		
	2		*Cours préparatoire (CP)*		
			Cours élémentaire première année (CE1)		
			Cours élémentaire deuxième année (CE2)		
	3		*Cours moyen première année (CM1)*		
			Cours moyen deuxième année (CM2)		
			Secondary school / Second degré		
2		**11**	**Lower-secondary school / collège**		
			Sixième		
	4		*Cinquième*		
			Quatrième		
			Troisième		
			Qualification: National diploma of the Brevet / *Diplôme National du Brevet*		
3		**15**	**General and technological upper-secondary school / lycée général et technologique**	**Vocational upper-secondary school / lycée professionnel**	
			Seconde générale et technologique	*Première année*	*Seconde professionnelle*
			Première générale	*Première technologique*	*Deuxième année*	*Première professionelle*
			Terminale générale	*Terminale technologique*	**Qualification**: Vocational aptitude certificate / Certificat d'aptitude professionnelle, CAP	*Terminale professionnelle*
			Qualification: General baccalaureate / Baccalauréat général	**Qualification:** Technological baccalaureate / Baccalauréat technologique		**Qualification:** Vocational baccalaureate / Baccalauréat professionnel

Source: Ministry of National Education and Youth.

At upper-secondary school, students attend either a general or technological school (three years) or a vocational school (two or three years). In both tracks, students take core subjects, such as moral and civic education, history and geography, and modern languages, in addition to their specialty subjects. The general track includes various specialty courses, which replaced the three traditional literary, economic and social, and scientific options in 2019. Obtaining the general and technological Baccalaureate is based on continuous assessment (40%), and the final Baccalaureate exams (60%). In 2022 around 40% of students in upper-secondary education chose the vocational track, compared to 44% across the OECD (OECD, 2023[4]). Students can prepare to sit the vocational aptitude certificate (*certificate d'aptitude professionelle*, CAP) after two years or the professional Baccalaureate after three years. Students who sit the CAP can also choose to undertake an additional two years to complete a professional baccalaureate. In the professional Baccalaureate, 40-60% of students' time includes learning professional techniques in workshops, classrooms and in firms, in addition to general education courses. To obtain the professional Baccalaureate, students sit an exam or receive a validation of acquired experience (*validation des acquis de l'expérience*, VAE). All holders of the Baccalaureate may continue to tertiary education but, generally, those holding the vocational Baccalaureate are more successful in short-cycle tertiary programmes than in bachelor's programmes.

Local authorities have a number of education-related responsibilities, such as the construction and maintenance of school buildings, school transport, school meals, the provision of teaching materials and recruiting and managing non-teaching staff (OECD, 2020[1]). The local authority responsible varies across levels of education: municipalities (*communes*) are responsible for pre-primary *(maternelle)* and primary *(élémentaire)* schools, departmental authorities (*départements*) for lower-secondary institutions, and regional authorities (*régions*) for upper-secondary institutions.

France has 18 academic regions (*régions académiques*), grouped into between 1 and 3 *académies,* or educational districts, resulting in 30 *académies* in total. The *académie* is the administrative district of reference for the French education system. The *rectorat* implements national education policies at the level of the *académie.* The *recteur* and their services are responsible for implementing education policy and work in collaboration with the relevant local authorities.

Several structures, some consultative, provide guidance to decision-making bodies in the education sector (OECD, 2020[1]). The *Conseil de l'évaluation de l'école* (School Evaluation Council, CEE), established in 2019, independently evaluates all schools. The *Conseil national de la refondation* (National Refoundation Council, CNR), under its wider goal of finding concrete solutions on the major transformations to come, aims to develop innovative educational projects that meet local needs, improve students' outcomes and wellbeing and reduce inequalities.

Educational outcomes are around the OECD average but more unequal

French students perform at a level similar their OECD peers in the OECD's Program for International Student Assessment (PISA). Since 2003, 15-year-old French students have performed around the OECD average in mathematics and science (Figure 5.1). However, based on the TIMMS mathematics and Pirls science assessments, around 10-year old French students (*CM1*) have been performing below their OECD counterparts since 2011. In 2022, about 7% of French students were high performers in mathematics (PISA level 5 or above), below the OECD average of 9%, while 28.8% did not achieve minimum proficiency (below PISA Level 2), slightly below the OECD average of 31.1%. In 2022, French students performed around the OECD average in reading. France spends more than the OECD average as a share of GDP and per student on the educational system, raising questions about the system's effectiveness considering France's middling educational performance (see below).

While PISA scores declined across most OECD countries in 2022, French students PISA scores fell by more than the average OECD country across all three areas, particularly in reading (OECD, 2023[5]). This

brings French students PISA scores to their lowest measured levels in PISA. The long-term trajectory differs across subjects. In mathematics, the large decline witnessed in 2022 is unprecedented and follows a period of relative stability. In reading, PISA scores have been declining since 2012. In science, the change is not statistically significant.

Figure 5.1. France performs slightly above the OECD average in PISA but well below in other tests
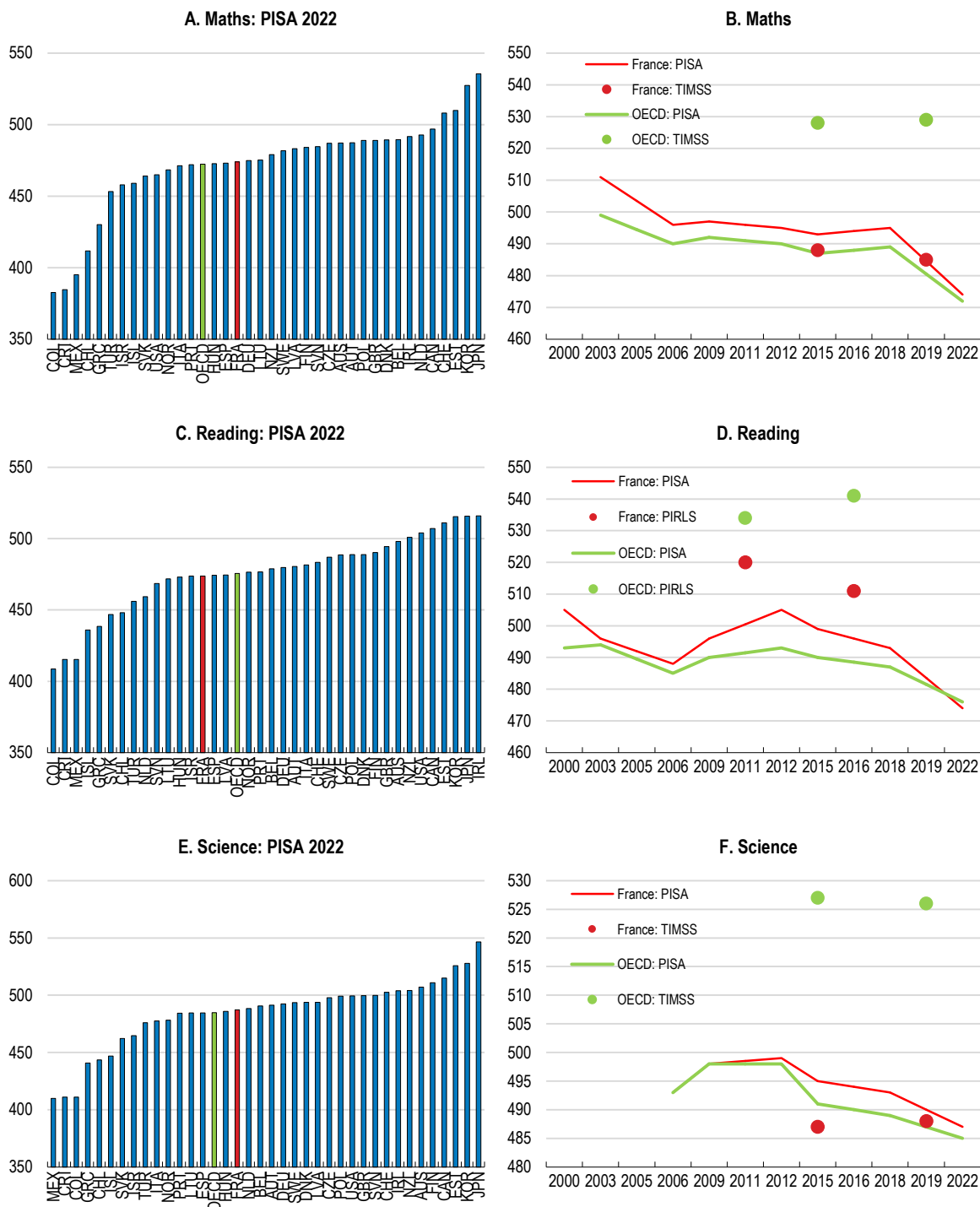
Source: OECD Program for International Student Assessment (PISA), 2022 Reading, Mathematics and Science Assessment.

StatLink https://stat.link/e0b3jt

While on average across OECD countries, students from disadvantaged socio-economic backgrounds perform less well than advantaged students, this effect is even larger in France. This highlights one of the key challenges for the French education system. In 2022, students' mathematics performance was strongly correlated with their socio-economic and cultural status, predicting 21.5% of the variation in test scores compared to only 15.5% in the OECD. However, this gap does not appear to have increased over the past decade in France. Students from advantaged socio-economic backgrounds, with a non-immigrant background, and in schools where learning is less hindered by bullying score higher in PISA and even more so than in the average OECD country (Figure 5.2). Disadvantaged students are 10 times more likely not to reach minimum proficiency in mathematics than their advantaged peers, compared to 7 times for the OECD average.

Figure 5.2. Students' performance is highly linked to certain characteristics

Score point differences in maths performance by student characteristics

Note: The score point difference in maths, except for the variable: Girls outperform boys *in reading*. Represents the simple difference in scores, not controlling for any other explaining factors. Rural students are those attending a school in an area with up to 100,000 inhabitants. Schools where learning is less hindered by bullyi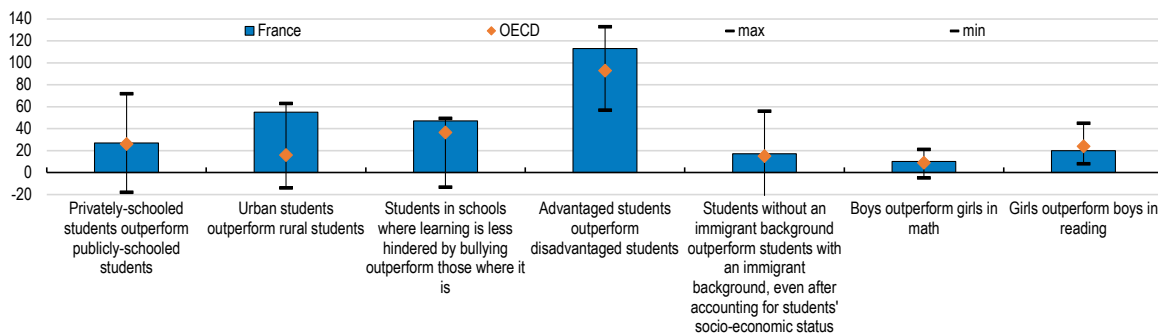ng is where principals replied that the learning of students is not at all or very little hindered by bullying compared to some extent or a lot. A socio-economically advantaged (disadvantaged) student is in the top (bottom) quarter of the PISA index of economic, social and cultural status (ESCS).
Source: OECD Program for International Student Assessment (PISA), 2022 Reading, Mathematics and Science Assessment.

StatLink 🔗 https://stat.link/k1xoi6

Box 5.2. The impact of educational policies on education outcomes and productivity

Exploring the factors behind education outcomes can provide interesting insights for policy design. The link between education policies and outcomes as measured by students' test scores can be analysed by estimating an education production function across OECD countries (Egert, de la Maisonneuve and Turner, 2023[6]). This analysis connects PISA scores to inputs including educational policies measured at the country, school and individual levels and a range of school and student characteristics. Several factors can be identified as being associated with better educational outcomes, including at least one year of early childhood education, the share of teachers with a master's degree, greater accountability for schools and lower income inequality.

The link between these factors and PISA scores can then be extrapolated towards aggregate productivity developments, for which human capital is an important driver (Egert and Gal, 2016[7]). A new measure of human capital combines students' PISA scores and mean years of schooling with estimated elasticities that suggest that the 'quality' dimension of education, as measured by PISA scores, is more important than the quantity dimension (Égert, de la Maisonneuve and Turner, 2022[8]). The impact of the policies outlined above are estimated to impact aggregate productivity through the human capital channel by between ½ to 5% on average across OECD countries.

Re-estimating the above analysis on French data only illustrates if policy changes could have a differing impact on educational performance in France. This re-estimation also adds additional control variables that differ in France from the OECD average, including the disciplinary climate and teachers' satisfaction in teaching. Overall, this analysis suggests that an increase in the average PISA score in France, as a result of students achieving the average score of the top 10 performing OECD countries in each of reading, science and maths, would increase productivity by 2.7% (Table 5.2). The policies outlined above, as well as the additional control variables added to the re-estimation for France, outline ways in which France could achieve this increase in its average PISA score. An increase in girls' maths performance, boys' reading performance, improvements in teachers' satisfaction in teaching and the disciplinary climate and an increase in schools' accountability in France would boost productivity by a combined 1.2% (Table 5.2). In France, attendance in early-childhood education is already universal.

Table 5.2. Effect of improving educational performance on aggregate productivity in France

Variable	Impact on aggregate productivity in France
An increase in PISA scores to the average of the top 10 OECD countries	**2.7%**
Estimated impact of how various policies could contribute to this increase:	
An increase in girls' performance in maths to that of boys	0.2%
An increase in boys' performance in reading to that of girls	0.2%
An increase in teachers' satisfaction to the average of the top 10 OECD countries	0.2%
An increase in disciplinary climate to the average in the top 10 OECD countries	0.3%
An increase in accountability to the average of the top 10 OECD countries	0.3%

Note: The estimates control for public/private school, school size, age, socioeconomic background and its within-school dispersion, gender and language spoken at home. See Égert, de la Maisonneuve and Turner (2023[6]) for further details.
Source: Estimates based on the model in Égert, de la Maisonneuve and Turner (2023[6]), *Quantifying the effect of policies to promote educational performance on macroeconomic productivity,* OECD Economics Department Working paper.

Supporting a high-quality education system

Balancing centralisation and school autonomy

The distribution of educational decision making between national, regional and local authorities, and schools is a much-debated topic in many OECD countries, including in France (OECD, 2020[1]). Centralisation can cause delays in decision making and fail to address local needs while decentralised systems can result in differing educational outcomes across geographical areas (OECD, 2023[4]). In France, 55% of decisions at the lower secondary level were taken centrally in 2017, compared to 24% for the average OECD country (OECD, 2018[9]). Despite recent efforts, primary schools have more limited autonomy and are not institutions in the sense that they do not have a legal status like that of secondary schools, which are deemed *établissements publics locaux d'enseignement (EPLE)*. Results from PISA suggest that appropriately combining autonomy and accountability is associated with better student performances (OECD, 2023[10]). In recent years across OECD countries, many schools have become more autonomous and decentralised, as well as more accountable to students, parents and the wider public (OECD, 2023[4]), although there are varying degrees and types of autonomy (Smidova, 2019[11]).

The French system combines centralisation, devolution at academy level and decentralisation at local authority level. The State takes decisions on planning and structures, defines pedagogical guidelines and curricula and carries out the recruitment, training and management of teachers and school management staff in public schools (OECD, 2018[9]; 2020[1]). It also decides the career structure of teachers and school leaders and how they are remunerated and is involved in the oversight of teachers and supervisory staff in private schools, notably through certification programmes. On average, increases in school responsibility

for selecting teachers have been associated with improvements in test scores (OECD, 2018[12]), and higher school autonomy in appointing or hiring teachers is associated with a more even distribution of experienced teachers across schools (OECD, 2022[13]). School autonomy in staffing practices may also only translate into greater equity in student performance if it is accompanied by higher levels of accountability (OECD, 2018[14]; 2016[15]; Torres, 2021[16]). The degree of autonomy granted to schools is closer to or above the OECD average in terms of allocating the school's budget, student disciplinary measures and the choice of teaching resources.

