

Why has growth in Italy lost ground to France since 2000?

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Until 2000, the French and Italian economies grew at a very similar pace, both in growth phases and in times of crisis. Since then, the activity differential between the two countries has increased every year, in favour of France. This gap is widening, although France and Italy are still two very similar countries: they share a border and are comparable in size and population. They use the same currency, have a very similar supply and demand structure, they are integrated into the same common market and share the same social model.

The average annual growth differential since 2000 is 1.0 GDP point, and ground has been lost in virtually all branches of activity. Part of this differential stems from the short-term divergence related to the sovereign debt crisis, the impact of which was considerably more powerful and sustained in Italy. Excluding this effect, the difference in potential growth between France and Italy is still 0.8 points per annum.

Several factors combine to account for this gap. The Italian demographic dynamic, with faster population aging and lower fertility, contributes 0.2 points on average across the period.

Some of the gap may also be the result of different ways of taking measurements. Sometimes the methods used by the French and Italian national accountants diverge. This is especially the case in the volume-price split for certain consumption or investment items, whether for capital goods or for services (rents, telephony, software and databases). All in all, about 0.2 GDP points seem to be attributable to these methodological differences.

When adjusted for these measurement differences and for the demographic effect, the growth potential differential should shrink to 0.4 GDP points on average per year, which is nevertheless significant. The complete absence of productivity gains in Italy is very surprising. Indeed, in some branches such as services to businesses, Italian productivity has been in sustained and steady decline since 2000. The arguments put forward in the literature (rate of research and development expenditure, qualification levels of the labour force, institutional organisation, shareholding structure, regional inequalities) do not seem able to account for the scale of the country's decline, either in time – since 2000 – or space, against all its European neighbours, particularly France.

Why has growth in Italy lost ground to France since 2000?

Italy and France, two countries with similar economic structures but diverging trajectories since 2000

Two economies with very similar trajectories until 2000...

Italy is very similar to France: historically, the two countries have developed along parallel lines, they are neighbours and founding members of the European Union then the Eurozone, their populations are similar in size, and they share a Latin culture. From the post-war period to the creation of the Eurozone, the two countries followed very similar economic trajectories: an intense catch-up phase with virtually no cyclical episodes from 1950 to 1973 (+5.2% average annual growth in France against +5.3% in Italy), followed by a period of growth at half this level between 1974 and 2000 (annual average of +2.4% for both countries) alternating phases of slowdown, or even recession (1974, 1979-1981, 1993) with phases of expansion which were the same for both countries.

...whose growth rates have diverged substantially since then...

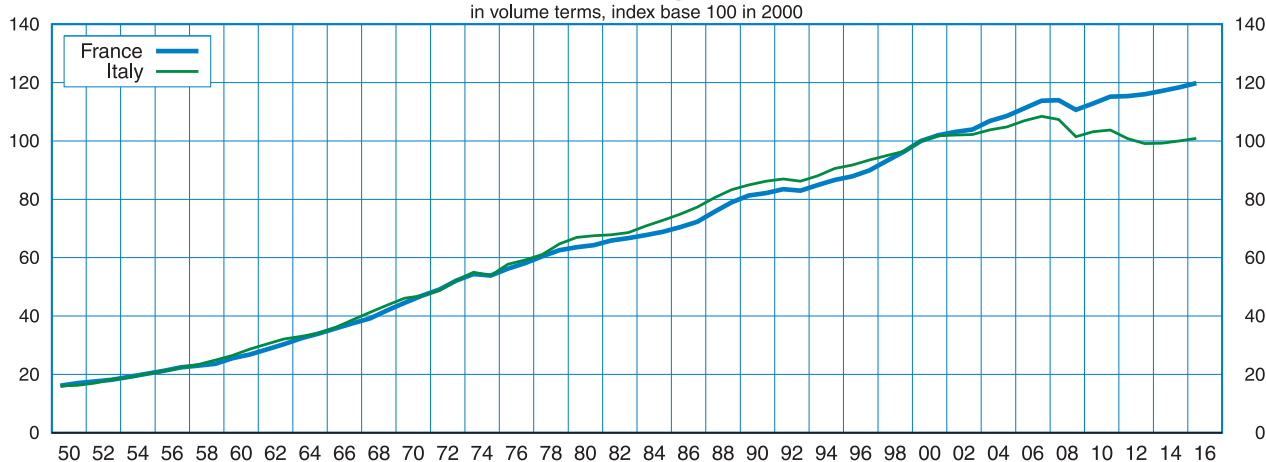
Since 2000, however, despite business cycles remaining the same for the two countries (Guillet and Lalonde, 2017), annual gross domestic product (GDP) growth has weakened significantly in Italy, falling to +0.3% on average between 2000 and 2016, whereas in France it slipped back much less (+1.3% on average annually, *Graph 1*). Thus the average annual growth differential since 2000 has been +1.0 point in favour of the French economy, whereas growth rates had previously been very similar.

...despite a similar productive structure

The structure of the productive system, i.e. the composition of value added per branch of activity, is fairly similar from one country to the other (*Table 1*).

1 - Growth has diverged since 2000

in volume terms, index base 100 in 2000



Sources: INSEE, ISTAT, CEPII retropolation, national accounts

Table 1 - Comparison of structure of value added by branch in 2000 and 2016

in %

	2000		2016	
	France	Italy	France	Italy
Agriculture, forestry and fishing	2	3	1	2
Industry	18	22	14	19
Construction	5	5	5	5
Trade, transport, accomodation and food service activities	18	22	18	21
Information-communication	5	4	5	3
Financial activities	4	5	4	5
Real estate activities	11	10	13	14
Services to businesses	12	9	13	9
Non-market services	21	16	23	17
Other services to households	3	4	3	4

Sources: INSEE, ISTAT, national accounts

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The structure of demand is also similar

However, the weight of industry is greater in Italy (19% in 2016) than in France (14%). Conversely, the weight of the public sector is greater in France (23% against 18%).

The two countries also have a similar demand structure (Table 2). The weight of government consumption is slightly higher in France (24% against 20% in Italy in 2016), with a fairly similar composition.

The weight of private consumption is greater in Italy, although the 7-point gap was reduced to 5 points between 2000 and 2016. The distribution of spending within private consumption is fairly similar in the two countries, although in Italy the proportion spent on housing is smaller.

However, the sovereign debt crisis has affected Italian investment particularly severely since 2011, widening the gap between the weight of investment in activity in France and in Italy from 2 points (in 2000) to 6 points (in 2016).

The decline in Italian growth is common to virtually all branches of activity

The sectoral composition of supply, which is very similar in both countries, had a minimal effect on the growth differential between the two countries between 2000 and 2016. The average annual growth differential in gross domestic product (GDP) of 1.0 point stemmed from almost all branches of the economy (Table 3).

The causes of the decline in Italian growth are therefore to be found in macroeconomic factors affecting all branches.