School autonomy requires investment in school leadership and management capacity, with the effects of autonomy dependent on schools' ability to make use of it. The status of school leaders in France differs by education level (OECD, 2020[1]). At the primary level, school principals (*directeurs d'école*) are teachers who, while retaining their teacher status, take on administrative and pedagogical leadership tasks, generally on a part-time basis and have little hierarchical power over other teachers (OECD, 2020[1]). While the 2023 Rilhac law (*loi Rilhac*) and subsequent legislation provided school leaders at the primary level functional authority over persons present in the school during school time, clarified their duties, affirmed their role in leading the school's pedagogical practices, and introduced a system of accelerated career advancement for work undertaken in the capacity of school leader, they do not have hierarchical authority over the school's teachers. School leaders can draw on various resources to help support them in this role, particularly with respect to training and assessment. At secondary level, public schools are run by school leaders (*chefs d'établissement*) who are appointed either through a competitive examination, from a selection list of suitable candidates or via a secondment. School leaders in secondary education have considerable responsibility for school organisation and the school climate (OECD, 2020[1]). School heads in primary education earn 25% less than school heads in secondary education, the second largest difference in remuneration between the two levels of education across the OECD, after England. School heads in primary schools earn 93% of the remuneration of a tertiary-educated worker, compared to 125% for a school head in secondary education (OECD, 2023[4]). Strengthening the role, responsibilities and career paths of school leaders, particularly in primary education and for those working in challenging contexts, would support the quality of the education system (OECD, 2020[1]).

Improving the training for school leaders could support their performance, as targeted in the reform currently underway. At each level of education in France, management staff undergo statutory initial training during their first year in the role yet receive little training in pedagogical management (OECD, 2020[1]). Additionally, in 2018, at the lower secondary level, only 43% had attended courses or seminars on teaching methods or other aspects related to pedagogy in the last 12 months. This is the lowest share in the OECD, where the average was 70% (OECD, 2019[17]).

The autonomy and accountability of schools can be supported by effective school evaluations, which occur in varied ways across OECD countries (OECD, 2023[18]). In France, the autonomy of schools goes alongside assessment procedures conducted by the School Evaluation Council *(Conseil d'Évaluation de l'École, CEE),* an independent body which evaluates around 20% of schools each year based on the decisions they have taken within the realm of their autonomy. With its first evaluations occurring in 2020, the CEE estimates it will have evaluated around 50% of all schools by the end of the 2022/23 school year (CEE, 2023[19]). School evaluations help enhance the quality of the education system and the findings can be used to inform policy and practice. Schools first self-evaluate before the CEE follows up with an on-site visit then provide their evaluation and recommendations. The CEE publishes its results publicly to promote a collective learning process.

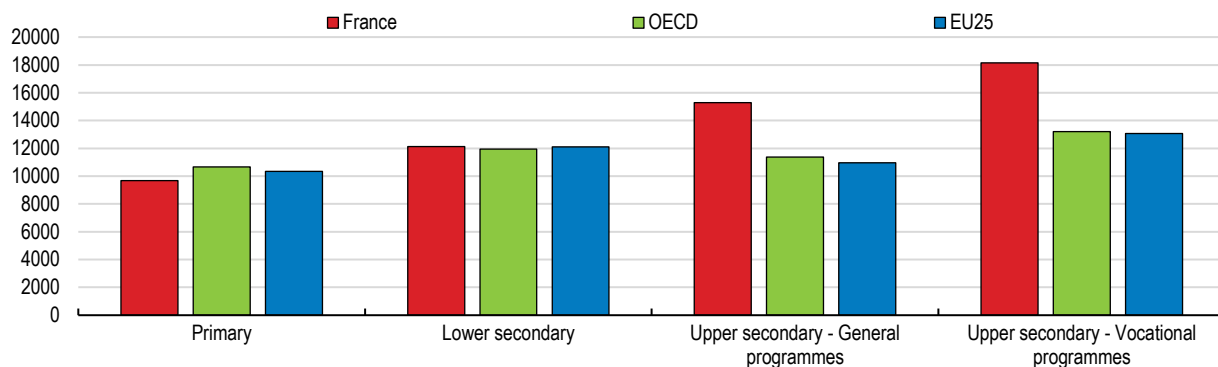### *Continuing to rebalance spending from secondary to primary schools*

Relative to the OECD average, France spends a smaller share of GDP on primary education than the OECD average (1.3% of GDP compared to 1.5% of GDP), and more on secondary (2.6% compared to 2.1%) (OECD, 2023[18]). It is difficult to assess the optimal resources needed to prepare young people for life and work in modern societies and labour markets. Across OECD countries, higher levels of spending on education do not necessarily translate into better education outcomes, with the effectiveness and implementation of policies also a key contributor (OECD, 2020[20]). However, international comparisons of spending can provide useful reference points (OECD, 2023[4]).

France's education system is largely funded by the central government. In 2020, 91% of expenditure on educational institutions was financed by public funds, similar to the OECD average (OECD, 2023[18]). Around 74% of public spending was financed by the central government, 15% by regional governments and 11% by local governments, against respectively 45%, 15% and 40% on average across OECD countries. The State pays the salaries of teachers in public schools and those private schools under contract of the State (*privé sous contrat*), which account for almost all private schools (OECD, 2020[1]). Physical operations, including school buildings, transport and teaching materials, and the recruitment and management of non-teaching staff are financed by municipalities for primary schools and departmental and regional authorities for secondary schools. Departmental and regional authorities and municipalities also contribute to the financing of private schools under contract (OECD, 2020[1]). While France spends more on education as a share of GDP than the average OECD country, excluding tertiary education, they spend less as a share of total public spending (6% compared to 7.5%), reflecting a relatively high level of public spending (see Chapter 2). From the 9% of education spending financed from private funds, around two-thirds came from household contributions in the form of tuition fees.

France spends less than the OECD average per primary student and more per upper-secondary student than the OECD average (OECD, 2023[18]) (Figure 5.3). This gap in spending per primary and secondary student is relatively large. While OECD countries spend 13% more per secondary student than primary student on average, France spends 43% more, partly due to more favourable student-teacher ratios in vocational education.

Figure 5.3. Annual expenditure is higher per secondary than per primary student

Total expenditure on educational institutions per full-time equivalent student (2020), in equivalent USD converted using PPPs for GDP

Note: Spending on vocational education includes *lycées agricoles* and *centres de formation en alternance (CFA.)*
Source: OECD Education at a Glance 2023.

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Continuing to rebalance spending towards primary education could help to limit the accumulation of unequal student performance and improve educational outcomes for a given amount of public spending. Correlations of learning outcomes with socio-economic backgrounds increase during a student's primary

education, particularly in mathematics (France Stratégie, 2023[21]). Continuing to address the sources of these inequalities in primary school could help limit the number of students falling behind at a young age, and the need for remedial measures in secondary school.

Average spending per student also reflects higher spending on students attending schools in disadvantaged and rural areas in both primary and secondary schools. The education system allocates additional resources to disadvantaged schools in its Priority Education Networks *(Réseaux d'Éducation Prioritaire, REP)* and Reinforced Priority Education Networks *(Réseaux d'Éducation Prioritaire Renforcés, REP+).* This aims to reduce the impact of social and economic inequalities on educational success, largely in the form of additional teaching resources (OECD, 2020[1]) (see below). Each *recteur* also allocates additional resources to some schools outside of the priority education system through local support agreements *(contrats locaux d'accompagnement, CLA).*

While spending on primary education remains lower, over recent years, France has made efforts to increase resources in primary schools, including through a 2013 law *(loi pour la refondation de l'école de la République)* and a more recent one of 2019 *(loi d'une école de la confiance).* Spending on primary education increased by 41% between 2012 and 2020 compared to a 30% increase in total spending per student. Nevertheless, continuing to rebalance the distribution of spending between primary and secondary schools could provide greater support to young people in the early years of their education (OECD, 2020[1]; 2022[2]; 2023[4]). As student numbers continue to decline in primary education and start to decline in secondary education in 2024 (DEPP, 2023[22]; 2022[23]), France is facing choices around its future education spending. Continuing to reflect on how to harmonise public services in sparsely populated areas will help support an efficient and quality education system across the country, even if this is an administratively complex endeavour with many actors involved.

Supporting innovative and effective teaching practices

Education systems are more effective when teachers use teaching practices that develop students' full potential, regardless of their socio-economic background, native language or migrant status (OECD, 2018[24]). What teachers do is the strongest direct school-based influence on learning outcomes (Hattie, 2009[25]), with other school factors mostly influencing learning by influencing teachers' practices.

OECD TALIS and PISA data show that cognitive activation has positive effects on student learning, attitudes and motivation (OECD, 2019[17]; 2018[24]; Echazarra et al., 2016[26]; OECD, 2018[24]). Constructivist approaches focus on cognitive activation and promote the development of a student's analytical and critical thought, reasoning process, self-inquiry, peer-collaboration and problem solving. The approach considers students as active participants in the process of acquiring knowledge and consists of practices capable of challenging students to motivate them and stimulate higher-order skills, such as critical thinking, problem solving and decision making. This compares to teacher-directed instruction where the teacher is the main actor responsible for transmitting knowledge and skills to students. It includes practices based on lecturing, memorising and repetition. However, a balanced use of knowledge transmission and independent and collaborative work likely supports students' learning, with traditional practices positively associated with repetitive tasks and more modern approaches linked with high-level problem solving (Echazarra et al., 2016[26]; Le Donné, Fraser and Bousquet, 2016[27]). The issue may be for the teacher to find the right balance of approaches, including when, in what way and with which students it is appropriate to use each type of practice.

Despite their effectiveness, constructivist approaches and cognitive activation practices appear to be less widespread than teacher-directed instruction across OECD countries. In 2018, France performed below the OECD average on three measures of cognitive activation (Figure 5.4, Panel A) (OECD, 2019[17]; DEPP, 2019[28]).This may be related to the fact that only 37% of teachers felt well or very well prepared in general pedagogy, compared to 70% in the average OECD country (OECD, 2019[17]). Moreover, 70% of lower-

secondary school leaders highlighted the lack of teachers who can take care of students with special educational needs, which is above the 32% OECD average.

Teaching practices linked to "enhanced activities", such as giving students projects that require at least one week to complete or letting students use ICT for projects or class work are also used less frequently than in other OECD countries (Figure 5.4, Panel A). As of the start of the 2024 academic year, mathematics programmes in primary schools will adopt a concrete and visual approach inspired by the "Singapore method". The National Council for the Refoundation of Education, "Our School, Let's Build it Together" *(Conseil National de la Refondation Education, "Notre École, faisons-la ensemble"),* aims to boost the success and well-being of students while reducing inequality in schools through innovation, among other approaches (see below).

Figure 5.4. French teachers use cognitive activation practices less often, but provide more feedback

A. Percentage of lower secondary teachers who "frequently" or "always" use the following practices in their class

B. Percentage of lower secondary teachers who reported "frequently" or "always" use the following assessment methods in their class
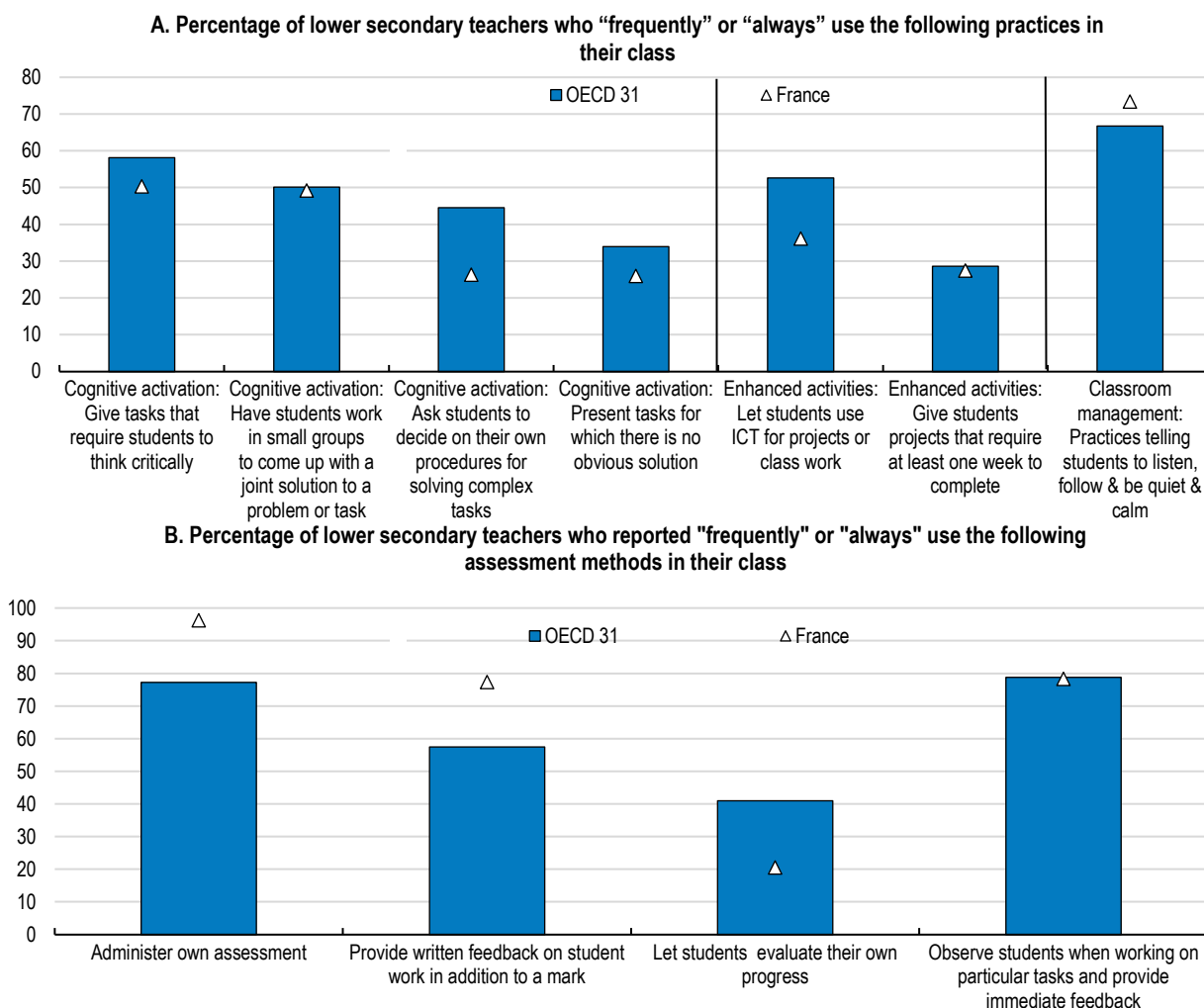
Note: ICT stands for Information and communication technology. Classroom management is an average of: tell students to follow classroom rules; tell students to listen to what I say; calm students who are disruptive; and when the lesson begins, tell students to quieten down quickly.
Source: OECD TALIS 2018.

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Effective teaching also includes providing constructive feedback (Hattie, 2009[25]). Teachers in France do this more often than in the average OECD country, both when it comes to administering their own assessment or providing written feedback in addition to a mark. Practices are similar to the OECD average with respect to observing students on particular tasks and providing immediate feedback compared to the

average OECD country (Figure 5.4, Panel B). Marking student work can update teachers on student progress, enabling them to determine what subject content and teaching practices to use, while giving students regular feedback on their progress and ways to improve (OECD, 2021[29]). While useful, it must be balanced with teachers' workload, which can be alleviated by effectively using technological tools (OECD, 2021[29]).

Supporting teachers with continuous training on innovative practices, sufficient time to plan and deliver lessons, support and feedback and collaboration across colleagues could help them implement a diversified use of innovative pedagogical practices (OECD, 2020[1]). Teachers' self-efficacy is strongly correlated with their pedagogical practices and the quality of their instruction (see below) (OECD, 2021[29]; 2020[1]). Teachers from the same school tend to share a more similar approach to teaching than two teachers in different schools. This finding suggests that teaching practices are part of a "teaching culture" within the school, which can be influenced by many factors, including the school leader (Le Donné, Fraser and Bousquet, 2016[27]). For the start of the 2023 school year, France has introduced a "Teacher's Pact" *(Pacte Enseignant),* which includes missions to coordinate and manage one or more pedagogical innovation projects in schools. This could also help adapt the teaching culture.