Table 2 - Comparison of structure of demand in 2000 and 2016

in % of GDP

	2000		2016	
	France	Italy	France	Italy
General government consumption	23	19	24	20
Private consumption	53	60	55	60
Gross fixed capital formation	22	20	23	17
Foreign trade	2	1	-2	3
Total	100	100	100	100

Sources: INSEE, ISTAT, national accounts

Table 3 - Growth in value added between 2000 and 2016 on an annual basis and contributions to the differential between France and Italy

in %

	France	Italy	Contribution to the differential
Agriculture, forestry and fishing	-0.4	-0.3	0.0
Industry	0.9	-0.3	0.2
Construction	-0.1	-1.0	0.0
Trade, transport, accommodation and food service activities	1.3	0.3	0.2
Information-communication	4.0	2.4	0.1
Financial activities	2.4	1.6	0.0
Real estate activities	1.5	0.6	0.1
Services to businesses	1.4	0.4	0.1
Non-market services	1.0	0.2	0.2
Other services to households	1.6	0.4	0.0
Total	1.3	0.3	1.0

Sources: INSEE, ISTAT, national accounts

Why has growth in Italy lost ground to France since 2000?

The sharp deterioration in the economic situation in Italy during the sovereign debt crisis accounts for around 0.2 points of growth differential per year on average since 2000

On the demand side, the Italian decline concerned mainly private consumption from 2000 to 2010...

Between 2000 and 2010, the annual growth differential between France and Italy reached +0.8 points on average. Private consumption alone accounted for +0.7 points (Table 4) as it was less dynamic in Italy (+0.7% annually) than in France (+2.0%). It suffered from the very moderate gains in Italian household purchasing power over the period (+0.4% on average per year), especially when compared with French households (+2.1%).

This difference in purchasing power was mainly the result of a smaller rise in per capita wages and more sustained inflation in Italy. Employment dynamics (Graph 2) and other income contributed relatively less (Table 5).

Since 2011, household purchasing power has slowed in both countries, and has even fallen back in Italy (Graph 3a). Faced with this decline in their purchasing power, Italian households have reduced their savings ratio substantially (by around 4 points), much more than in France where this ratio has remained relatively stable (Graph 3b). All in all, the contribution of private consumption to the growth differential has been similar to that before 2010 and since 2011.

...and has worsened since 2011 due to lower investment and government consumption

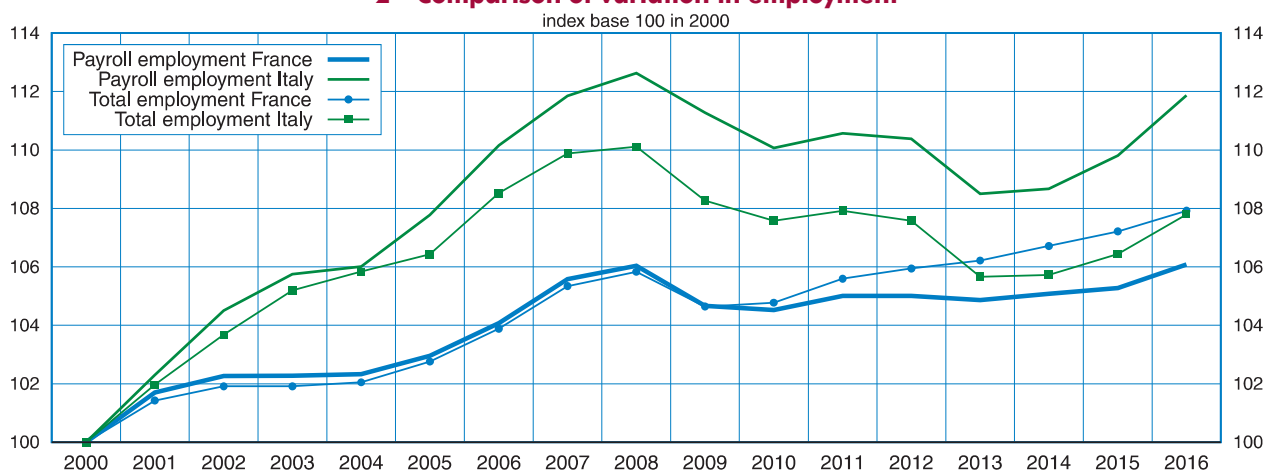
For the period 2011-2016, Italy suffered severely and directly from the sovereign debt crisis: its activity dropped by 0.4% per year on average, whereas France managed to withstand the crisis, with average annual growth of +1.0%. The growth differential therefore widened to +1.4 points. Investment became the main contributor, accounting for +1.0 point. The crisis had a marked effect on investment in Italy, which declined by an average of 2.7% annually over the

Table 4 - Comparison of growth of GDP and contributions of the main items of demand
in %

	2000-2010			2011-2016			2000-2016		
	France	Italy	Differential	France	Italy	Differential	France	Italy	Differential
Gross domestic product	1.5	0.6	0.8	1.0	-0.4	1.4	1.3	0.3	1.0
General government consumption	0.4	0.2	0.2	0.3	-0.1	0.5	0.4	0.1	0.3
Private consumption	1.1	0.4	0.7	0.5	-0.3	0.8	0.9	0.1	0.7
Investment and inventories	0.3	0.1	0.2	0.5	-0.6	1.0	0.4	-0.1	0.5
Construction	0.2	0.1	0.1	-0.1	-0.4	0.4	0.1	-0.1	0.2
Others	0.1	0.1	0.0	0.5	-0.2	0.7	0.3	0.0	0.3
Foreign trade	-0.3	-0.2	-0.1	-0.2	0.7	-0.9	-0.3	0.2	-0.4

Sources: INSEE, ISTAT, national accounts

2 - Comparison of variation in employment



Sources: INSEE, ISTAT, national accounts

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period. In particular, investment in capital goods shrank by 1.5% annually on average between 2011 and 2016 despite a recovery at the end of the period, whereas in France it grew by 1.6% over the same period.

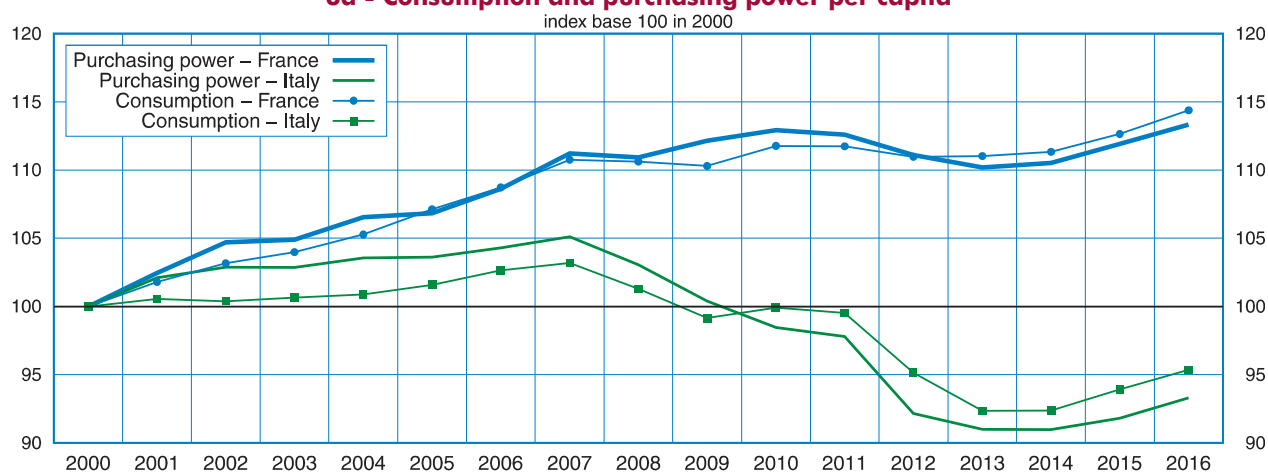
Thus by the end of 2016, investment in France was back to its 2008-2009 pre-crisis level, while in Italy it was still 20% below its pre-crisis level (*Graphs 4a* and *4b*). In addition, investment in construction plummeted in Italy, by an annual average of 4.6% since 2011, far more than in France (-0.4%). The sharp downturn in investment was due mainly to financing terms which in Italy had deteriorated significantly (*Box 1* and Fortin et al., 2015).

Table 5 - Comparison of growth of purchasing power and contributions of the main items
in %

	2000-2010			2011-2016			2000-2016		
	France	Italy	Differential	France	Italy	Differential	France	Italy	Differential
Purchasing power	2.1	0.4	1.7	0.3	-1.1	1.4	1.5	-0.1	1.6
Gross disposable income	3.6	2.7	0.9	1.0	0.3	0.8	2.8	1.9	0.9
of which total employment	0.5	0.5	-0.1	0.3	0.0	0.3	0.4	0.4	0.1
of which earned income per capita	1.9	1.4	0.5	0.7	0.4	0.3	1.5	1.0	0.5
of which other incomes	0.8	0.5	0.3	0.2	-0.1	0.3	0.5	0.3	0.3
of which social benefits	1.3	1.1	0.2	0.8	0.6	0.2	1.1	0.9	0.2
of which social contributions and taxes	-0.8	-0.8	0.0	-1.0	-0.4	-0.6	-0.9	-0.6	-0.2
Inflation	-1.6	-2.3	0.7	-0.8	-1.4	0.6	-1.3	-2.0	0.7

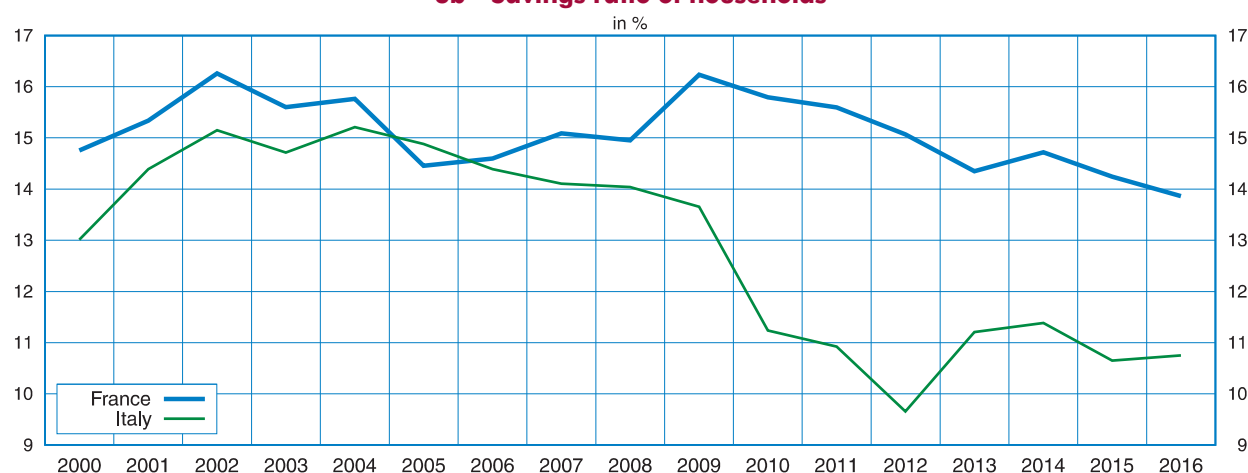
Sources: INSEE, ISTAT, national accounts

3a - Consumption and purchasing power per capita



Sources: INSEE, ISTAT, national accounts

3b - Savings ratio of households



Sources: INSEE, ISTAT, national accounts

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Government consumption also contracted in Italy (-0.7% as an annual average since 2011, against +1.2% between 2000 and 2010). In contrast, in France it continued to grow at a regular pace (+1.3% after +1.6%). Government consumption thus accounted for +0.5 points of growth differential from 2011, much more than between 2000 and 2010 (+0.2 points).

An improved balance of trade in Italy since 2011 due to weak domestic demand

From 2000 to 2010, the contribution of foreign trade to GDP growth was negative in both countries, and were of quite similar magnitude. Their export performances dipped in a similar fashion over this period, before stabilising after 2011. However, the trade balance improved in Italy between 2011 and 2016, unlike that of France. Imports increased very moderately: +0.3% on average per year, against +3.7% in France (Graph 5). Foreign trade has therefore reduced the growth differential by 0.9 points on average per year in favour of Italy since 2011.

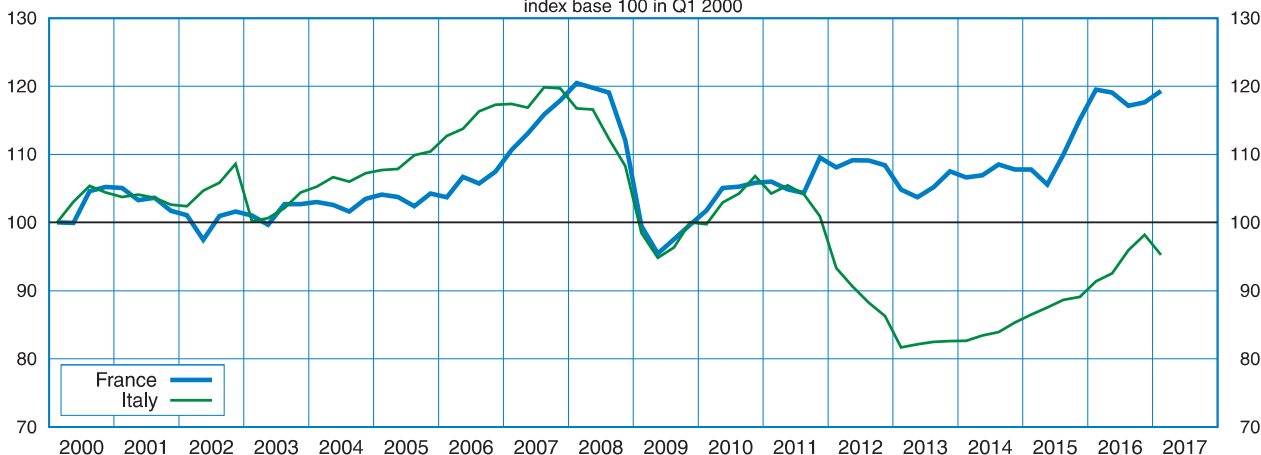
This is more a reflection of the sluggishness of economic activity in Italy over this period, most notably due to the decline in private investment, and the good export performance of the Italian economy: foreign sales progressed in a similar fashion to France.