Class size is another factor that affects teachers' working conditions, their ability to manage their class and the type of teaching practices that teachers can use. At the same time, the evidence on the impact of class sizes on students' education outcomes is mixed. In France, class sizes in public primary schools have fallen from 23.5 students per class in 2015 to 21.1 in 2022 as a result of both demographics and a policy aimed at reducing class sizes in priority education. This trend is in part due to a decline in student numbers in addition to a notable decline in average class sizes in priority education areas, where the average class size fell from 22.7 students per class in 2015 to 16.7 in 2022 (DEPP, 2023[30]). Data from TALIS 2018 show that smaller classes tend to be associated with more actual teaching and learning time, but that they are not related to teachers' use of cognitive activation practices nor reported self-efficacy in teaching (OECD, 2019[17]). Smaller class sizes may be beneficial in some cases, such as for students from disadvantaged backgrounds (see below) (Dynarski, Hyman and Schanzenbach, 2013[31]). Across high-performing countries in PISA, there is significant variation in class sizes, ranging from 20 to 42 (OECD, 2021[32]). The positive effects of reducing class sizes may be undermined if challenges in teacher quality are not addressed (OECD, 2018[14]). Given that reducing class sizes is costly, it is important to compare its impact with that of other ways to increase the quality of teaching, such as improving teachers' salaries and working conditions and fostering new approaches to teaching and learning (OECD, 2022[33]).

The emergence of artificial intelligence (AI) opens up new perspectives in the field of education. AI can free up time for teachers but also help better adapt lessons to each student. The application of AI tools is particularly promising for students with disabilities, notably those suffering from hearing or visual impairment, as they facilitate the use of subtitling and automatic reading (OECD, 2023[34]). However, the development of AI is accompanied by risks, such as threats to data security, inequalities in access or weakening the essential student-teacher relationship. Furthermore, the social acceptability of these new tools is not always easy (Vincent-Lancrin and van der Vlies, 2020[35]; OECD, 2023[34]). The dissemination of educational tools and materials using AI is still in its infancy across the world (OECD, 2023[34]). The United States is a pioneer in this area, with first experiments in 2012 with the Teach to One program (Vincent-Lancrin and van der Vlies, 2020[35]). France is one of the countries that already uses AI in school teaching, for example with the "MIA Seconde" tool, which allows students to train in mathematics and French.

Developing an attractive teaching profession to support teaching quality

Teaching quality is by far the most effective way for schools to raise students' cognitive and social-emotional skills (OECD, 2022[13]; Hattie, 2009[25]; Rice, 2003[36]; Seidel and Shavelson, 2007[37]). Factors that can be influenced by teachers are found to have a strong and lasting impact on former students' educational attainments and earnings (Chetty, Friedman and Rockoff, 2014[38]; Hanushek and Rivkin, 2010[39]; Kane and Staiger, 2008[40]).

Teachers in France are amongst the most qualified across OECD countries. In 2018, 70% of teachers had a master's degree or higher, a requirement since 2010, compared to 45% in the average OECD country (OECD, 2020[1]). France has a model for teachers where entry into the profession is competitive, career development is extensively regulated and lifetime employment is largely guaranteed, similar to Italy, Japan and Korea (OECD, 2018[14]). As teachers cannot easily be removed for unsatisfactory performance, the quality of their work mainly depends on setting high standards for entering the profession and on the quality of initial education and continuous training.

To become a teacher, candidates must obtain a master's degree, although mid-career pathways for professionals with a tertiary qualification are available. Teachers pass a competitive entry examination to become a trainee teacher (OECD, 2022[2]). Primary school teachers, or "*professeurs des écoles*" (ISCED 02-1), must pass the "*concours de recrutement de professeurs des écoles*" (*CRPE*) examination to teach in a particular *académie* (educational district) in France. Secondary teachers (ISCED 2-3) can sit one of several examinations depending on their subject. The most prevalent is the "*concours du certificat d'aptitude au professorat de l'enseignement du second degré*" (*CAPES*), to become a "*professeur certifié*". The highest and most well-remunerated qualification requires passing the rigorous "*aggrégation*" examination to become a "*professeur agrégé*". All teachers must complete a one-year paid traineeship after which a jury determines whether they can be granted the status of teacher and become civil servants.

As in many OECD countries, France is struggling to attract and retain teachers, particularly in certain subjects, such as maths, chemistry, physics and languages, and in some geographic areas, notably the Greater Paris region, where student numbers have grown more strongly. Secondary teachers are in principle placed in a school in any part of the country, although preferences are considered.

After a strong decline in the recruitment of teachers between 2005 and 2015, recruitment indicators are starting to improve (Cour des Comptes, 2023[41]). Nevertheless, in the 2022 national examinations, four *académies* were unable to fill all available teaching positions (DEPP, 2023[42]). The share of teachers voluntarily leaving the profession has also been accelerating since 2012 (Figure 5.5). The use of contract teachers has increased steadily over the past decade to 2% of primary teachers and 10% of secondary teachers in 2022/23 (DEPP, 2023[42]), while reaching up to 27% in French Guiana and 51% in Mayotte in 2020/21 (Cour des Comptes, 2023[41]). As in many OECD countries, the profession is dominated by women. In 2022, women made up 85% of primary and 59% of secondary teachers (DEPP, 2023[42]).

Several factors are reducing the attractiveness of the teaching profession, including relatively low remuneration, a lack of career perspectives and not feeling valued by society (MENJ, 2023[43]; OECD, 2020[1]). Surveys found that in 2023, only 14% of teachers and 27% of the broader public would recommend becoming a teacher and only 23% of respondents agreed that teachers are respected, despite 58% agreeing that teachers work hard (UNSA Éducation, 2023[44]; Ipsos, 2023[45]). In 2018, only 7% of French teachers reported feeling valued by society compared to 26% in the OECD (OECD, 2020[46]). In 2022, 63% of tertiary students cited reasons linked to salary and working conditions as to reasons for not wanting to become a teacher (Ispos / Cour des Comptes, 2022[47]). Engaging in a system-wide reflection across stakeholders on how to re-create a valued teaching profession would help to attract and retain teachers, both through a salary that is aligned with teachers' workloads and through improved work conditions.

Figure 5.5. The share of teachers and particularly trainees leaving the profession has accelerated

Percentage of teachers
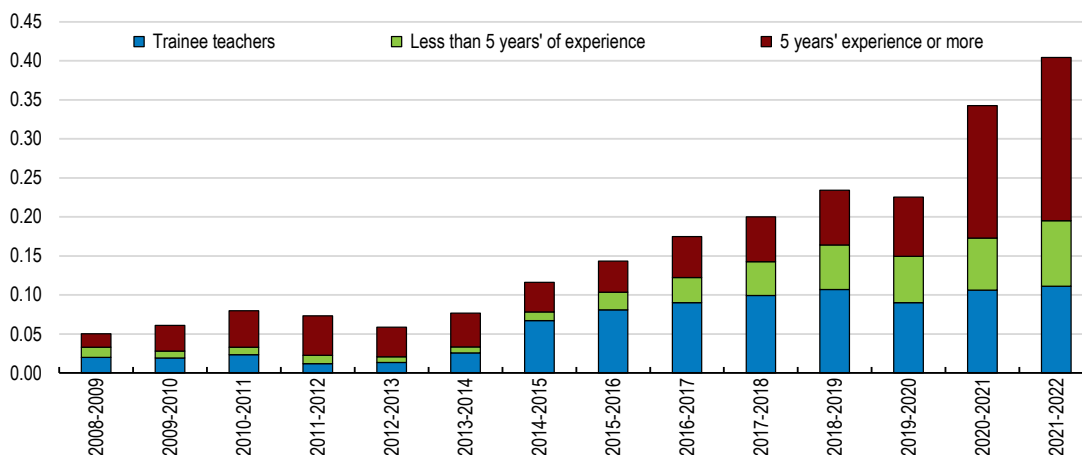
Source: DEPP (2023[42]).

Ensuring that salaries are commensurate with teachers' responsibilities and workloads

Teachers' salaries impact the attractiveness of becoming a teacher and better salaries draw more capable people to the profession (Fullard, 2021[48]). In 2022, 55% of primary teachers and 60% secondary teachers in France chose purchasing power as one of the three priority areas to be improved for their job, while 48% of primary and 39% of secondary teachers selected workload (DEPP, 2023[49]).

The statutory salaries of teachers with the most prevalent qualifications in France were below the OECD average in 2022 (OECD, 2023[4]). Statutory salaries are those that are set out in the official national salary scales, plus any bonuses received by all teachers (OECD, 2023[50]). In France, the salary progression for early-career teachers is relatively slow. As a result, the gap in statutory starting salaries between France and the OECD average peaks at 19% and 18% for primary and general upper-secondary teachers with 15 years of experience compared to around 4-5% for starting and top salaries. While salaries at the top of the scale are well above the OECD average, it takes 35 years of experience to attain this salary compared with 25 years in the average OECD country (OECD, 2023[4]). In 2022, primary teachers earned 9% less than upper-secondary teachers at the start of their career and 8% less after 15 years in the job, compared with 8% and 7% less for the OECD average.

Actual salaries can provide additional information on what teachers receive on their payslip, incorporating payments or bonuses related to additional responsibilities or teachers' characteristics (OECD, 2023[50]). In France there are numerous bonuses, including those for working in a disadvantaged area classified as REP or REP+ or taking on the role of class or form teacher (*professeur principal*) in secondary schools. Also, 6% of lower-secondary and 29% of upper-secondary teachers have the aggregation qualification, the highest level of accreditation, and receive higher salaries and teach fewer hours than teachers with the most prevalent qualification, inflating teachers' 'average' salary. While a difference in salaries can be justified, the fact that teachers with the aggregation qualification teach fewer hours appears questionable.

As in almost all OECD countries, teachers' average actual salaries are lower than other career options with a tertiary qualification (Figure 5.6). This limits the ability of the profession to attract and retain high-potential candidates (OECD, 2019[51]).

Figure 5.6. French teachers' salaries are below the OECD average

Actual salaries compared to those of tertiary educated workers
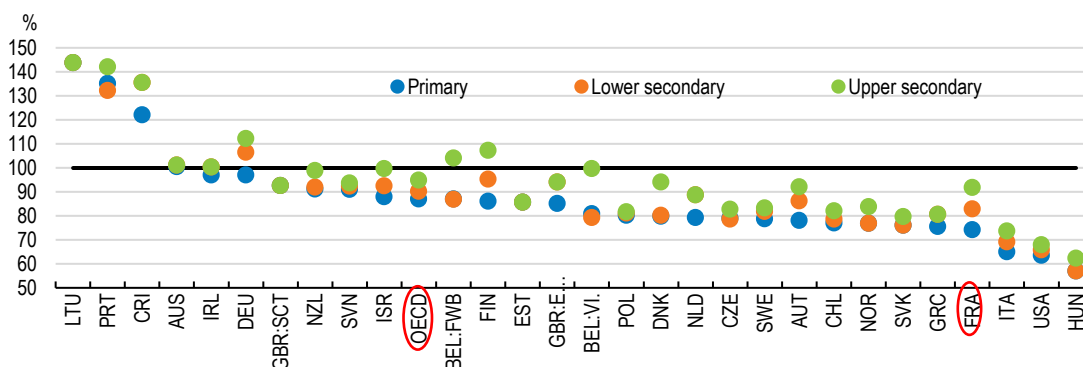
Note: Actual salaries of 25-64 year-old teachers. In equivalent USD converted using PPPs for private consumption. BEL:FWG and BEL:VI. stand for the Flemish and French communities of Belgium, GBR:ENG stands for England and GBR:SCT stands for Scotland.
Source: OECD Education at a Glance 2023.

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Teachers' salaries can also be analysed in the light of their teaching and total workload, with primary teachers in public institutions spending more time teaching than the OECD average, while secondary teachers have a teaching workload slightly higher than the OECD average (Figure 5.7). Primary teachers teach for 25% more than secondary teachers, a larger gap than in many OECD countries. In 2021, French teachers total statutory working time was also above the OECD average, which reflects the legal working time and includes the time involved to prepare lessons, correct students' work, collaborate with peers, communicate with parents and undertake professional learning (OECD, 2022[2]). In 2018, teachers cited working around 37 hours per week, slightly below the OECD average of 39 hours per week (OECD, 2019[17]). However, by 2018, half of teachers cited working around 43 hours per week (Dion and Feuillet, 2022[52]). In 2018, 60% of teachers reported that too much administrative work is a source of stress "quite a bit" or "a lot", compared to 49% in the OECD (OECD, 2020[46]). Reducing the burden of administrative work could help allow more time for professional development (see below).

Figure 5.7. French primary teachers teach for longer than OECD peers

Net statutory teaching time of teachers in public institutions, 2021
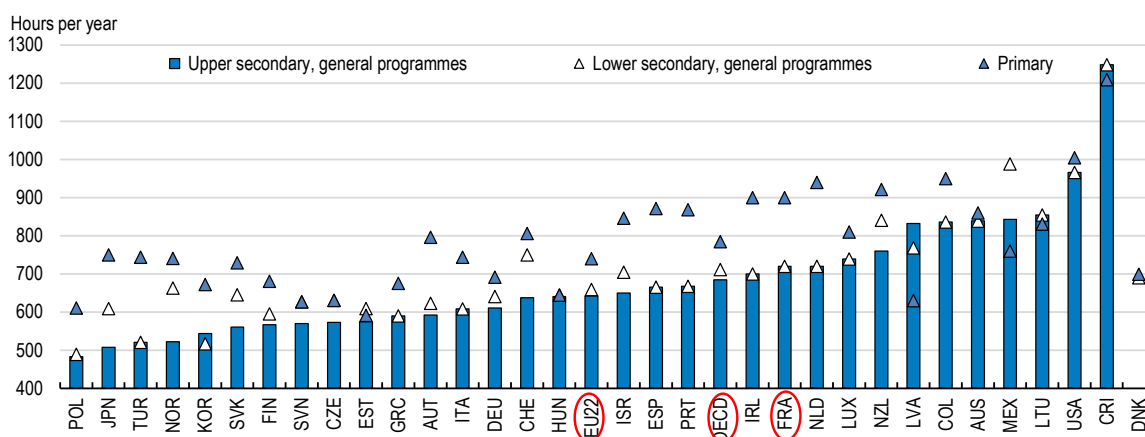
Note: In the USA, LVA and CHE, represents actual teaching time. In the USA, the reference year differs from 2021. In Japan, represents the average planned teaching time in each school at the beginning of the school year.
Source: OECD Education at a Glance 2022.

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While the French authorities have made efforts to improve teachers' remuneration over recent years, particularly since 2021, further increases would help to further support the attractiveness of the profession (Cour des Comptes, 2023[41]). For the 2023/24 school year, teachers' minimum net monthly salary increased to EUR 2100 and EUR 2466 for teachers working in disadvantaged areas classified as REP, largely benefitting early-career teachers (MENJ, 2023[53]). A total of EUR 7.7 billion has been allocated to salary increases between 2020 and 2024, with EUR 4.8 billion for 2023-2024 alone. However, the State's dialogue and commitment to salary progression has at times generated certain expectations for teachers which did not seem to be met. The 2023 "Teacher's Pact" (*Pacte Enseignant*) allowed teachers to earn more bonuses for certain additional tasks. The voluntary Pact was given a budget of around EUR 1 billion to cover these new tasks.

Continuing the recent increases to bring remuneration closer to the OECD average for primary teachers and teachers in the middle of their careers could be one part of boosting the attractiveness of the teaching profession (OECD, 2020[1]). For primary teachers this could include better reflecting in their statutory salary their lesser ability to earn bonuses compared to secondary teachers. While France offers a mid-career pathway into teaching, which can help mitigate immediate teacher shortages and diversify the profiles of teachers (Musset, 2010[54]), only two-thirds of teachers' previous experience is recognised in the remuneration scale for certified teachers. No previous experience of contract teachers is recognised, reducing the attractiveness. Recognising the skills and experience of mid-career professionals within the teaching pay scale could improve the attractiveness of this pathway.

While the teaching wage bill represents the largest single cost in formal education and fiscal consolidation remains a priority (see Chapter 2), the number of students is declining (DEPP, 2023[22]; 2022[23]). This reduction will autonomously lead to an adjustment in the number of teaching positions and could allow for adjustments to the structure of spending and be a lever for change (Cour des Comptes, 2023[55]).

Better supporting teachers' career prospects, working conditions and training

Improving pay alone will be insufficient to reverse the declining attractiveness of the profession (Cour des Comptes, 2023[41]), with education professionals dissatisfied by their career perspectives and not perceiving that their profession is valued by society (MENJ, 2023[43]). Many teachers cite being strongly motivated by the profession for social reasons, such as playing a role in the development of children and young people (92%) and contributing to society (83%) (OECD, 2019[17]). However, in 2022, French teachers gave a score of 5.9 out of 10 to the question whether they were satisfied with their work in general (DEPP, 2023[49]). Supporting teachers' geographic mobility, career perspectives and training, discussed below, would improve working conditions for teachers. These are important factors for teachers' job satisfaction and remain key goals for the Ministry. A staff well-being barometer has also been set up to monitor and understand changes in the quality of life at work for staff and diagnose the working conditions that are most conducive to improving it. The reduction in the number of students per class since 2015 has helped to improve these working conditions.