The output gap therefore deteriorated much more markedly in Italy

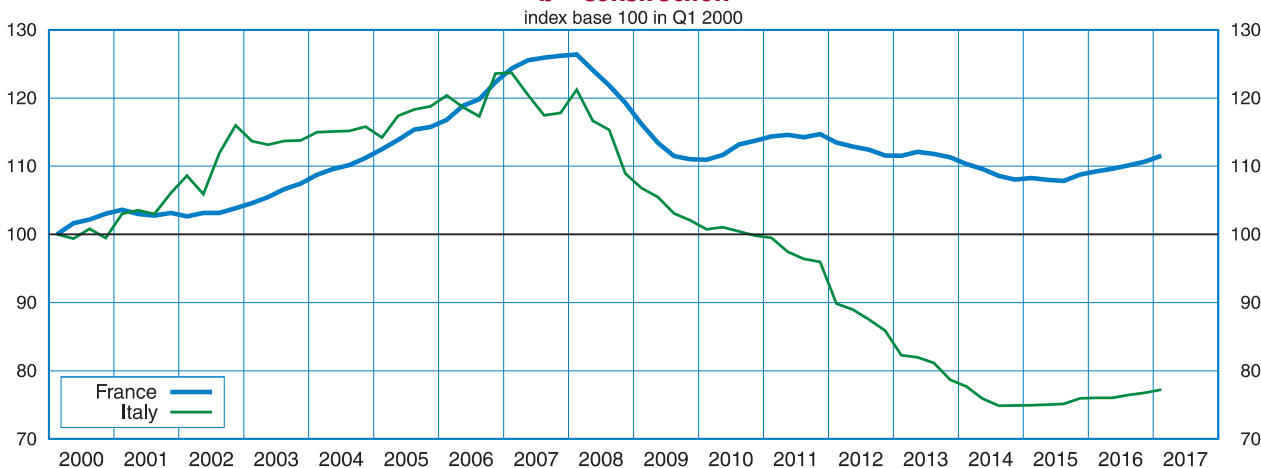
Part of the GDP growth differential between 2000 and 2016 is therefore linked to cyclical factors. To determine what these factors are, it can be noted that the growth differential was "only" +0.8 points per year over the period 2000-2010, but increased to +1.0 point per year when the entire 2000-2016 period is considered, as the sovereign debt crisis had a much greater impact in Italy. This difference of 0.2 points can be considered as a first measurement of the cyclical differential between the two countries.

4 - Gross fixed capital formation

a - Equipment



b - Construction



Sources: INSEE, ISTAT, national accounts

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This effect can also be assessed through the output gap, which reflects the position of each economy in its cycle. The output gap is the difference between the level of actual activity in the country and its potential level, i.e. the level it would reach if production factors were used without creating inflationary tensions. This potential, which cannot be observed directly, is estimated using econometric models. According to OECD estimates, in the early 2000s France and Italy were in a favourable phase, in excess of their potential.

The output gap was positive and comparable for the two countries (*Graph 6*). Both were affected by the 2008 crisis, but after this Italy suffered much more from the sovereign debt crisis between 2011 and 2013. Thus the output gap widened far more in Italy than in France. Despite an upswing in activity from 2014, the output gap remained more negative in Italy than in France in 2016. Thus the output gap differential estimated by the OECD was 2 points in 2016. Compared with the situation in 2000, this contributed to an average annual growth differential of 0.1 points between the two countries.

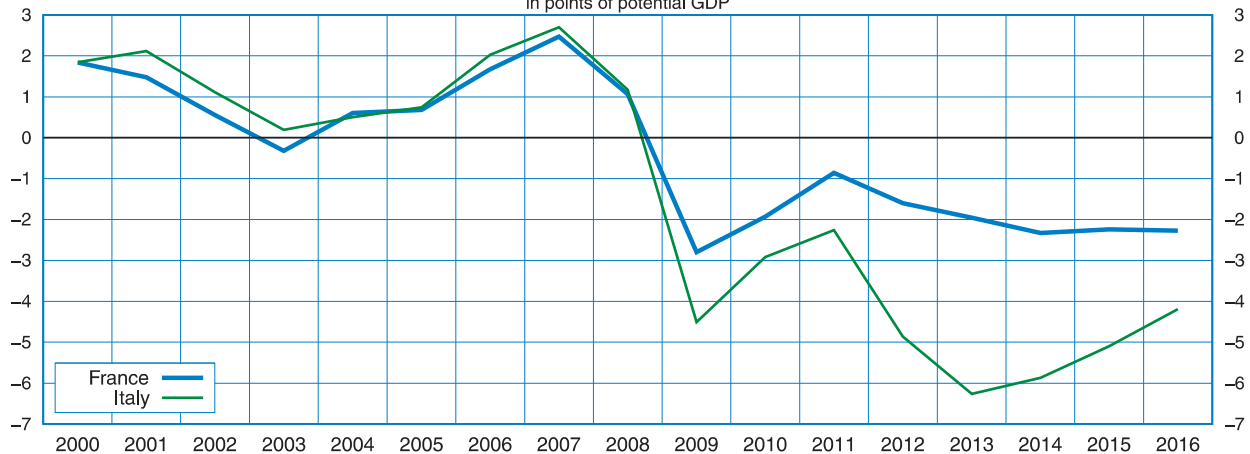
The two measurements of this cyclical differential therefore suggest that the difference in the impact of the sovereign debt crisis contributed to an average annual growth differential of around +0.2 points between France and Italy for the period 2000-2016, concentrated in the years 2011-2013. When adjusted for cyclical effects, the difference in growth between France and Italy remains at +0.8 points per year.

5 - Imports and exports in value terms



6 - Output gap

in points of potential GDP



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Box 1 – The sovereign debt crisis in Italy: a financial shock compounded by very substantial fiscal consolidation measures

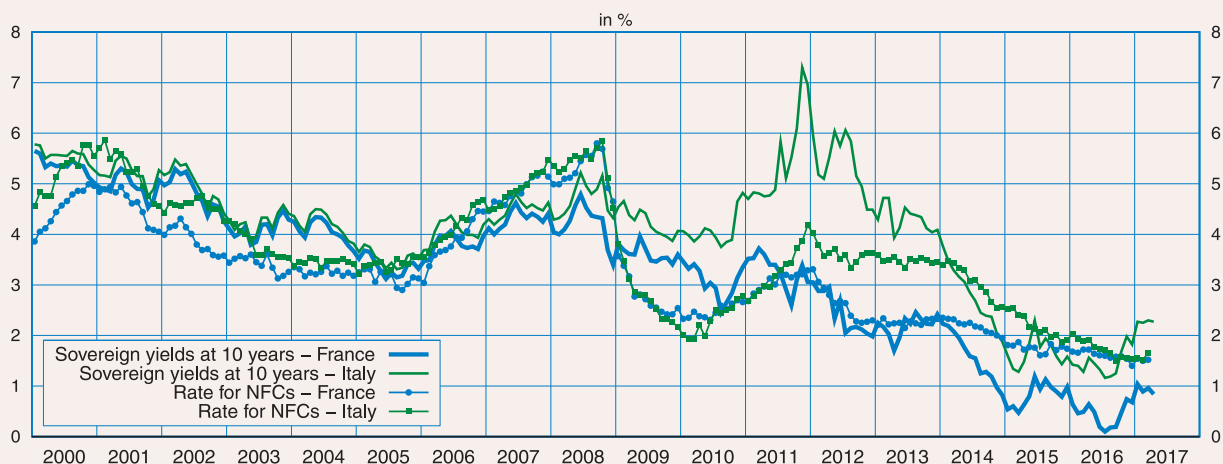
The crisis experienced by the countries of the southern Eurozone clearly differentiated between the Italian and French economies. In November 2011, sovereign yields recovered sharply in Italy (*Graph 1*), while French securities, on the other hand, saw a slight decline as a result of the effect of a “flight-to-quality”.

The sudden rise in Italian sovereign credit rates had several consequences. First, private rates increased substantially and the Italian banks, which held a great many domestic sovereign bonds, severely restricted their conditions for loan offers. Corporate loans, which had increased in parallel in France and

Italy from 2004 to 2011, declined in Italy, resulting in a decline in corporate investment (*Graph 2*).

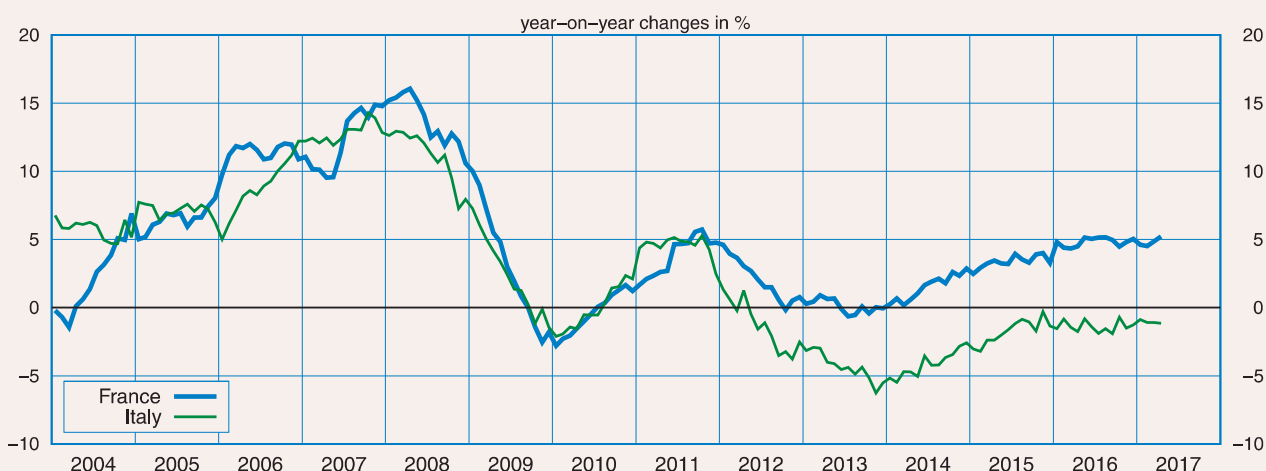
In addition, the sharp increase in government financing costs resulted in the Italian government implementing severe fiscal consolidation measures (*Graph 3*). In 2012 and 2013, the Italian structural balance improved by 3.2 points, against 1.8 points in France. This more restrictive fiscal policy mainly accounts for the growth differential in government consumption and investment over the period. ■

1 - Sovereign yields



Source: European Central Bank

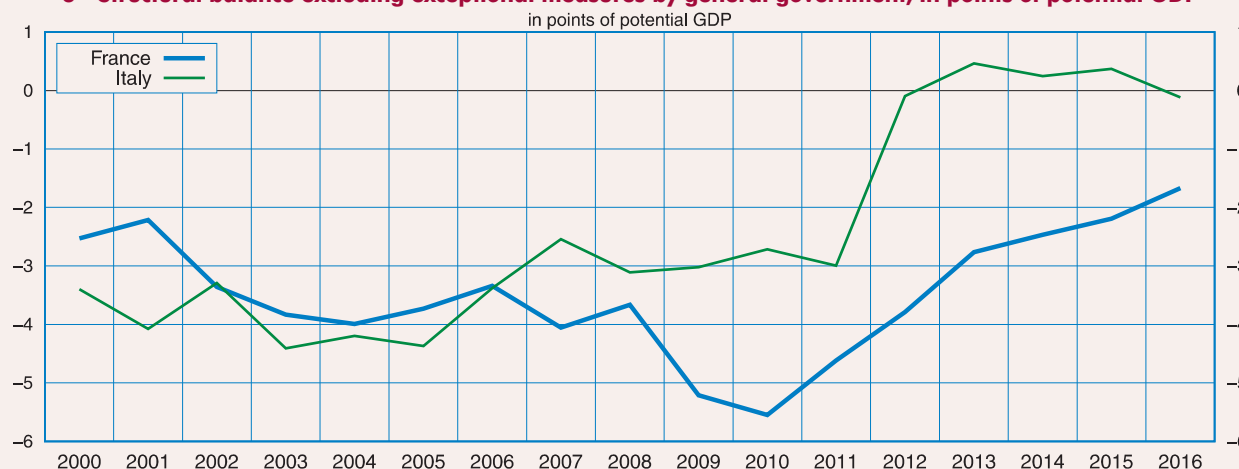
2 - Loans to non-financial corporations



Source: European Central Bank

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3 - Structural balance excluding exceptional measures by general government, in points of potential GDP



Source: OECD, forecast for year 2016

The demographic factor accounts for 0.2 points of average annual growth differential since 2000

The total populations of France and Italy are similar, but their population dynamics are not. The French population has increased by 0.6% per year since 2000. The Italian population has increased less rapidly, by 0.4% per year (Table 6). All in all, the less dynamic demographics in Italy account for 0.2 points of the average annual growth differential observed since 2000. In other words, when adjusted for population variations and excluding the cyclical factor, the diagnosis differs only slightly: economic growth in France is still higher than that in Italy from 2000, at around 0.6 GDP points every year. In addition, the demographic factor does not shed light on the break since 2000, as between 1975 and 2000, the average annual difference in demographic growth was already greater: +0.5% in France against +0.1% in Italy.

Table 6 - Demographic effects and growth of GDP between 2000 and 2016

variations in %, differentials in points

		Cumulative growth	Annual average growth
GDP variation	France	24.4	1.29
	Italy	4.6	0.26
	Differential (1)	19.8	1.03
Variation in GDP per capita	France	12.8	0.71
	Italy	-1.8	-0.11
	Differential (2)	14.6	0.82
Contribution of demography	(1)-(2)	5.2	0.21

Sources: INSEE, ISTAT

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Methodological differences may explain about 0.2 growth points per year

Measuring activity in volume terms means taking quality effects into account

In order to estimate real growth in a country's activity, when considering variations in amounts in euros, factors related to price rises must be neutralised. This means measuring variations in the price of identical products, i.e. at constant quality. In practice, this is rather difficult to carry out as product characteristics change frequently: new products are created or improved while others disappear. In particular, in the case of technological products such as televisions, computers, household appliances, telephones, motor cars, etc., innovations are often introduced with the result that these products shift upmarket. With this type of product it is not easy to distinguish, for example, whether a change in household expenditure in current euros on televisions is purely a price variation or a change in the characteristics of the product, in other words, a "quality effect". Various treatment methods can be used, each with its own advantages and disadvantages, although none is clearly preferable to the others (Caillaud *et al.*, 1998, present these methods for France).