Additional measures targeting the particular challenges in regions facing shortages, including housing, teaching, training and financial support could help address the unequal attractiveness of the profession and the elevated recruitment needs in the Greater Paris region and in French Guiana and Mayotte. Further promoting geographical mobility may encourage more teachers to go to areas with high shortages for temporary periods whilst improving working conditions for teachers more generally, with 34% of early-career teachers, citing geographic mobility as a key priority for improvement (DEPP, 2023[49]). In France's centralised teaching model, geographic mobility for teachers is constrained, which can be particularly important for secondary teachers, whose regional preferences are not always taken into account. Teachers who have worked in disadvantaged areas and with more experience accumulate more points in their application to move across *académies*. In 2018, 26% of French teachers cited that they would like to change schools, compared to 20% in the OECD (OECD, 2020[46]).

In 2022, 22% of primary and 27% of secondary teachers selected career perspectives following the top-ranked purchasing power and workload, as one of the top three priority areas to be improved (DEPP, 2023[49]). Increasing the frequency of career meetings, which also clearly define teachers' training needs, could better support teachers to further develop their teaching practices, progress in their careers and improve their job satisfaction (OECD, 2013[56]). Teacher appraisals are infrequent and when they do occur, the emphasis placed on training needs varies considerably depending on the inspectors who conduct them (OECD, Forthcoming[57]). Since 2017/18, teachers have three appraisal meetings over their career, which occur every 7 years on average. This means that after 20 years of teaching many teachers no longer benefit from exchanges with inspectors on their professional practices whilst the challenges that teachers are facing are rapidly evolving. Moreover, some teachers have never benefited from an appraisal because it was introduced late in their careers (OECD, Forthcoming[57]).

Teachers and education professionals appear to have little buy-in for reforms and experience high levels of stress keeping up with changing policies. In. In 2018, 65% of teachers experienced quite a bit or a lot of stress keeping up with changing requirements from local or national authorities, compared to 41% in the OECD (Figure 5.8) (OECD, 2020[58]).

Figure 5.8. French teachers' experience high levels of stress keeping up with changing policies

Percentage of teachers for whom keeping up with changing requirements from local, municipal/regional, state or national/federal authorities is a source of stress "quite a bit" or "a lot"
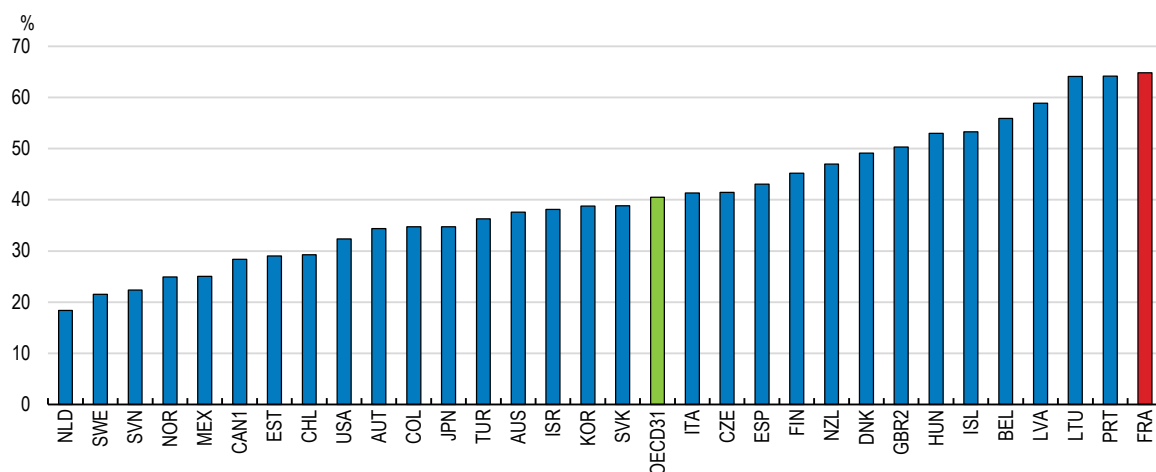
Note: 1. Alberta (Canada). 2. England (the United Kingdom).
Source: OECD (2020[46]).

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Initial training could better prepare teachers, by providing more practical experience and training from practising teachers. Recognising several challenges, in 2019, the French authorities reformed initial teacher training and its provider, creating the INSPÉ (*Instituts nationaux supérieurs du professorat et de l'éducation* or National Institutes of the Teaching Profession and Education), within universities (OECD, 2022[2]). While in 2022 the competitive national teaching exams were moved to the second year of the masters programme to put future teachers in front of students before sitting the exam, only one internship was offered for every 1.6 teaching students in primary and 1.5 students in secondary education, with differences across rectorates and disciplines (Billon, Brisson and Monier, 2022[59]). Ensuring that rectorates have sufficient resources, in part by ensuring a sufficient supply of teachers, would guarantee the access to practical experience that is stated in the curriculum. In the second year of the teaching masters' programme some students are being deterred from participating in practical experience, fearing a lack of time alongside preparation for the entry exams. Increasing the value of the practical experience of teaching students in their competitive exams could encourage greater participation (Billon, Brisson and Monier,

2022[59]). The authorities are currently considering giving more weight to work experience by developing practical, in-class training periods.

Extending the period of initial training in a teachers' early years could provide greater support and ensure the continued development of skills, particularly for those who transition into the profession mid-career. In 2022, 29% of primary and 24% of secondary teachers with less than 5 years of experience cited that support in early career was a key priority for improvement (DEPP, 2023[49]). While France is above the OECD average in terms of teachers' participation in induction activities during their first job, few benefit from co-teaching with experienced teachers (25% compared to an OECD average of 45%) and even fewer benefit from a reduction in their workload as part of their induction activities (8% compared to an OECD average of 21%). Furthermore, supervision by a tutor appointed as part of a formal scheme in the school is still relatively rare for early-career teachers, despite the extremely positive perception of this type of scheme by headteachers (OECD, 2020[46]; Forthcoming[57]).

While France has reformed the professional development system, it remains complex and could be made more efficient (OECD, Forthcoming[57]). It could also better incorporate the evolving research on educational practices. Continuous training can play a key role in developing the skills, knowledge and practices that enable teachers to deliver quality teaching (Boeskens, Nusche and Yurita, 2020[60]; OECD, 2019[51]) and teachers' participation in effective training is associated with greater confidence in their abilities and job satisfaction (OECD, 2019[17]; Boeskens, Nusche and Yurita, 2020[60]).

To provide a more accessible, more individualised and richer training offer for education professions, the Ministry of Education set up 30 new *Écoles académiques de la formation continue* (EAFC) in September 2022 (MENJ, 2022[61]). Primary teachers have a high level of participation in continuous training, with 18 mandatory hours annually, and while training is compulsory for secondary teachers, it is not included in their annual service obligations and only 59% took part in training 2021-2022 (MENJ, 2023[43]). While the EAFC are supposed to provide professional development opportunities for all education staff, the transition of the primary degree training offer under the EAFC has not yet been implemented in all *académies* (OECD, Forthcoming[57]). The professional development system also remains fragmented, including numerous players with a poorly defined distribution of responsibilities and often with different priorities. Rethinking the governance of the system and the roles and objectives of the EAFC and other training providers could support a reallocation of funds towards higher quality training (OECD, Forthcoming[57]). Promoting the pooling of resources between individual EAFCs could lead to further efficiency improvements.

Continuous training often doesn't meet teachers' needs and is of variable quality (OECD, Forthcoming[57]; Longuet, 2022[62]). Teachers in France are less well-prepared for the pedagogical aspects of their profession than their OECD peers, with only 66% of teachers having studied both the subject content and pedagogy of the subjects they teach, and had the opportunity to put them into practice with students, compared to 79% on average across the OECD (OECD, 2020[1]). To support professional practices, France is implementing a master plan for continuous training from 2022 to 2025. Training methods will be adjusted to not interfere with classroom time and better meet teachers' expectations.

A lack of qualified trainers and an inadequacy of training for trainers, with limited recognition and lack of adequate rewards for their work are making it difficult to attract and retain them and develop more innovative training. Providing more time released from regular duties for the role would support teachers with time constraints to work as tutors. The difficulty in replacing teachers on continuous training courses due to staff shortages is hindering participation in longer and better-quality training courses (OECD, Forthcoming[57]). Anchoring continuous training in working hours for secondary teachers could help for it to not be seen as a compromise with other duties. At the same time, shortages are increasing the use of contract staff who have high training needs, which cannot be met. While the Ministry of Education has introduced training and support programmes for contract teachers, the offer remains short, and insufficient

for entry into the job, resulting in teachers needing to heavily support contract teachers or contract teachers not benefitting from support (OECD, Forthcoming[57]).

Improving the limited incentives for continuous training would support the take-up of training (OECD, Forthcoming[57]). Many teachers view that initial training and success in the entry exam are sufficient for an effective career path afterwards (OECD, Forthcoming[57]). France's relatively flat career structure of teachers results in few opportunities for career progression that are tied to training or skills development. In 2022, only 22% of primary school teachers and 16% of secondary school teachers considered that continuing professional development was a priority for improvement in their job (MENJ, 2023[43]). Linking continuous education to professional standards that define what people working in education should know and do, strengthening the links between professional development and career advancement and recognising skills developed, including in informal learning settings, could support participation. For example, countries including Australia, Estonia and Singapore have introduced systems to strengthen the links between teachers' responsibilities and expectations in terms of skills at different stages of their careers (OECD, 2019[51]; 2021[63]).

Improving equity in student outcomes

Effectively aligning resources and school needs

Gaps in educational outcomes of those students from less privileged backgrounds are more pronounced in France than across OECD countries. To reduce the impact of social and economic inequalities on educational outcomes, France has allocated additional resources to schools in "priority education" since 1981 (OECD, 2020[1]). In 2014/15, France established the Priority and Reinforced Priority Education Networks (REP and REP+, *Réseaux de l'Éducation Prioritaire)*. Schools are classified as REP or REP+ depending on criteria related to socio-economic background and academic performance of students. Around 1,090 schools were in the network at the start of the 2022 school year, attended by around one in five students in the public system. The investment is significant, with the authorities providing EUR 2.3 billion of additional investment in priority education 2021/22. However, around 70% of students from disadvantaged backgrounds do not attend schools in the network (Azéma and Mathiot, 2019[64]).

One of the main forms of extra resources for schools in priority education is more personnel, particularly teaching resources, including adjustments to their remuneration and working conditions. As in many OECD countries, France provides financial incentives to boost the attractivity of working in disadvantaged schools in the form of an indemnity bonus (OECD, 2019[51]). Another factor boosting attractivity is that after five years, teachers receive additional bonus points towards an application to transfer, facilitating their geographical mobility. These teachers also have fewer hours of class time and undergo additional training. Existing evidence suggests that these incentives have been effective in attracting teachers to disadvantaged schools. One study found that the doubling of the indemnity for teachers working in REP+ between 2017 and 2019 encouraged teachers' mobility towards schools classified as priority education (Insee, 2023[65]).

Another factor contributing to greater teaching resources is smaller average class sizes. In 2012, France increased the number of teachers in priority education and in 2017 started halving class sizes for students aged 6-8 *(grande section, CP and CE1)* in REP and REP+ schools. By the start of the 2020 school year, the reduction in class sizes had been implemented for students aged 7 and 8 (*CP* and *CE1*) and by the start of the 2024 school year, they will have halved class sizes for 6-year-olds (*grande section*). The reduction in class sizes for 7 and 8 year olds was found to improve students' progress in French and maths and narrow the gap in performance compared to students in non-priority education, except temporarily in 2020 (DEPP, 2021[66]; 2022[67]).

While smaller class sizes for disadvantaged students can have a positive impact on learning outcomes, the benefits largely hinge on accompanying efforts to develop teachers' skills and ensure teacher quality. On average, OECD countries that reduced class sizes and student-teacher ratios in disadvantaged schools do not have narrower performance gaps related to socio-economic status (OECD, 2018[14]). Teachers with certain characteristics and practices may tend to concentrate in certain types of schools across OECD countries (OECD, 2022[13]). In particular, in France and many OECD countries, disadvantaged schools have a lower share of experienced teachers, with more experienced teachers on average spending more time teaching and being more effective in raising the performance of their students (OECD, 2019[17]; Papay and Kraft, 2015[68]). This can be addressed by giving schools more responsibility in teacher selection and recruitment, alongside stronger collaboration between teachers (OECD, 2022[13]; 2018[14]). A limited set of highly attractive project positions for experienced teachers in disadvantaged schools may also be an effective response (Cour des Comptes, 2017[69]; OECD, 2018[14]). Support and training for teachers in reduced-size classes and assisting school leaders and inspectors in their oversight roles could also be beneficial.

France's binary model of priority and non-priority education is unique compared to most other OECD countries, combining substantial support for some schools with sharp threshold effects. In schools outside of priority education, the authorities adjust funding in a gradual manner based on student needs. The latter approach is more common in OECD countries. France's priority education model provides a clear structure in which to provide additional resources and manage teachers and other staff (Azéma and Mathiot, 2019[64]). This can give rise to schools outside of priority education with similar characteristics to those in the network but with no additional support. Additionally, unlike the gradual adjustment in funding for schools outside of priority education based on their effective needs, the scope for adjusting resources in priority education is more limited (France Stratégie, 2019[70]). The label of priority education can also stigmatise schools, which may discourage some students from attending (Azéma and Mathiot, 2019[64]).

In addition to threshold effects, the priority education system is not best suited to take into account the diversity of local needs and evolving social and educational difficulties. For example, schools in rural areas are typically not in priority education but can face particular challenges (Azéma and Mathiot, 2019[64]). While tools exist to consider certain social and geographic criteria when allocating funding, they are not systematically used to adapt the allocation of resources (Cour des Comptes, 2023[71]). In the absence of a formalised national strategy, some *académies* (educational districts) have introduced specific policies for rural schools (Cour des Comptes, 2023[71]). Improving the performance of schools could become more effective with a more nuanced and progressive differentiation in resource allocations, taking into account local constraints and the region's economic context, relying on a wider use of mechanisms to progressively allocate resources (Cour des Comptes, 2023[71]; 2023[55]).

Combining priority education alongside a formalised national strategy that reaches all students from disadvantaged backgrounds and limits threshold effects could help ensure a better balance between school needs and resources. At a national level, the authorities have been experimenting with two programmes since 2021. *Contrats locaux d'accompagnement* (local support contracts, CLA) introduce a more progressive allocation of resources to schools whilst taking account of the social position index, the proportion of scholarships, territorial characteristics and training opportunities, and could be used to avoid abrupt exits from REP/REP+ status in the event of reforms. The *Territoires éducatifs ruraux* (Rural Educational Territories, TER) scheme was implemented in 10 educational districts (*académies)* and further extended at the start of the 2023 school year. It aims to achieve greater differentiation in educational policies, in part by taking greater account of the specific features of rural areas. France could also use the opportunity of the planned reform to "priority" neighbourhoods (*quartiers prioritaires de la politique de la ville*, QPV) in 2025 to consider any adjustments to priority education.

Increasing diversity within schools

Students' academic performance and their career aspirations are influenced by their personal characteristics as well as those of their schoolmates, suggesting the presence of peer effects (Nash, 2003[72]; DEPP, 2019[73]) (Box 5.3). Schoolmates can motivate other students and help each other overcome learning difficulties. At the same time, they can also disrupt instruction, require disproportionate attention from teachers and be a source of anxiety. While the degree of this influence is highly debated (OECD, 2019[74]), there is some consensus on a detrimental impact of attending schools with many low achievers and the benefits of having high-achieving schoolmates (Burke and Sass, 2013[75]; Hanushek et al., 2003[76]; Lavy, Silva and Weinhardt, 2012[77]). Diversity within schools may also enable students from different backgrounds to interact with each other and may have a positive impact on social cohesion and tolerance (Borgonovi and Pokropek, 2017[78]; Karsten, 2010[79]).

High- and low-ability students' performance may not be affected in the same way by their peers (Sacerdote, 2011[80]; Mendolia, Paloyo and Walker, 2018[81]). The negative consequences of a concentration of low achievers on student performance seems to especially be the case for students who are themselves low achievers. By contrast, high-ability students are usually less sensitive to the composition of their classes (Abdulkadiroğlu, Pathak and Angrist, 2014[82]). This suggests that reducing socio-economic segregation of schools may be beneficial for both increasing student performance at the country level as well as improving equity in educational achievement and opportunities (OECD, 2021[29]).