Estimating quality effects may be done differently from one country to another

At European level, the principles behind the harmonisation of consumer price indices set out guidelines for these readings. However, the methods used to take quality effects into account may vary from one country to another. This sometimes results in a difference in the way volumes of activity are calculated, but this is not systematic. On the one hand, a difference in measuring the consumer price index does not necessarily mean a difference in measuring volumes of activity: for example, national accountants may favour volume indicators directly. On the other hand, the volume-price split of mainly imported products has only an indirect influence on that of economic activity.

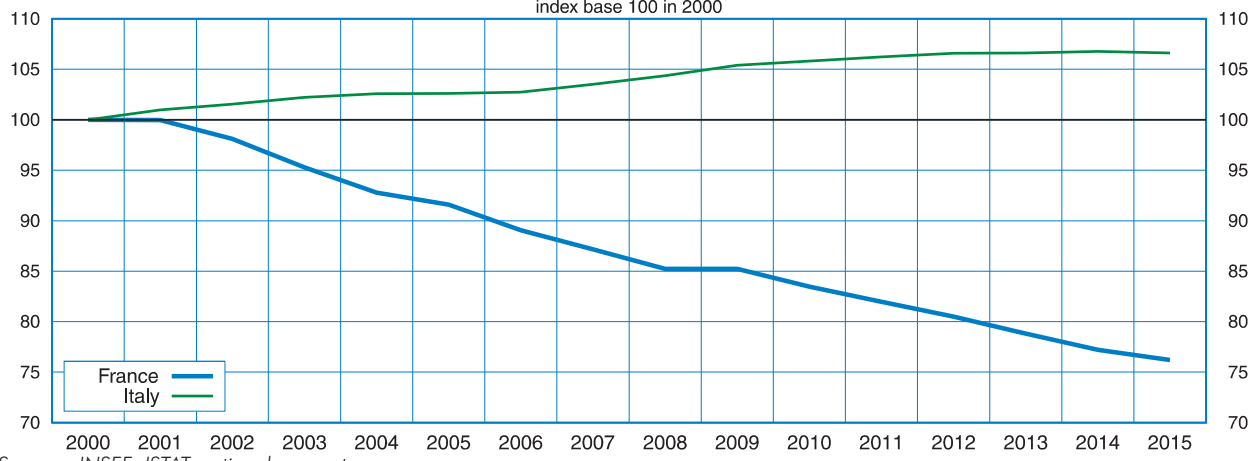
The growth differential in value terms between France and Italy is smaller

For France and Italy, the average annual growth differential in GDP in volume terms is +1.0 point from 2000, whereas it is only +0.6 points for value data. In other words, the contribution of the deflator to the growth differential is around +0.4 points annually, as the increase in prices in Italy is estimated to be greater.

Estimation of quality effects seems to be clearly different for some consumption items

The French and Italian methods for measuring prices, and hence the adjustment for quality effects, are manifestly different for certain items of household expenditure. This is particularly true for household appliances: the price index for these products has increased annually by 0.4% on average since 2000 for Italy, but decreased by 1.8% in France (Graph 7), although these are products that for the most part are traded at world level and price changes should be fairly similar since they are expressed in the same currency.

7 - Deflator of household consumption of household appliances



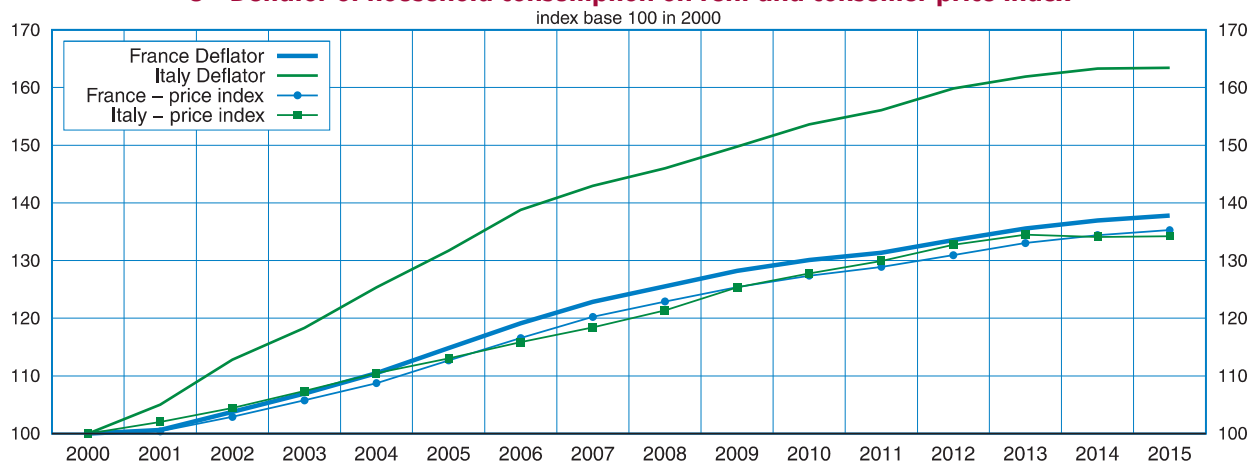
Sources: INSEE, ISTAT, national accounts

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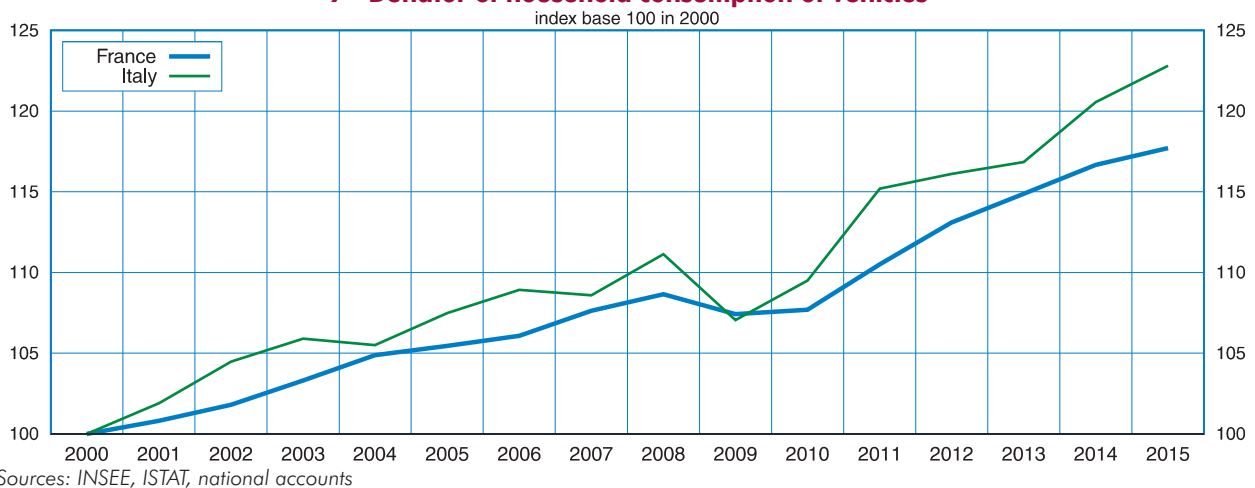
For this item, the adjustment for quality effect therefore appears more favourable for changes in volumes in the case of France than in that of Italy. Similar differences in treatment can be found for other goods, such as tools, cultural appliances and accessories or for certain services. For rents in particular (real or imputed), the method used also appears to differ between the two countries. In the French national accounts, the consumer price index is used as the indicator, and the deflator of consumption is scarcely different. In the Italian national accounts, however, the price index used is determined from the “Household Budget Survey”; this index increases considerably faster than the consumer price index (*Graph 8*), resulting in a change in volumes that is less dynamic than if the consumer price index had been used.