Box 5.3. Students' test scores strongly depend on the socio-economic background of their school

A students' socio-economic background and that of their school impacts their educational performance. OECD PISA data can help disentangle these the individual and the school environment effects, following the methodology in Causa and Johansson (Causa and Johansson, 2010[83]) and as in OECD (OECD, 2022[84]). The individual effect is defined as the estimated difference in PISA scores between two students attending the same school but with different individual socio-economic backgrounds. The school environment effect is defined as the estimated difference in PISA scores between two students with the same socio-economic background but who attend schools with different socio-economic backgrounds.

An increase in a student's socio-economic background from the first to the third quartile of students' socio-economic distribution of in France is associated with an increase their PISA score in mathematics by around 32 points in France, equivalent to a 7% increase in the average score of a French student. This link is slightly stronger in France than for the average OECD country (Figure 5.9). The socio-economic background of students' peers in their school has an even stronger link to test scores than the individual background, and the size of this link in France is one of the largest among OECD countries. An increase in the socio-economic background of a student's schoolmates from the first to the third quartile of schools' socio-economic distribution in France is associated with an increase their PISA score in mathematics of around 58 points in France. This is equivalent to a 12% increase in the average score of a French student. This result highlights the potentially significant impact that the relatively low diversity in French schools could be having on students' performance. These results may be affected by the composition of the sample and the choice of explanatory variables. In particular, the students in the PISA sample for France are not necessarily representative of their schools.

Figure 5.9. Peers' socio-economic background influences test scores more than a students' own

Estimated difference in a student's PISA mathematics score due to an increase in their or their peers socio-economic background from the first to the third quartile
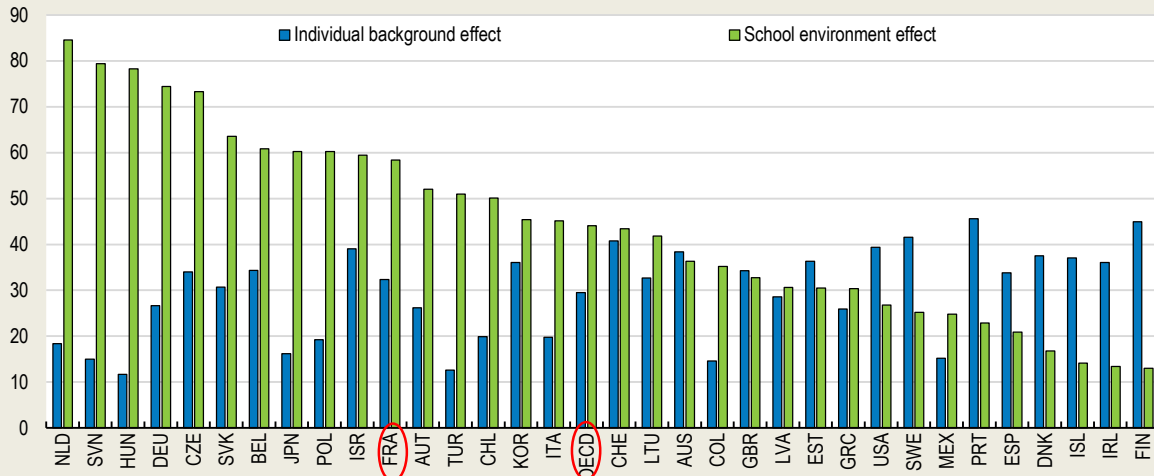
Note: Estimates of a country-by-country multilevel OLS regression of students' mathematics score on their family socio-economic background (measured by PISA ESCS), and school-level socio-economic background (average PISA ESCS across schoolmates). The regression is weighted by students' sampling probability and controls for school size, age and gender.
Source: OECD calculations based on OECD PISA 2022 database.

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PISA data suggest that 15-year-old French students of certain characteristics are slightly more concentrated in certain schools than their peers than in the average OECD country (OECD, 2023[10]) (Figure 5.10). The isolation index measures the extent to which certain types of students are isolated from all other types of students based on the school they attend. In France, low-achieving students are significantly more isolated from both all other students and from high achieving students than in the average OECD country, while high-achieving students are as isolated as in the average OECD country. In France, immigrant students are also more isolated from non-immigrant students than in the average OECD country. There are also other segregation indices, some of which may be less sensitive to the composition of the groups of students studied and lead to different conclusions, in particular the dissimilarity index.

A school's diversity is directly affected by the school system, but also by external factors such as economic inequalities and residential segregation. School system factors include school admissions and selectivity, the degree of school competition, the criteria families use to choose a school, the size of the private education sector and the share of students enrolled in vocational programmes (Bonal, Zancajo and Scandurra, 2019[85]; Kutscher, Nath and Urzúa, 2023[86]; Wilson and Bridge, 2019[87]). In France, around 86% of primary and 78% of secondary students attended a public school in 2021/22, typically in their local school district (DEPP, 2023[88]). Parents can request for their child to attend a different public school for reasons including having a sibling in another school, the availability of a particular school subject or for being from a disadvantaged background. Around 13% of primary and 21% of secondary students attend a private school under contract with the state, with a 20% limit imposed by law (Cour des Comptes, 2023[89]). Around 0.9% of primary and 0.4% of secondary students attended fully private schools.

Figure 5.10. Low-ability French students are more isolated in certain schools

Isolation index from zero (full exposure) to one (full isolation)
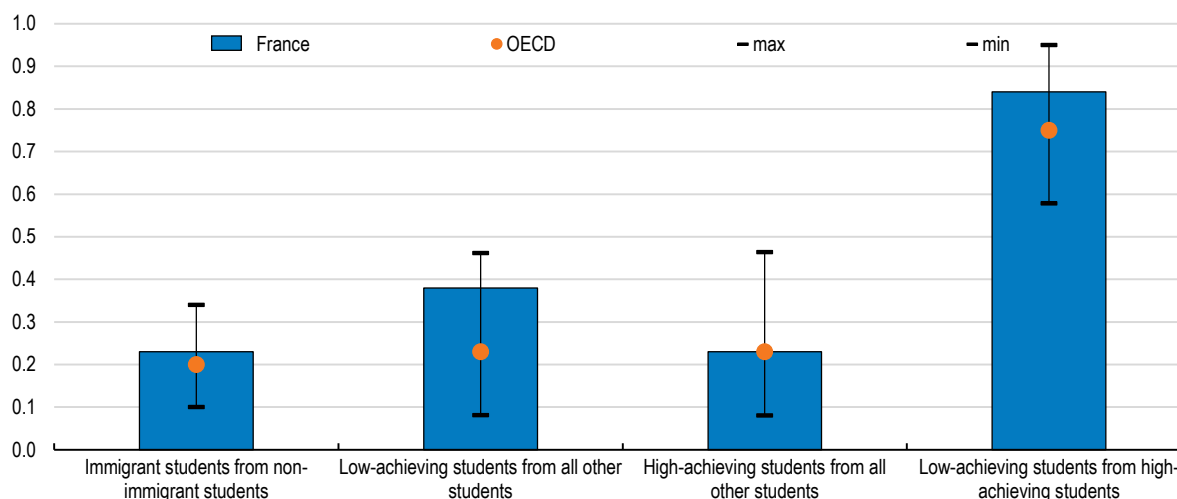
Note: Only countries and economies where at least 5% of the student population has an immigrant background are examined. Low-achieving students are students who score among the bottom 25% of students within their country or economy on the PISA test. High-achieving students are students who score among the top 25% of students within their country or economy on the PISA test.
Source: OECD PISA 2022.

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Private schools under contract have a greater share of students from advantaged socio-economic backgrounds than public schools and this share has increased over the past two decades (DEPP, 2022[90]; Cour des Comptes, 2023[89]). Lower-secondary private schools under contract have more "very advantaged" students than the public sector (42% compared to 21%) and fewer disadvantaged students (16% compared to 40%) (DEPP, 2023[88]). This attendance gap across schools for advantaged students in their first year of lower-secondary school reached 20 percentage points in 2022 compared to 11 percentage points in 1989 (DEPP, 2023[91]). In France, the share of advantaged 15-year-old students in private schools was 21 percentage points higher than the share of disadvantaged students, compared to only 13% in the average OECD country (Figure 5.11).

In some highly urbanised *académies*, private schools under contract are accentuating, and sometimes sharply, the social and educational gaps across schools (Azéma and Mathiot, 2019[64]). For instance, in Paris, 33% of students from "advantaged" and 50% of students from "very advantaged" backgrounds were enrolled in lower-secondary private schools under contract at the start of the 2019 school year, explaining around half of the social segregation in Paris lower-secondary schools (Grenet and Souidi, 2021[92]).

The decrease in diversity in private schools under contract appears to be in part due to families avoiding public schools (Cour des Comptes, 2023[89]). Even though 96% of private schools under contract are catholic, some families see private schools under contract as an alternative to public education. Interviews with family representatives often cited the quality of teaching, the school climate, or the distance from public education, which is perceived as a less secure environment and less effective, as reasons for choosing private schools under contract (Cour des Comptes, 2023[89]).

Figure 5.11. Private schools have relatively more advantaged students than public schools

Difference in the share of advantaged and disadvantaged students in private schools, percentage points
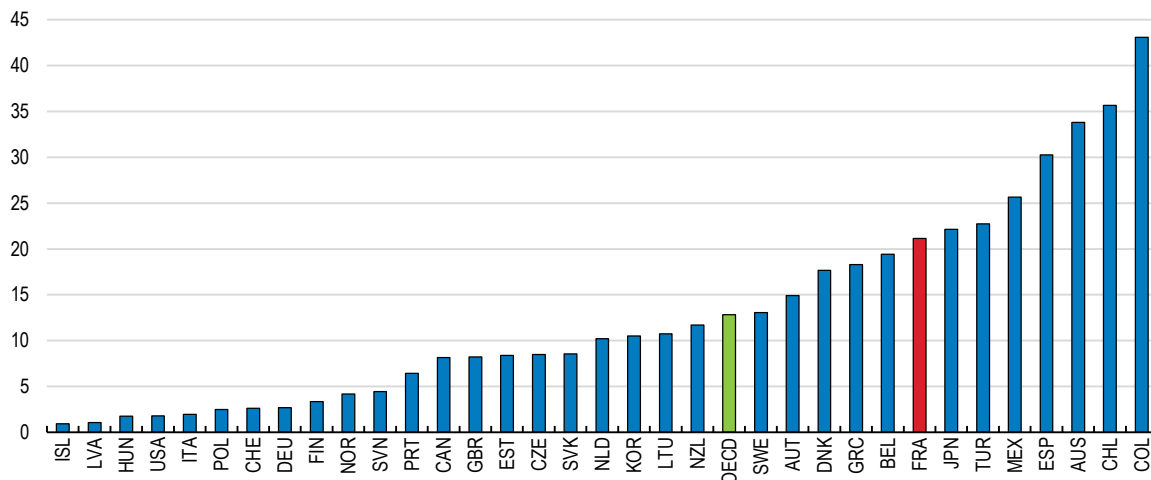
Note: Results based on principals' reports. A socio-economically disadvantaged (advantaged) student is a student in the bottom (top) quarter of the PISA index of economic, social and cultural status (ESCS) in his or her own country. Data for Belgium represent only the French-speaking and German-speaking Communities.
Source: OECD (2023), PISA 2022 Results (Volume II): Learning During – and From – Disruption, PISA, OECD Publishing, Paris, https://doi.org/10.1787/a97db61c-en.

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Evidence from multiple countries indicates that the impact of publicly funding private providers on equity is influenced by the institutional arrangements in which they are embedded (OECD, 2017[93]; 2018[12]). In France, private school leaders have complete autonomy in enrolling students and selection criteria are not transparent with no social inclusion component (Cour des Comptes, 2023[89]). These school leaders also have greater autonomy in teacher recruitment. At the same time, private schools under contract receive only slightly less national funding compared to public schools, although significantly less funding from local authorities. Overall, for private schools under contract, families provided 22% of funding for primary schools and 23% for secondary schools in 2020 (Cour des Comptes, 2023[89]). Selective admission allows private schools to "cream-skim" high-ability students and attain a competitive advantage that may not necessarily be a result of the quality of education they provide (OECD, 2022[33]). For example, while students in private schools in France and across OECD countries achieve higher test scores, on average they achieve lower scores when controlling for socio-economic characteristics (OECD, 2023[10]).

Ensuring that school choice increases access to education in France also requires ongoing dialogue with private schools under contract to set selection criteria to maintain a diverse student composition (OECD, 2022[33]; 2019[74]). The government has signed a protocol to improve diversity with the General Secretariat of Catholic Education *(Secrétariat general de l'enseignement catholique, SGEC),* which represents 96% of private schools under contract. This agreement includes specific goals for increasing the number of scholarship recipients, special attention to classes with specific needs, and consideration of local contexts. Other measures underway will also help to foster diversity. A public database detailing access conditions for private schools and the change in social and academic diversity within private schools under contract at the national, academic and departmental levels will also be created. Social diversity will be further improved through a commitment to increase by at least 50% in five years the number of schools offering family contributions scaled by income and doubling the rate of scholarship students where students receive the same social aid as in public schools. There will also be steps to improve accommodation of students with special learning needs.

The authorities have been implementing policies aiming to support diversity, including by supporting a more balanced allocation of students across schools and increasing the attractivity of public schooling. At the start of the 2021 school year in the *académie* of Paris, which faces high school segregation, the *Affelnet* procedure of applying for upper-secondary schools was reformed to take into account the socio-economic background of a students' lower-secondary school. This led to a 39% reduction in social segregation in public upper-secondary schools (Charousset and Grenet, 2023[94]). Implementing this measure on a national scale could help to increase the attractiveness of attending disadvantaged schools. Including private schools under contract in the *Affelnet* procedure could further support all students to select a range of publicly funded schools. Dialogue is ongoing between the government and private education networks under contract to improve diversity at these schools.

In 2015, the authorities launched an initiative to promote greater social diversity in 56 lower-secondary schools across France. Experiments including combining the school districts of several lower-secondary schools and re-assigning students to schools using different techniques, redesigning catchment areas and closing or opening schools. These initiatives were relaunched in 2021, along with other measures to improve the attractiveness of schools through international or European sections, where more class time is in English, or specialised subjects. Preliminary results find an increase in diversity and no increase in avoidance by defecting to the private sector. The results suggest no impact on learning but positive effects on personal and social well-being (CSEN, 2023[95]). The forthcoming complete evaluation of these policies could support the successful aspects to be implemented more widely into policy.

Adapting education to future needs

One goal of education is to enable students to develop a pathway to employment in line with their aspirations, potential, and the needs of an ever-changing labour market. Integrating into the labour market is a significant challenge for young people without tertiary education qualifications. Among 25-34 year-olds who have completed tertiary education, the unemployment rate is close to the OECD average, at 5.4%, compared to 4.9% in 2022 (Table 5.3). However, the unemployment rate for 25-34 year-olds who have not completed tertiary education is significantly higher, particularly for those whose education is below upper-secondary level. This highlights the importance of continuing policies aimed at reducing the number of early school leavers. For those with secondary or post-secondary non-tertiary education, unemployment rates are marginally higher for those who took vocational paths, in contrast to the OECD average.

Therefore, special efforts must be made to facilitate the integration of young people from vocational pathways. More broadly, enhancing student integration requires a clear understanding of the current and future needs of different economic sectors in terms of knowledge and skills. The digital and green transitions are set to significantly reshape these needs in the years ahead. As a result, it is vital to adapt educational content accordingly. Effective career guidance policies are key in helping students find their way in this changing environment. In particular, this is the purpose of the career discovery programme in lower secondary school, which will be introduced into the second year of secondary school from the start of the 2023 academic year and will be extended to all classes above this level from the start of the 2024 academic year.

Table 5.3. Unemployment rates of 25-34 year-olds, by educational attainment and programme orientation (2022)

Percentage of unemployed 25-34 year-olds among all 25-34 year-olds in the labour force

	Below upper secondary (A)	Upper secondary or post-secondary non-tertiary		Tertiary	All levels of education (B)	A/B
		General	Vocational			
France	20.0	9.4	9.9	5.4	8.2	2.4
Germany	8.7	5.6	2.8	2.5	3.6	2.4
Italy	17.6	13.1	10.7	7.8	11.4	1.5
Spain	22.2	15.9	16.3	10.2	14.5	1.5
United Kingdom [1]	8.2	3.8	3.6	2.5	3.4	2.4
OECD average	**12.8**	**8.1**	**6.5**	**4.9**	**6.4**	**2.0**
EU25 average	**15.5**	**8.2**	**6.6**	**4.5**	**6.5**	**2.4**

Note: In most countries data refer to ISCED 2011. For Argentina and India data refer to ISCED-97. See Definitions and Methodology sections for more information. Data and more breakdowns are available at http://stats.oecd.org/, Education at a Glance Database.
Source: OECD/ILO (2023). For more information see Source section and Education at a Glance 2023 Sources, Methodologies and Technical Notes.

Continuing to reduce rates of early school leavers

Young people who finish their studies without qualifications face significant challenges in finding employment. In 2022, the employment rate for 25-34 year-olds without an upper secondary qualification was 61% on average in the OECD, and only 52% in France. To address the issue, France has been implementing policies aimed at reducing rates of early school leavers for several years (OECD, 2020[1]). Platforms to provide services and support to students who leave school early *(Plateformes de Services et d'Appui aux Décrocheurs, PSAD)* were introduced in 2009 and regions were tasked with coordinating efforts to reduce rates of early school leavers in 2015. The "All Together to Overcome Early School Leavers" action plan *(Tous Mobilisés pour Vaincre le Décrochage Scolaire),* introduced bridging programmes providing temporary, tailored support for students in secondary education at risk of leaving school early. The plan aims to develop partnerships, in particular among local actors, to target young people who have left school early. Other measures include the Personalised Educational Success Programme *(Programme Personnalisé de Réussite Educative, PPRE)* and the creation of Early School Leaver Prevention Groups *(Groupes de Prévention du Décrochage Scolaire, GPDS)* in schools. Moreover, since September 2020, young people in France aged 16 to 18 have been required to remain in education or training if they are not employed. This includes schooling, apprenticeships or traineeships, civic service, mentoring programmes and specific programmes for social integration and labour market transitions. Finally, the drive to reduce the number of early school leavers has been reinforced through an overhaul of career guidance policies (see below). These policies led to a three-point decrease between 2015 and 2022 in the percentage of 25-34 year-olds without an upper secondary qualification (11%), which is lower than the OECD average of 14% (OECD, 2023[96]). There was also a substantial decline in the out-of-school rate at upper secondary level.

Efforts to tackle leaving school early must continue and be broad-based. Several countries, such as the Netherlands, Belgium, and Latvia, have successfully implemented policies activating various levers, including coordinating the mobilisation of schools, regions, and municipalities, creating of early warning systems for cases of leaving school early, and providing joint support for students, teachers, educators, and parents. The European Commission also embraced this approach in its "Pathways to School Success" initiative, launched in 2021. Canada and Australia identify at-risk populations or schools to ensure they receive targeted support (OECD, 2022[97]). At the start of the 2023 school year, France introduced a new "opening up" initiative *(Tous Droits Ouverts)* to offer tailored training opportunities for students in difficulty, alongside an introduction and exposure to the labour market with the support of local stakeholders involved in providing support, integration, training and employment for young people. Implementing such policies

requires effectively detecting students at risk of leaving school early. In France, the interministerial system for information exchange *(Système Interministériel d'Echange d'Information, SIEI)* identifies young people over the age of 16 who have left the school system without qualifications. Earlier detection within this system could enhance the effectiveness of overall prevention measures for early school leavers (Inspection Générale de l'Education, du Sport et de la Recherche, 2020[98]).

Improving prospects for students in vocational and technological programmes

Many young people choose vocational pathways: in 2020, 39% of students in upper secondary education in France were enrolled in vocational courses, compared to 43% on average in the OECD. However, this pathway continues to lack appeal and is too often chosen as a last resort. Around 21.1% of students in the final year of lower secondary education in 2019 or 2020 applied for vocational programmes, but 24.3% were ultimately directed onto this path (Iasoni and Schneider, 2023[99]). In 2017, students with at least one parent who graduated from higher education constituted 49% of those enrolled in general upper secondary education, but only 13% in vocational education. The vocational route is also predominantly male, with girls comprising only 41% of the total in 2021, compared to an average of 45% in OECD countries (OECD, 2023[96]).

To be more attractive, vocational pathways must primarily ensure students easy access to the job market and quality employment. Strengthening the ties between educational institutions and employers is crucial in this regard. This is one of the main goals of the vocational secondary school reform introduced in 2023, including making careers offices widely available in schools (Box 5.4). Countries with the lowest rates of vocational graduates not in employment, education or training typically offer students significant work experience during their studies (Figure 5.12). In Germany, Switzerland, Denmark, and to a lesser extent in Austria, this experience mainly involves programmes combining work and study. In France, only 28% of upper secondary students were enrolled in such programmes in 2021, compared to an OECD average of 45% (Figure 5.13). However, since 2018, France has been committed to a wide-ranging policy to support apprenticeships (Chapter 3). While the increase in the number of apprentices has primarily been in post-secondary education, secondary education numbers are also rising, and were up 15.7% in 2021. For these collaborations between schools and employers to be fully effective, it is important to ensure they do not impose excessive time and resource constraints on either party (OECD, 2022[97]).

Figure 5.12. Providing work experience makes it easier to enter the job market

Percentage of people aged 25-29 with vocational upper-secondary or post-secondary non-tertiary attainment not in employment, education or training (NEET).

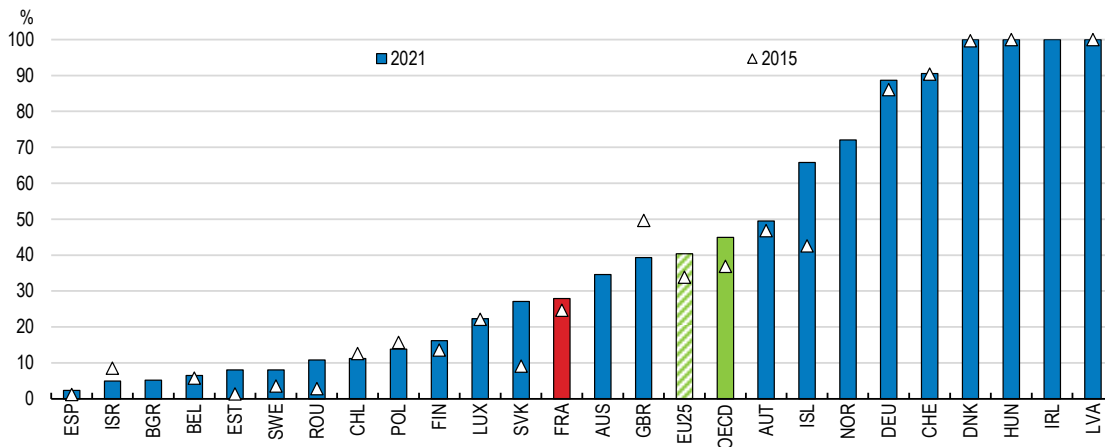Source: OECD, Education at a glance (2023)

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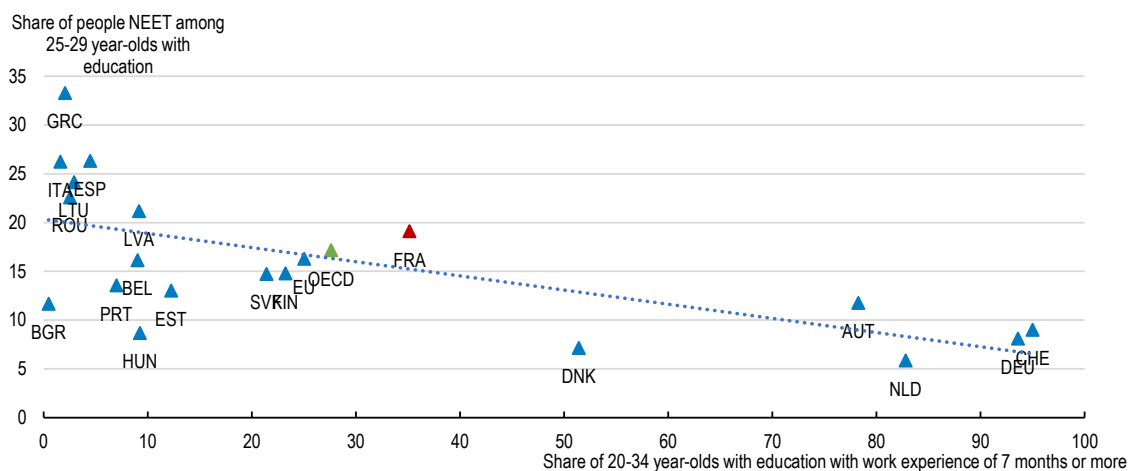
Figure 5.13. Work-study programmes are not frequently used in France

Percentage of upper secondary vocational students enrolled in combined school and work-based programmes (2015 and 2021)

Note: The work-based component represents between 25% and 90% of the programme in programmes combining work and study. These programmes may be organised in partnership with the authorities or educational institutions.

Source: OECD/UIS/Eurostat (2023), Table B1.3 (2015 online data). For more information, see Education at a Glance 2023. Sources, Methodologies and Technical Notes, (OECD, 2023).

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Box 5.4. The reform of vocational secondary schools

The government introduced a reform of vocational secondary schools in May 2023 (Ministère de l'Education Nationale et de la Jeunesse, 2023[100]). The reform focuses on enhancing student pathways, strengthening ties with employers, and aligning training with changes in the labour market. Reform measures are due to be implemented in the 2023, 2024, and 2025 academic years. An additional one billion euros will be allocated to vocational secondary schools annually to fund measures such as paid internships, improved general education, reduced class sizes for mathematics and French, optional activities (art workshops, digital creation, etc.), the use of artificial intelligence to personalise student exercises, and support to start a career, including the widespread roll-out of careers offices in schools. These offices give students access to a network of companies for internships, facilitate communication between teachers and potential employers, and help clarify the needs to better adapt training. A quarter of courses leading to qualifications are due to be updated by 2025, largely to address the digital and environment transitions and population aging. Less effective pathways will be closed and new ones opened up in high-demand fields. In 2023, 2,600 places were removed and 3,000 new places created, along with 1,050 places funded under the France 2030 plan and created in line with the needs of corporate partners.

Adapting today's training to the professions of tomorrow

In France, the mismatch between skills and knowledge and labour market needs is significant (OECD, 2022[101]). The percentage of employees who do not have a field-of-study that matches their job requirements is higher than the OECD average (35% against 32% in 2019), as is the proportion of employees lacking the required qualifications (21% against 18%). In contrast, there are fewer overqualified employees in France than in the OECD average (13% against 17%).

The knowledge areas that recruiters find most lacking relate to health, sciences (especially physics and chemistry), and education (Figure 5.14). In contrast, France appears to have ample knowledge in management and commerce. Regarding skills and abilities, the most glaring deficiency is the ability to learn. This is also the case, to a lesser degree, across the OECD, highlighting the need in France for teaching methods that enable students to "learn to learn". This advocates pushing for constructivist pedagogical practices in the French educational system. There is less of a shortage in computer programming and digital content creation in France than in the OECD overall, but these still rank among the most sought-after skills. Overall, the areas of knowledge, skills, and abilities where deficiencies are most and least marked are quite similar in France and across OECD countries. The need to align student training with the diverse needs for knowledge and skills was one of the main motivations behind the Baccalaureate and general and technological upper secondary reforms adopted in 2018 (Box 5.5).

Figure 5.14. Significant needs in healthcare, science, education and IT

Skill Needs Indicators (2019 or most recent available year)
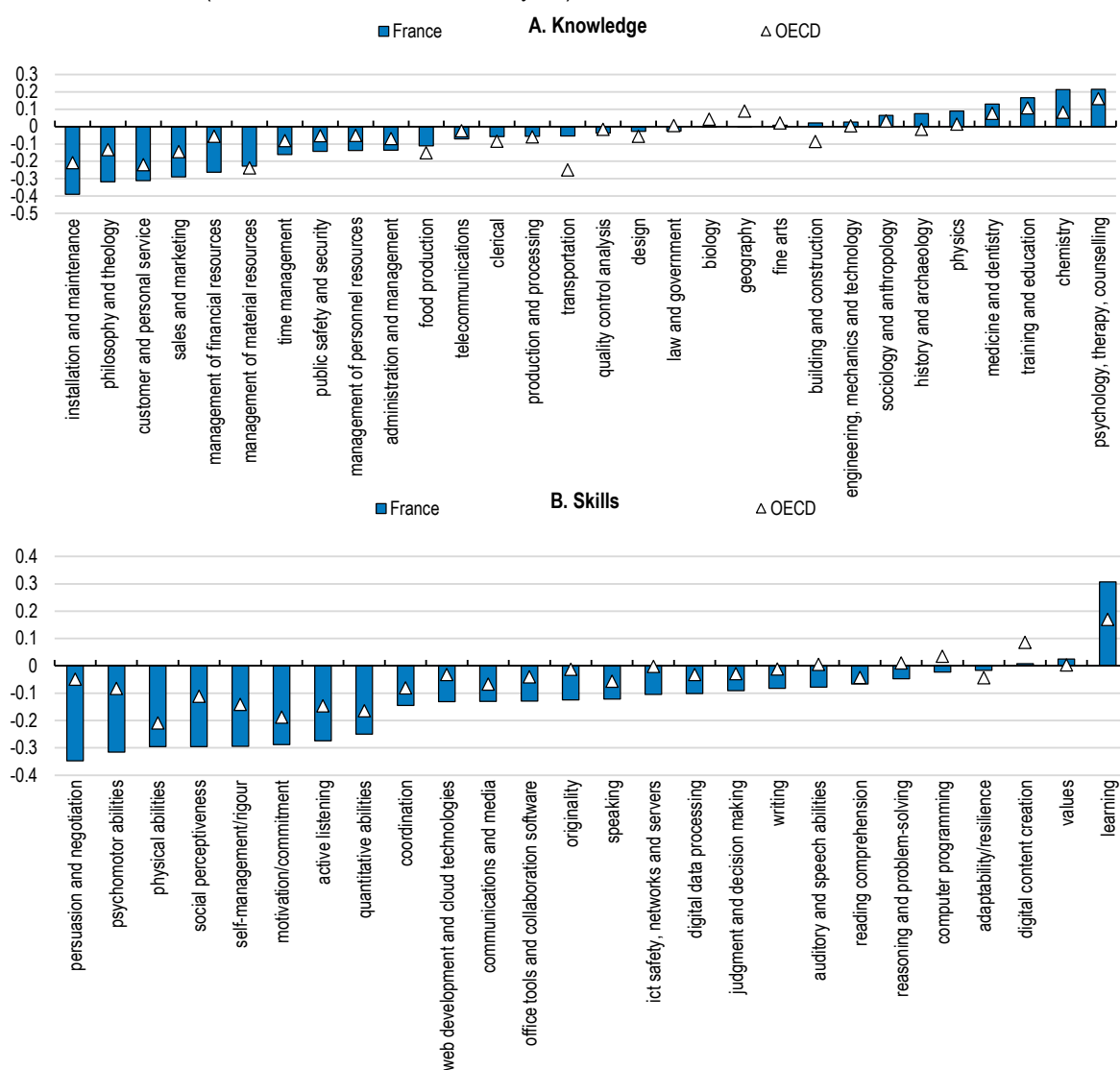
Note: Positive values indicate skill shortage while negative values point to skill surplus. The larger the absolute value, the larger the imbalance. The data refer to 2019, with the following exceptions: they refer to 2018 for CHE, FRA, IRL, ITA, POL, THA; 2017 for DEU, GBR, KOR; 2016 for AUS; 2015 for BRA, TUR; and 2012 for ISL, SVN.
Source: OECD Skills for Jobs database

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Box 5.5. Reform of general and technological pathways in upper secondary schools

General and technological Baccalaureate and broader secondary school reforms were implemented in 2018:

General pathways – literature (L), science (S), and economics and social science (ES) – were abolished. Now, students in their final two years follow a core curriculum and choose additional specialist subjects. This reform seeks to offer a wider range of educational pathways and to diminish the implicit hierarchy among subjects and streams. The scientific S stream was particularly popular, comprising 52.7% of general Baccalaureate graduates in 2018. While the specialty combination corresponding to the former S stream (mathematics, physics-chemistry, life and earth sciences) remained the most popular, it attracted only 23.4% of students in the second year of upper secondary education *(première)* in 2021.

The weighting of the final Baccalaureate exams was reduced to 60% of the final grade, with continuous assessment comprising the remaining 40%. The goal was to simplify the Baccalaureate, which was traditionally costly to organise, while recognising that career and further education choices are largely based on the results achieved during the school year.

Annually, up to 54 hours may be dedicated to career guidance, depending on student needs.

Specific periods are reserved for smaller class teaching, and personalised support is available to some students.