Telecommunication services are another example where treatment diverges. In the French accounts, volumes consumed are assessed directly from the number of minutes, SMS or MMS messages exchanged. Using this method, technological progress is taken into account in terms of information exchange. In the Italian accounts, volumes are deduced from change in value based on operators’ receipts and price changes and telephone packages measured in the consumer price index (ISTAT, 2012). The result is a difference in the measurement of volume growth, which would be less dynamic if the French national accounts were drawn up using a similar method to the Italian accounts. However, for other products that change quality frequently, such as motor cars, changes in deflators and hence the quality effect adjustments are similar in the two countries (*Graph 9*).

8 - Deflator of household consumption on rent and consumer price index



9 - Deflator of household consumption of vehicles



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The treatment of quality effects also has repercussions on investment measurements

The use of different methods to measure quality effects seems to be repeated in some investment items too. This is particularly the case for technological equipment investment: between 2000 and 2016, growth in this item in value terms was similar in the two countries, but growth in volume terms was significantly more dynamic in France than in Italy, especially from 2011 (Graph 10). Such a disparity in the volume-price split for this type of investment is one of the reasons for growth differentials between different OECD countries (Ahmad *et al.*, 2017); price changes in France since 2000 fall between those of Italy and those of the USA and the United Kingdom, where they have dropped much more sharply.

Analysis of productivity trends since 2000 also points to differences in measurements from one economy to another

Similarly, the volume-price split for investment in software and databases seems more favourable for growth measured in France than in Italy (Graph 11).

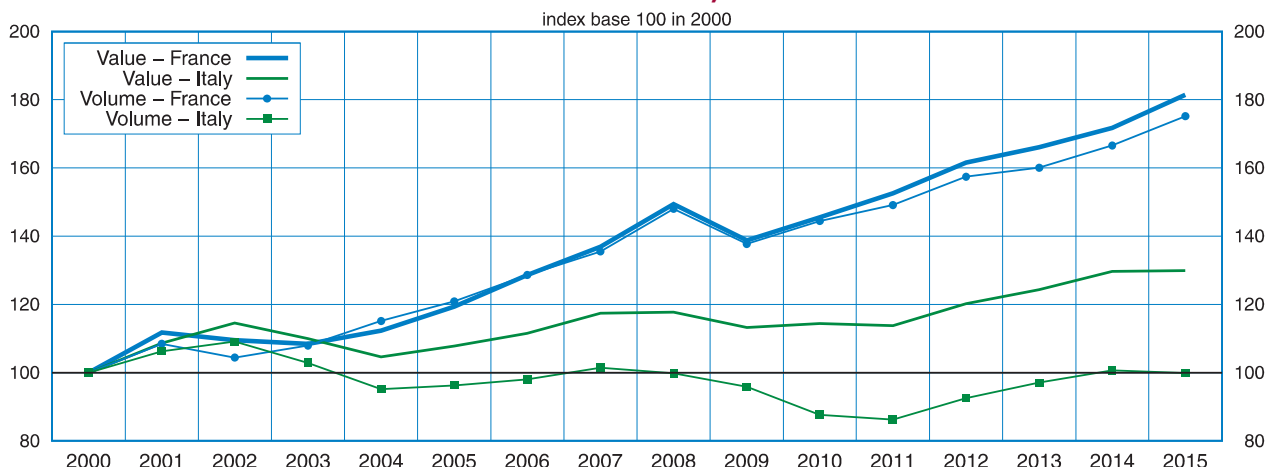
For the economy as a whole, the decline in growth since 2000 in Italy compared with France, while employment increased in a much more homogeneous way in the two countries (Graph 12), resulted in a sharp decline in productivity. This was concentrated in just a few branches (Table 7). Productivity gains were higher in France than in Italy by an average of 1.0 point per year. The main contributions were from industry (+0.3 points), trade, transport and accommodation and food services (+0.2 points), services to businesses (+0.2 point), and finally information-communication (+0.1 points). However, in construction, productivity fell significantly and in a similar fashion in both countries.

10 - Investment in information and communication technology, in value and in volume terms



Sources: INSEE, ISTAT, national accounts

11 - Investment in software and databases, in value and in volume terms



Sources: INSEE, ISTAT, national accounts

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In the different branches, the productivity gaps are partly the result of differences identified in the consumption or investment deflators. Thus the measurement differences in the quality effects of electronic products are partly to be found on the supply side on the trade margins, where the volume-price split follows that of consumption. Lastly, half of the differences observed in information-communication are the result of the difference in concept in the prices of telephone services.

For other branches, the decline in productivity in Italy is of interest even though it is not easy to highlight a difference in measurement. This is especially the case in services to businesses where the productivity gap peaks: while productivity was stable overall in France between 2000 and 2016, at the same time in Italy it decreased continuously and sharply (-2.4% annually), according to published data. Although it declined to a lesser extent in "other services to households", productivity in Italy dropped by 1.5% annually after 2000 whereas it increased moderately in France (+0.7% per year). Exactly the same result is obtained when analysis is based on hourly productivity.

12 - Comparative analysis of productivity for selected branches

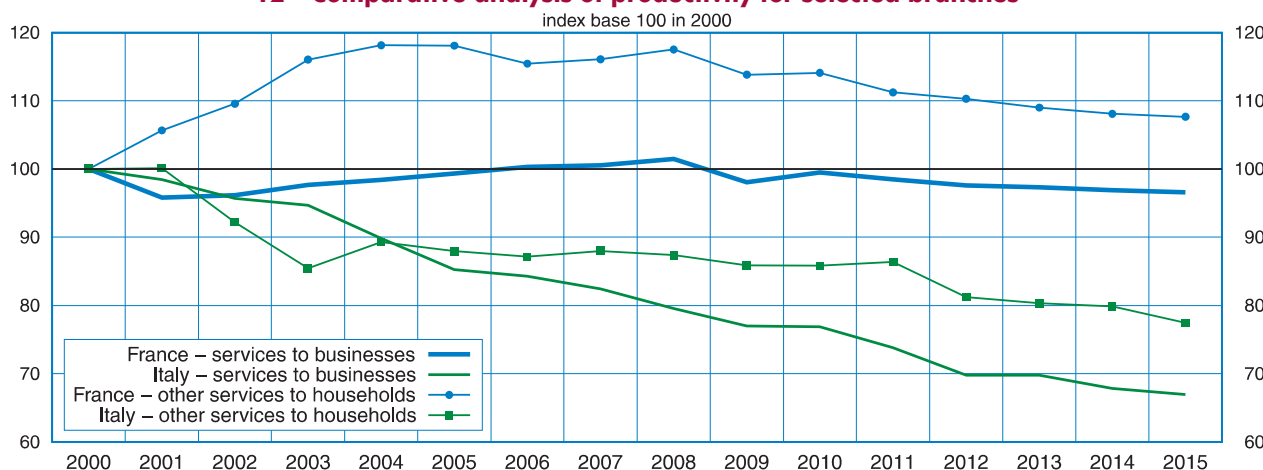


Table 7 - Annual change in productivity by branch between 2000 and 2016 and contributions to the differential

in %

	France	Italy	Contributions to the differential
Agriculture, forestry and fishing	1.0	0.7	0.0
Industry	2.3	0.7	0.3
Construction	-1.3	-1.2	0.0
Trade, transport, accomodation and food service activities	0.5	-0.5	0.2
Information-communication	2.8	1.4	0.1
Financial activities	1.6	1.3	0.0
Services to businesses	-0.5	-2.4	0.2
Non-market services	0.4	-0.1	0.1
Other services to households	0.7	-1.5	0.1
Total (except real estate activities)	0.7	-0.3	1.0

Note: here, productivity is measured as the ratio of value added by volume to employment in individual persons.