*Adapting education to climate and environmental challenges*

The environmental transition presents a twofold challenge in education. First, there is a need to make students aware of climate and environmental issues. Second, these issues will significantly impact labour market composition and job content in the coming years, requiring corresponding changes to different fields of education and school curricula.

Enhancing environmental education in teacher training and school curricula could better communicate to students the attitudes needed to protect the environment and mitigate the impact of climate change. French students are relatively well-versed in this area, even if there is room for further progress (Figure 5.15).

Adapting education to climate and environmental issues involves anticipating future training needs. Employment projections by France Stratégie and the Ministry of Labour show that meeting the National Low Carbon Strategy goals would generate 200,000 additional jobs by 2030, mainly in construction (+120,000 jobs related to thermal renovations), legal and advisory services (+45,000 jobs), and research, development, and agriculture (15,000 jobs each) (France Stratégie and Dares, 2022[102]).

Figure 5.15. French students' competence in environmental sustainability is higher than the OECD average

Distribution of students with advanced levels in environmental sustainability competence in OECD countries (PISA 2018)
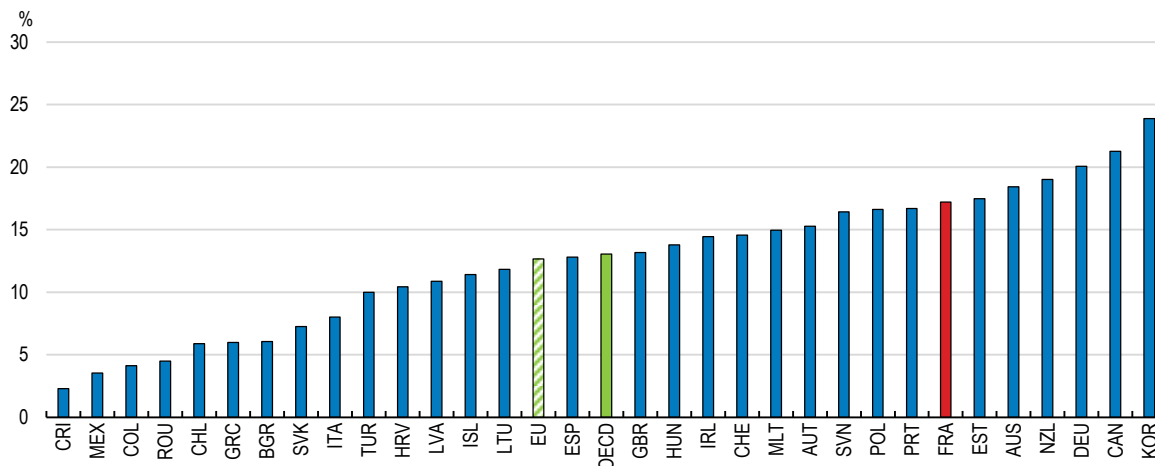
Note: Countries are sorted in ascending order of the percentage of students with advanced levels in environmental sustainability competence. Results were obtained from the sub-sample of students with valid information in all areas. The figure presents the percentage of students who reported that looking after the environment was important to them; who achieved at least the foundational proficiency Level 4 in the PISA science assessment; who indicated being aware of climate change and global warming; who reported high levels of environmental self-efficacy [see Section 1 in Borgonovi et al. (2022) for a full description]; and who reported either reducing energy consumption for environmental reasons or participating in activities in favour of environmental protection.
Source: Calculations based on OECD (2018), PISA 2018 Database, www.oecd.org/pisa/data/2018database/.

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Improving support for the digital transition

The digital transition is expected to drastically change work and the skills required in many sectors in the years to come. OECD estimates suggest that automation could result in the disappearance of 14% of existing jobs and profoundly modify 32% of these jobs in the space of 15 or 20 years in 2019 (OECD, 2019[103]). In this context, it will be important to continue to regularly renew the offer of training, as was done with the vocational high school reform.

Given the demands of the digital transition, equipping students with optimal information and communication technology (ICT) skills should be a cornerstone of education policy. A particular challenge is preparing students for careers in the emerging field of artificial intelligence, where job opportunities are growing rapidly.

In recent years, France has implemented measures to integrate more ICT into learning. Mandatory training in "digital and technological sciences" was introduced in 2019, with a "digital and computer sciences" specialisation in general upper secondary education. A digital competency framework and certification platform (PIX) has also been developed for students and made compulsory for new teachers (OECD, 2020[1]). The National Education system has made a wide range of digital content available to the public through the Eduscol website, the Lumni portal, and the Canopé network for teachers. During the COVID-19 pandemic, the state continued school education by leveraging these resources and the online learning expertise of the National Centre for Distance Education (CNED).

These efforts have resulted in an improvement. Hence, according to PISA, 70% of students said they had teachers with the necessary technical and pedagogical skills to integrate digital devices into their teaching in 2022, against 56.6% in 2018. However, other countries have also progressed in this area, meaning that France remains behind the OECD average that was at 87.6% in 2022 and 64.5% in 2018. Also according

to PISA, in 2022, 74.5% of French students said they were in schools where effective professional resources for teachers to learn how to use digital devices were available, against 70.9% in 2018. In the OECD, the progress has been stronger on average, from 64.2% in 2018 to 76.2% in 2022. However, progress regarding digital equipment has been stronger in France that in the rest of the OECD: in 2022, 0.99 computers per 15-year-old student were available in France and 0.81 on average in the OECD, against 0.74 and 0.80 respectively in 2018.

In 2023, the French Ministry of National Education and Youth unveiled its 2023-2027 digital strategy, aiming to ensure strong digital competences for all students and train 400,000 to 500,000 digital professionals (MENJ, 2023[104]). Only 3% of students chose computer science in higher education in 2020, compared to an OECD average of 6% (OECD, 2022[105]). The Ministry has also set up the Edu-up system which supports the production of innovative digital resources for schools by companies or associations.

Encouraging girls to pursue a career in industrial, scientific and digital fields

Few girls choose science, technology, engineering and mathematics (STEM), industrial and digital fields. While this is a concern in a number of countries, enrolment in France is below the OECD average, (Figure 5.16). The government aims to encourage more female students to pursue these pathways. A key goal of the 2023-2027 digital strategy is to double the number of girls in "digital and computer sciences" to address the low enrolment rates, which were 18.5% in the second year of upper secondary school *(première)* and 14% in the final year *(terminale)* in 2021 (MENJ, 2023[104]). Since 2019, the government has also been running the IndustriElles initiative, focusing on communication and mentorship to facilitate the integration of women in industry. Introducing in-school talks by women successful in STEM careers can inspire young girls to enter these fields (Breda et al., 2021[106]). Other countries, such as Australia, Mexico, and Ireland, have developed policies to break stereotypes and make STEM fields more inclusive through communication initiatives and curriculum adaptations (OECD, 2022[97]). In Ireland, an advisory group set up by the Government has recommended continued consideration of gender balance in national curriculum specifications and in the language, visuals and examples used throughout a national programme of mathematics and science resources (Gender Balance in STEM Education Advisory Group, 2022[107]). In the 2022 PISA survey, the difference between boys and girls scores and slightly increased in maths (+3 points) and remained stable in sciences between 2018 and 2022, while they slightly increased in the OECD on average (+4 and +2 points) (OECD, 2023[5]).

Figure 5.16. Underrepresentation of women in the industrial and ICT fields

Share of female graduates in tertiary education, by field of study, in percent (2021)
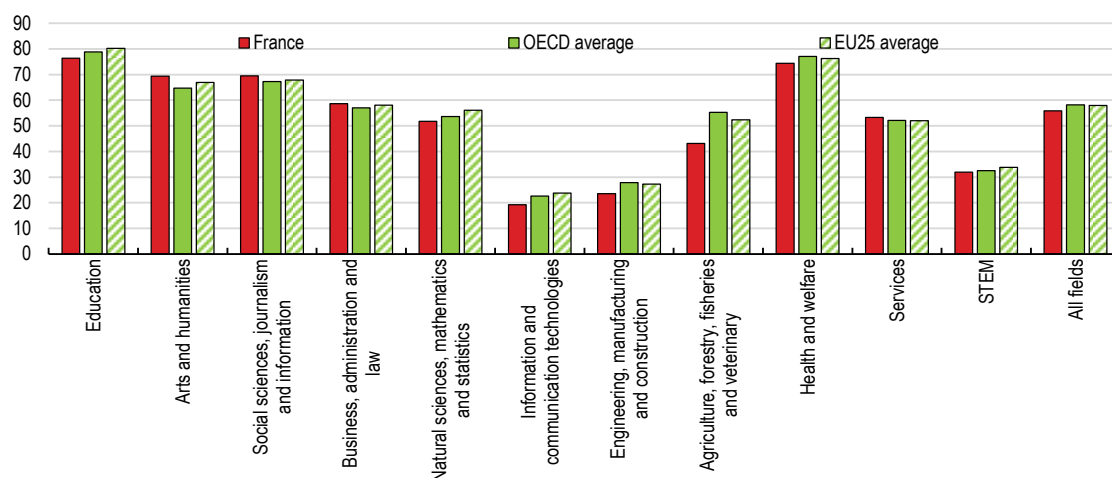
Source: OECD/UIS/Eurostat (2023). For more information see Source section and Education at a Glance 2023 Sources, Methodologies and Technical Notes, (https://doi.org/10.1787/d7f76adc-en).

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Improving career guidance

Better guiding students in their career choices can help align academic paths and skills with labour market demands. France relies mostly on teachers and psychologists for career guidance but could rely more on counsellors with an understanding of the labour market.

In secondary schools, form teachers are the initial points of contact for students and parents for queries related to further education and careers. However, 85% of form teachers lacked specific training (Cour des comptes, 2020[108]). Since 2018, the law has indicated that students in the final two years of upper secondary school should be given up to 54 hours of guidance a year as part of their timetable. However, this is only "a guideline" to be implemented "according to the needs of the students and the guidance methods in place in the school". In lower secondary schools, 12 hours are set aside in third year of secondary school *(quatrième)* and 36 hours in the fourth year *(troisième)*. Although the Teacher's Pact *(Pacte Enseignant)* provides for additional remuneration for teachers who take on guidance responsibilities, which may encourage some to engage in these tasks, it would be useful to define a mandatory time to be devoted to guidance and the expected initiatives (Juanico and Sarles, 2020[109]; Cour des comptes, 2020[108]).

National Education Psychologists (PSY-EN) help students and their parents to plan for the future. They provide services in Information and Guidance Centres *(Centres d'Information et d'Orientation, CIOs)*, which are overseen by the Ministry of National Education and include 450 centres nationwide. Yet, with a ratio of one Psy-EN for every 1500 students, there are too few to provide a personalised service to all students. Furthermore, the need to provide psychological support for students raises questions about the relevance of assigning guidance responsibilities to people trained in this field (Cour des comptes, 2020[110]). At the same time, recruitment of guidance counsellors could place more emphasis on knowledge of the labour market (Cour des comptes, 2020[108]) and be broadened to more diverse profiles.

A major challenge for France's public guidance service lies in effectively communicating the wealth of information provided by state and regional services to students and their parents. Clarifying the roles of different actors involved in this process is crucial (Inspection Générale de l'Education, du Sport et de la Recherche, 2020[98]). The actions of approximately 8,000 bodies handling guidance could be better coordinated and streamlined (Charvet, Lugnier and Lacroix, 2019[111]). The national career guidance service (ONISEP) could be given a central role. The *AVENIR(S)* digital platform could be a significant source of progress. Backed by €30 million in funding through the France 2030 plan, the platform will enable young people from lower secondary level onwards to create personal accounts for access to specific information and support for their respective transitions and skills development. It includes a digital platform, learning portfolios, a skills development application and tailored resources for teachers.

Guidance in education can contribute more to reducing social inequalities by prioritising students from disadvantaged backgrounds. Young people's aspirations are often shaped by their social environment (Musset and Mytna Kurekova, 2018[112]). Those from modest backgrounds tend to be less informed about higher education options, which influences their preferences regarding higher education (Guyon and Huillery, 2014[113]). Countries like the Netherlands, Canada, and the United States have policies to enhance guidance for disadvantaged students (Dutercq, Michaut and Troger, 2018[114]; OECD, 2022[115]). In France, the *Cordées de la Réussite* programme partners higher education institutions with schools in priority education networks, urban priority areas and remote rural zones to offer personalised support. However, PISA 2018 data shows that nearly two-thirds of students in socio-economically advantaged French schools received regular services from at least one specialised guidance counsellor, compared to only half in disadvantaged schools. Both of these ratios are below the OECD average.

Improving well-being at school

Taking tougher action against bullying at school

Bullying at school can have serious repercussions on the well-being of the student being bullied, as well as on his or her academic results and adult life. It is a phenomenon that concerns all countries and affects all social backgrounds to varying degrees, and its characteristics have changed in recent years with the use of social networks. France is no exception. According to the 2022 PISA survey, the percentage of 15-year-old students regularly being bullied was 9.1% in France, compared with an OECD average of 8.3% (Figure 5.17). The situation in France has deteriorated since the 2018 survey. Measures to combat bullying have been in place for around ten years. The Ministry of National Education and Youth allocates an annual budget of around 100 million euros to tackling the problem, which it considers a priority. This budget covers the remuneration of 150 full-time positions specifically dedicated to this issue.

Since 2019, the pHARe programme has been the cornerstone of the anti-bullying policy. It combines various tools for detecting and dealing with bullying, using local teams of teachers, education staff, secondary school students, and parents trained to tackle bullying. This open approach to the issue, involving students, parents and educational staff, is fully in line with the OECD's recommendations in this regard and is similar to what has been implemented in other countries, following programmes developed in Norway and Finland (OECD, 2017[116]).

Penalties for bullying were also tightened in 2023. In primary schools, bullies can now be expelled permanently to protect the victim. In secondary schools, systematic disciplinary procedures for bullying are now in place. Finally, a bill aiming to strengthen penalties for cyberbullying has been drafted.

At the start of the 2023 school year, the government introduced additional measures to tackle bullying in schools. They include a survey (the findings of which will soon be available) conducted among all students from CE2 onwards, involving an anonymous self-assessment designed to determine if students are at risk of being bullied. Norway's experience in the matter may inspire the way in which the French authorities build on this survey.

However, as already mentioned, France has room for progress in terms of discipline in schools, which is one of the factors that can reduce cases of bullying (Gregory et al., 2010[117]; OECD, 2017[116]).

Figure 5.17. Frequent bullying in France is close to the OECD average

Percentage of frequently bullied students
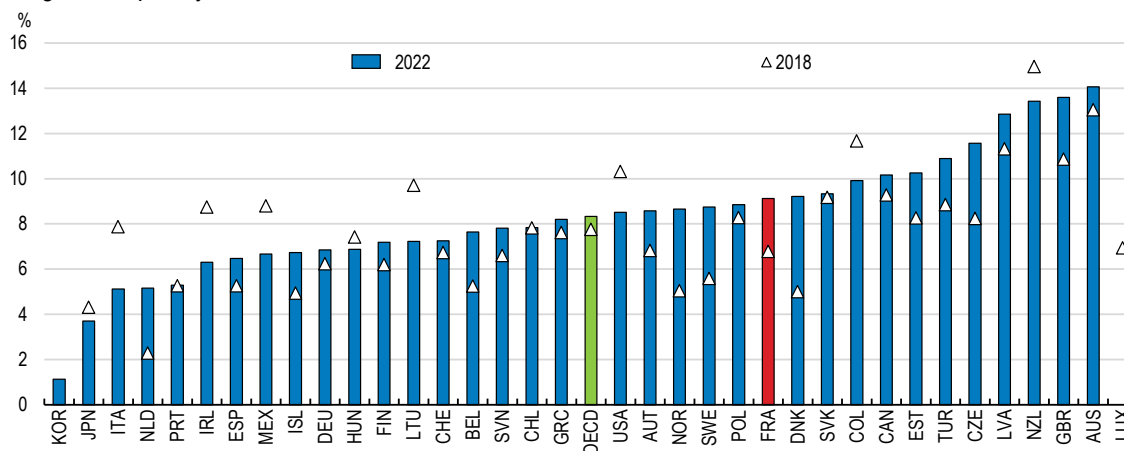
Note: A student is frequently bullied if he or she is in the top 10% of the index of exposure to bullying across all countries/economies. The index of exposure to bullying includes the following statements: "Other students left me out of things on purpose"; "Other students made fun of me"; and "I was threatened by other students".
Source: OECD, PISA 2022 Database, Table II.B1.3.30; OECD, PISA 2018 Database, Table III.B1.2.1.

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Reducing student lack of discipline and tackling violence at school

A positive climate in schools is conducive to students' development and performance. PISA 2022 shows a positive correlation between academic results and discipline in all countries. The survey was used to develop an index based on answers to various questions about classroom discipline. The index shows that France has the sixth-highest level of indiscipline. PISA results also show that France is the OECD country with the third-highest proportion of students who report noise and disorder in all or most lessons, at 42.5% of students compared with an OECD average of 30.4%.

Providing teachers with training in classroom management and student behaviour can help them to better ensure discipline in their lessons. In France, only 55% of teachers have received such training according to the TALIS 2018 survey, compared with an OECD average of 72% (Figure 5.18). The same survey shows that only 22% of teachers in France feel adequately prepared to manage classes and student behaviour, compared with an OECD average of 53%.

Some general principles can be drawn from the literature on the subject. Clear rules must be imposed on students so that they know the correct attitude to adopt (OECD, 2020[118]). However, students are more likely to accept the rules and punishments imposed by teachers if they believe them to be fair (Gouveia-Pereira, Vala and Correia, 2017[119]). Moreover, students will be more involved in classes if they appreciate the relevance of what is being taught, understand what is expected of them, and receive the support they need from the teacher (OECD, 2013[120]). Teachers who spend time developing individual relationships with students by paying attention to their expectations, showing appreciation for their work, and providing constructive feedback, are more likely to instil discipline in their classes (Rhodes and Long, 2019[121]).

Figure 5.18. Too few teachers receive training in classroom management
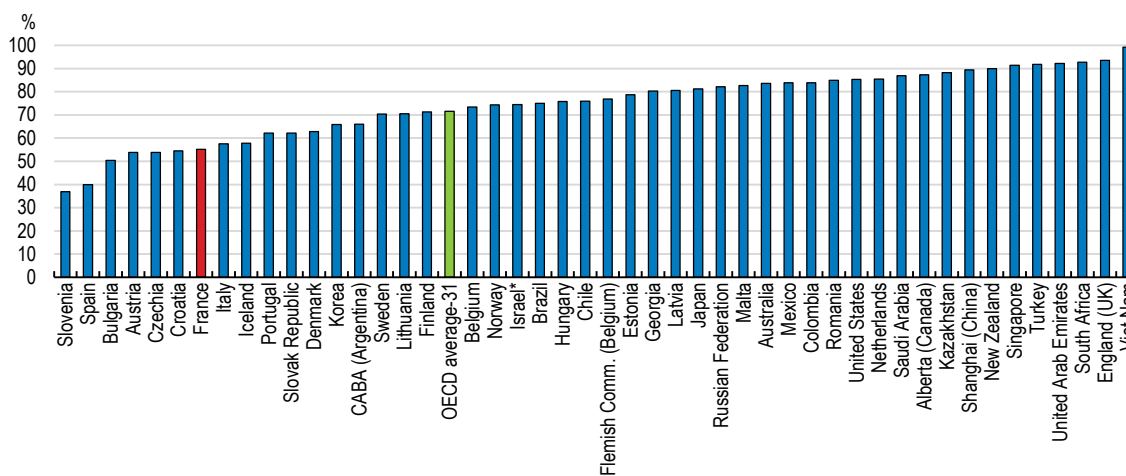
Note: Information on data for Israel available at: https://oe.cd/israel-disclaimer
Source: OECD, TALIS 2018 Database, Table I.4.13, Table I.4.20, Table I.5.18, Table I.5.21, Table I.2.20 and Table I.3.50.

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Guaranteeing the well-being of students and educational staff also means limiting acts of violence in schools. According to a 2021 survey carried out in France by the Ministry of National Education among primary school students, 23.1% had been afraid to come to school during the year because of violence, 33.1% had sustained deliberate injuries, and 40.2% said they had been victims of theft (Traore, 2022[122]). In addition, the TALIS 2018 survey shows that 18.9% of primary school teachers and 24.6% of lower secondary school teachers in France report that they are stressed by intimidation or verbal abuse from students, compared with 11.0% and 14.4% across OECD countries (OECD, 2019[123]).

To respond to violence in schools effectively, UNESCO recommends a comprehensive "whole-school" approach, combining a robust legal and policy framework for children, the gathering and analysis of detailed data on the subject, specific training for teachers, the involvement of all stakeholders (students, teachers, educational staff, parents and local authorities), better information for students, special consideration for vulnerable students, and the implementation of reporting, complaint and victim support mechanisms (UNESCO, 2019[124]). Portugal adopted this approach when it launched its "School without bullying, school without violence" plan in 2019, which mobilises a wide range of stakeholders and tools (OECD, 2021[125]). In 2019, France also introduced a plan to respond to violence in schools, which is also based on a wide range of measures. Disciplinary procedures and protection for school staff were strengthened, and support manuals were drawn up. Assistance and reporting mechanisms have been put in place, as well as "national school climate surveys". Groups bringing together the various stakeholders involved in this issue have been set up at academic level. Close monitoring of the results of this plan will be useful in fine-tuning the measures to be implemented.

### *Improving schooling for students with disabilities*

Offering children with special needs an education adapted to their requirements is essential to ensuring equal opportunities. Since 2005, French law has stipulated that any child or adolescent with a disability has the right to enrol in the school in his or her neighbourhood. As a result, the number of disabled children enrolled in schools has risen sharply, from about 150,000 in 2005 to close to 440,000 in 2022. At the same time, the budget dedicated to catering for disabilities in schools has increased considerably. It will exceed 3.8 billion euros in 2023, an increase of over 80% compared with 2017. Making school more accessible to children with disabilities is based mainly on the use of support staff for students with disabilities (AESH) and specialist teachers, who account for 63% and 36% of the budget respectively. Depending on their disability, students may be educated in ordinary classes, or with the support of a Local Unit for Educational Inclusion (ULIS), or in specialist units set up as part of the national strategy for autism. ULIS units are set up within schools and bring together students with disabilities in small classes. Teaching is coordinated by a specialist teacher. Regarding autism, the 2018-2022 national strategy established pre-school autism teaching units (UEMA), primary autism teaching units (UEEA) and self-regulation units (DAR) for secondary education, after having been developed in primary schools. These units are small classes of a maximum of seven students in pre-school and ten in primary and secondary education, led by a coordinating teacher along with health and social services professionals.

The support provided by learning assistants is invaluable for both students and teachers. According to a survey carried out in 2016 among teachers of students with disabilities, 81% of them felt that the learning support assistant in the classroom facilitated the student's independence and 59% felt that the support assistant facilitated their relationship with the student (Le Laidier, 2018[126]). The number of assistants has doubled in five years, rising to almost 130,000 in 2023. However, recruiting enough staff to match the growing needs remains a challenge. In 2022, more than 3,400 full-time equivalent posts had not been filled (Sénat, 2023[127]). Since the start of the 2021 academic year, localised inclusive support hubs (PIAL) have been set up to coordinate the work of support staff and respond more quickly to requirements. In addition, since 2018, support assistants have received 60 hours of basic training and distance- or classroom-based training. Expanding their training, by offering modules tailored to the needs of the students they will be assisting, would help to improve the way disability is managed in schools (Billon, Brisson and Monier, 2022[59]).

The increase in the number of disabled young people attending school also represents a significant shift for teachers, one which can sometimes prove demanding. Between 2012 and 2022, the number of disabled students enrolled in ordinary classes rose by 85% in primary schools and by 147% in secondary schools (MENJ, 2023[43]). In 2016, over 61% of teachers of students with disabilities felt that the presence of a disabled student in class created additional work for them (Le Laidier, 2018[126]). In 2018, the TALIS survey showed that there is a particularly significant need in France for teacher training on how to cater for students with special educational needs due to a physical, mental or emotional disability (Figure 5.19). To enhance teachers' abilities to accommodate students with disabilities, a certificate of professional competence in inclusive education practices was introduced in 2017. Since the start of the 2021 academic year, the training provided by the network of INSPE teacher training institutions has included at least 25 hours dedicated to inclusive school practices. From the start of the 2023 academic year, a special education teacher will be appointed in each school.

Figure 5.19. There is significant need for training in how to teach students with special needs

Percentage of principals reporting a shortage of teachers with competence in teaching students with special needs
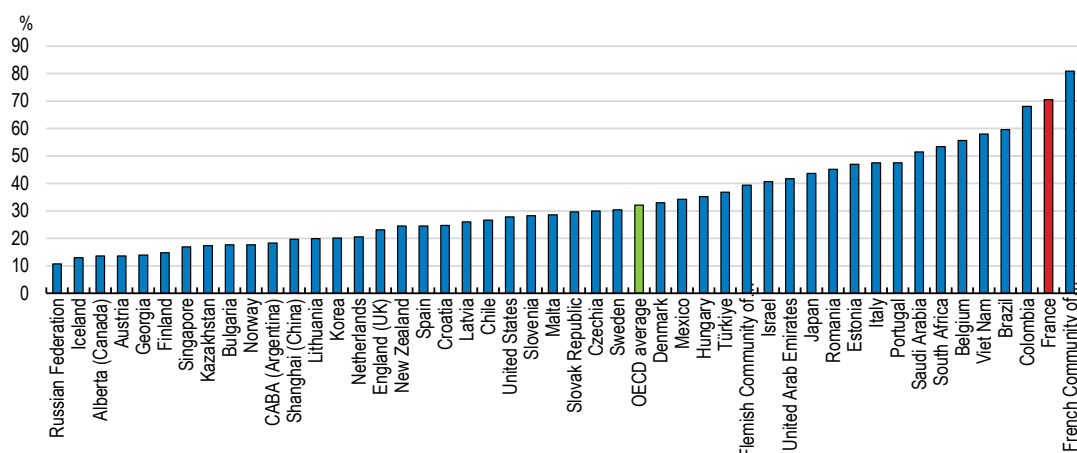
Note: Students with special needs are those for whom a special learning need has been formally identified because they are mentally, physically, or emotionally disadvantaged.
Source: OECD, TALIS 2018 Database

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Table 5.4. Recommendations to strengthen educational outcomes

MAIN FINDINGS	RECOMMENDATIONS (Key recommendations in bold)
Supporting a high-quality education system	
Primary schools have limited autonomy, and school leaders are teachers responsible for administrative and pedagogical functions. Secondary schools have partial autonomy in how they manage and implement state budgets. Results from PISA suggest that appropriately combining autonomy and accountability is associated with better student performances.	**Continue to raise school autonomy and accountability, particularly in primary schools.** Strengthen the role, responsibilities and career paths of school leaders, particularly in primary education and for those working in challenging contexts.
France spends around one-third more per upper-secondary student than the average OECD country yet spends 9% less per primary student.	Continue to rebalance the distribution of education spending towards primary schools.
Modern teaching practices promote critical thinking and decision making. They are associated with better student achievement and engagement but are used less widely than in other OECD countries.	**Reinforce the use of modern approaches to teaching including cognitive activation practices by ensuring that teachers have sufficient knowledge and skills, support, feedback and time.**
Supporting quality teaching	
The attractiveness of the teaching profession could be improved. Salaries are lower than in alternative professions with similar qualifications, especially in primary schools. Early career increases are slow.	**Improve the attractiveness of the teaching profession and consider reviewing remuneration for primary teachers and teachers in the middle of their career.** Better recognise the skills and experience of mid-career professionals within the teaching pay scale.
Recent reforms to initial training provide teaching students with more practical experience. However, some teaching students are not undertaking internships due to a lack of offers and concerns around workload.	Strengthen the role of practical experience components in initial teacher training. Ensure a sufficient supply of internships for all teaching students. Better distribute teaching students' workload to remove barriers to participating in practical experience.
Only around two-thirds of lower-secondary teachers have studied both the subject content and pedagogy of subjects they teach. The continuous training system remains complex, fragmented and of variable quality, with courses often weakly aligned with teachers' needs. While the EAFC (schools for continuous teacher training) are supposed to provide professional development opportunities for all education staff, the transition of the primary degree training offer under the EAFC has not yet been implemented in all *académies*.	Strengthen the link between professional development, skills acquisition and career advancement. Streamline the professional development system for teachers, clarify the role and objectives of the EAFC and ensure complementarity with other professional development operators. Enhance the integration of the primary education training offer under the EAFC in all *académies*.
Teacher training is hampered by a scarcity of practicing teachers who work as qualified trainers, insufficient training for trainers, limited recognition and adequate rewards, and difficulties replacing them in the classroom.	Reinforce the financial attractiveness of becoming a trainer for practicing teachers and ensure sufficient time for the role.
Improving equity in student outcomes	
France provides additional resources to disadvantaged schools in the "priority education" network. This provides a clear structure for greater resources but results in strong threshold effects.	**Continue to develop measures to combine the system of priority education networks with a more progressive allocation of resources to disadvantaged students outside of this system.**
Low-achieving and immigrant students are more isolated from other students in France than in the average OECD country.	Continue to build on the forthcoming evaluation of experiments that adjusted catchment areas, school assignment procedures and aimed to increase the attractivity of public schooling through offering specialised subjects.
The share of advantaged students in private schools contracted by the state is significantly higher than in public schools and has been increasing in the past two decades. These schools receive similar national funding as public schools and have complete autonomy over student selection.	Continue to boost the percentage of disadvantaged students in private schools contracted by the state by maintaining dialogue regarding student admittance criteria.

MAIN FINDINGS	RECOMMENDATIONS (Key recommendations in bold)
Adapting education to the future needs of the labour market	
In France, the interministerial system for information exchange *(Système Interministériel d'Echange d'Information, SIEI)* identifies young people over 16 who have left the school system without qualifications.	Gather information on early school leavers earlier, before the age of 16.
Countries with the best outcomes for students in vocational schools focus on work-study programmes.	Continue to support the development of apprenticeships starting in upper secondary school.
French primary school students perceive climate change as a major threat less than secondary and tertiary students.	Enhance environmental education in teacher training and curricula for primary schools.
Other indicators point to shortcomings in digital training for teachers, the availability of equipment and ICT use in classes. There is a shortfall in the number of computer science students	Maintain efforts to develop digital education and resources in schools. Make students aware of opportunities linked to the digital transition.
The percentage of girls enrolled on industrial, scientific and digital courses is lower in France than the OECD average. Boys are underrepresented in other courses.	Maintain and amplify communication actions and mentor programmes to guide girls towards industrial, scientific and digital fields and encourage boys towards humanities, social sciences and care professions. Continue to adapt teaching towards more gender equality.
Significant imbalances between labour supply and demand reflect students' lack of awareness about future employment opportunities. Disadvantaged students have less access to guidance counselling. The number of hours devoted to training is only a guideline. Form teachers have insufficient training in providing guidance. Around 8,000 bodies tasked with providing guidance counselling.	**Strengthen the quality of career choice counselling for secondary students, including through a stronger role for professional counsellors and additional efforts targeting disadvantaged students.** Strengthen the implementation of time devoted to career guidance and specify expected actions. Develop guidance training for form teachers. Coordinate and streamline bodies responsible for guidance services.
Recruitment of guidance counsellors targets psychology graduates.	Focus more on knowledge of the labour market when recruiting guidance counsellors and broaden recruitment to include a range of different profiles.
Improving well-being at school	
France has one of the highest incidences of in-class discipline problems in the OECD. Teachers and school leaders are insufficiently trained to deal with situations of unruly behaviour.	**Strengthen teacher training in classroom management and student behaviour.** Increase the involvement of school leaders in teaching issues and their training in this area.
The significant need for support staff is not being adequately met. Training for support staff is limited.	Continue efforts to recruit school support staff and develop their training in line with students' needs.
France is one of the countries where teachers need the most training in dealing with disabled students.	Continue efforts to train teachers to accommodate students with disabilities.

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FRANCE

France has faced two significant, successive shocks: the COVID-19 pandemic and the increase in inflation. Emergency government measures were decisive in protecting business, jobs and purchasing power, but at a high fiscal cost. Efforts to reduce public spending will be key to lower government debt. Lifting productivity growth hinges on a wider diffusion of digital technologies, reduced regulatory barriers and stronger innovation. The effectiveness of carbon pricing could be strengthened by gradually removing subsidies and tax exemptions that certain sectors benefit from.

Students perform at a similar level to OECD peers but the link between socio-economic background and educational outcomes is particularly strong. Spreading the allocation of public support to disadvantaged students more widely across schools would help to avoid threshold effects and to better respond to students' needs. Rebalancing the distribution of education spending in favour of primary schools could provide greater support to children in the early years of their schooling. The use of modern teaching approaches, including cognitive activation practices, that are associated with better student achievement, could be reinforced.

SPECIAL FEATURE: IMPROVING EDUCATIONAL OUTCOMES