Sources: INSEE, ISTAT, national accounts

Why has growth in Italy lost ground to France since 2000?

All in all, methodological differences account for 0.2 points of growth differential since 2000

All in all, the methodological differences identified when measuring activity contribute to the growth differential between France and Italy. This is especially true for products with a high technological content, where innovations have often been introduced and where consumption is growing. When combining the consumption and investment items for which a major difference in deflator seems to clearly indicate a difference in the method used to measure the quality effect, and take their import content into account, the methodological differences in measuring activity would appear to account for about 0.2 points of Italy's lower annual growth since 2000 (Table 8).

The ground lost could also be linked to structural factors that are difficult to quantify

The demographic, cyclical and methodological factors that have been identified account for about half of the growth differential that has appeared since 2000 between France and Italy: 0.6 points per year out of a total of 1.0 point per year on average. In the economic literature (Mrabet (2016), Mody and Riley (2014), Calligaris *et al.* (2016)), other factors have been suggested to account for the Italian decline: the poor level of research and development (Graph 13), the general weakness of the productive investment rate, lower qualification levels of the labour force, labour market rigidities which are likely to limit the integration of young people in particular and hence the effective use of human capital, weak competition in certain goods and services markets which is likely to limit innovation, the family-based structure of Italian capitalism, regional inequalities specific to the country, the increasing misallocation of capital, and also weakening institutions and increasing corruption.

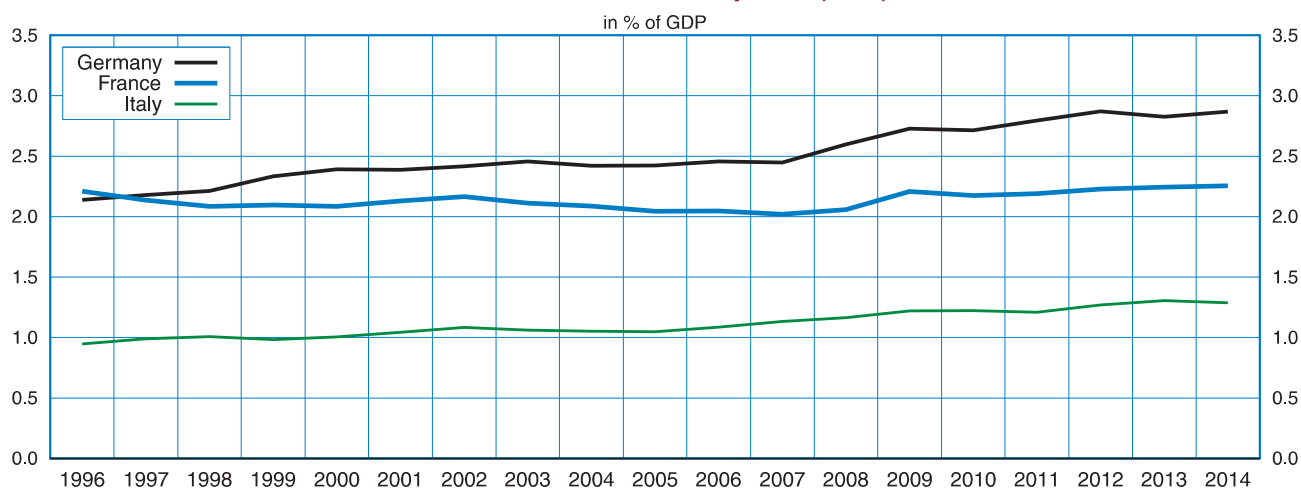
Table 8 - Growth differentials attributable to differences in method

	in GDP points		
	2000-2010	2011-2015	2000-2015
Consumption of goods	0.04	0.01	0.03
Consumption of services	0.16	0.09	0.14
Investment	0.08	0.03	0.05
Total	0.28	0.13	0.22

How to read it: differences in methods used to measure quality effects in the consumption of services contributed 0.14 points to the annual growth differential between France and Italy, between 2000 and 2015.

Sources: INSEE, ISTAT, national accounts, calculations by authors

13 - Ratio of research and development (R&D) to GDP



Source: World Bank

Why has growth in Italy lost ground to France since 2000?

However, most of these factors, which are structural in nature, are very difficult to quantify. Nor can they demonstrate the scale of the decline in both time – before and after 2000 – and space, and in comparison to France in particular. For example, the research and development rate is certainly lower than in the rest of Europe, but this was already the case in the 1990s, with no apparent growth differential, and since 2000 it has even increased more in Italy than in France. In addition, the rate of higher education graduates has increased considerably more in Italy than in the rest of Europe (Gros, 2011). Also, the productive investment rate in Italy was very similar to that of French enterprises until 2010 and only fell back with the sovereign debt crisis. Finally, there is no particular reason to suggest that regional disparities are the cause of the decline (Box 2). Regarding labour market rigidities, Hassan and Ottaviano (2013) use OECD employment protection data to show that Italy's market was more flexible than those of France and Germany from 2000 to 2007.

However, regarding the misallocation of capital, Calligaris *et al.* demonstrate a very sharp rise in Italy over 20 years: in each industry, the variance of per capita productivity per firm increased greatly. The authors calculated that this factor potentially made a major contribution of around 20% to 60% of productivity loss, depending on the branch. Regarding the quality of institutions, Gros (2011) highlights the very serious deterioration in Italy's ranking since 2000 in different classifications concerning respect for the law, the effectiveness of government, and corruption, although without quantifying the consequences.

Nevertheless, although these different structural factors may persist, the growth differential fell significantly in 2015 and 2016 and is likely to be moderate once again in 2017 compared to the preceding fifteen years (+1.3% expected in Italy against +1.6% in France in this *Conjoncture in France*): as the Italian output gap is even more pronounced, Italy will see a faster improvement in its economic situation. ■

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Why has growth in Italy lost ground to France since 2000?

Box 2 – Regional disparities do not seem to be a factor in the ground lost by Italy

In Italy, per capita GDP shows some major regional disparities. For example, per capita GDP in the southern part of the country (€18,100 in value per annum) is much less than that in Lombardy (€35,700 per annum). However, the least prosperous regions in Italy contribute no less to their country's growth than the least dynamic regions in France contribute to the French economy. In other words, in terms of contribution to growth, there are strong regional disparities in Italy, but they are no greater than the disparities between Île-de-France and the least populated regions of France. Italy, however, does not have the advantage of a world-ranking metropolis such as Paris, which is a powerful driving force for the French economy: more than a third of French growth between 2000 and 2015 derived from Île-de-France. ■

Regional contributions to national growth

