SECTORAL ANALYSIS OF NON-FINANCIAL CORPORATIONS IN PORTUGAL 2010-2015

Central Balance Sheet Studies

November 2015





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Foreword

This analysis is based on data obtained from *Informação Empresarial Simplificada* – IES (Simplified Corporate Information) and held in the Central Balance Sheet Database of Banco de Portugal. Through IES, enterprises are able to meet their obligation to report their annual accounts simultaneously to the Ministries of Finance and Justice, Banco de Portugal and Statistics Portugal (Instituto Nacional de Estatística – INE).

IES is usually reported within six and a half months of the financial year end, which, for most enterprises resident in Portugal, corresponds to 15 July of the year following the reference year. This analysis uses IES data for 2014, the latest as at the cut-off date for this publication. Data reported by enterprises through IES is subject to quality control by Banco de Portugal mainly to ensure that the accounting information for the economic year is coherent and complete and that the main aggregates are consistent throughout the years.

In addition to information obtained through IES, this publication features complementary data on the financing of enterprises in Portugal available in other databases of the Statistics Department of Banco de Portugal, in particular *Central de Responsabilidades de Crédito* (Central Credit Register – CCR). This information characterises a significant share of the liabilities of Portuguese enterprises, particularly loans from the resident financial sector.

Summary

In 2014, of the 390,000 active enterprises in Portugal, 89% were microenterprises. Large enterprises, despite accounting for 0.3% of the number of enterprises, generated the highest share of turnover (43%). Compared with 2010, there was an increase in the relative number of microenterprises (2 p.p.), while large enterprises reinforced their share of turnover (2 p.p.).

By economic activity sector, 74% of enterprises were part of the services sectors (trade and other services), accounting for 60% of the turnover. The sectoral structure in terms of number of enterprises underwent little change from 2010. However, there was a noticeable increase in the importance of manufacturing (+3 p.p.), to the detriment of construction (-4 p.p.) in terms of turnover.

In 2014 the number of active enterprises in Portugal rose by approximately 2% from 2013, particularly among microenterprises and in the agriculture and fishing sector.

With regard to activity indicators, turnover grew marginally above 2% in 2014, after a slight decrease in 2013.

Joint developments in operating income and expenses led to a 1% increase in EBITDA in 2014 and, resulting in the maintenance of return on equity. SMEs posted the highest net profitability levels of the period as a percentage of turnover (3%), while microenterprises recorded negative profitability (-3%). By economic activity sector, electricity and water continued to be the sector with the highest net profitability (11%), comparing favourably with manufacturing and trade (both with 2% profitability levels). Other services posted negative values for this indicator in 2014 (-2%), while in construction figures were marginally negative (-0.1%).

The average capital ratio of enterprises declined by 1 p.p. from 2010, to 30%. As in 2013, 30% of enterprises continued to post negative equity.

In 2014 bank loans were the main source of debt (26%), despite a reduction in their weight by 2 p.p.

Interest expenses decreased in 2014, which, together with positive developments in EBITDA, contributed to a reduction in financial pressure on the sector as a whole.

Trade credit financing accounted for 16% of enterprises' liabilities in 2014. However, in net terms, the sector did not obtain financing through this means. In fact, enterprises financed their customers by more than they obtained in financing from suppliers. Trade and agriculture and fishing were the only sectors that obtained trade credit financing.

Data available compiled by the Central Credit Register of Banco de Portugal shows that the total stock of loans to enterprises in June 2015 accounted for 77% of the figure observed in 2010, similarly to the value registered at the end of 2014. Over the same period, the quality of credit granted to enterprises deteriorated. At the end of June 2015, the non-performing loans ratio amounted to 16.3%, comparing negatively with 4.8% at the end of 2010.

At the end of the first half of 2015, construction had the highest non-performing loans ratio (31.0%, compared with 7.1% in 2010), followed by trade (16.4%, compared with 6.3% in 2010). Conversely, electricity and water posted the lowest value (1.0%, compared with 0.3% in 2010).

Increased exposure to the external markets is noticeable when looking at the growing share of the export sector in total enterprises, most notably in the Minho, Douro and Beira Litoral regions. Despite the dynamics in the export sector over the past few years, a very substantial share of Portuguese exports was associated with a relatively stable set of enterprises.

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1. Introduction

The study *Sectoral Analysis of Non-Financial Corporations in Portugal 2010-2015* evaluates the economic and financial position of nonfinancial corporations (NFCs)¹ resident in Portugal, based on information compiled by the Central Balance Sheet Database of Banco de Portugal.²

This publication updates *Central Balance Sheet Study No 18 - Sectoral Analysis of Non-Financial Corporations in Portugal 2009-2014*, of November 2014. The analysis focuses chiefly on the 2010-14 period, and is based on the *Informação Empresarial Simplificada –* IES (Simplified Corporate Information), while the first half of 2015 is also analysed where additional information is available, especially regarding financing by bank loans. References are also made to the 2006-14 period, specifically regarding the analysis of the export sector.

The results published complement aggregate data on non-financial corporations,³ also derived from the Central Balance Sheet Database and released within the scope of Banco de Portugal's statistical publications.⁴ Based on the analysis of microeconomic data, this study seeks to provide additional information for the NFC sector and for the economic activity sectors and size classes comprised in it. This is intended to complement

the average results usually calculated for aggregates and identify/explore heterogeneous groups of enterprises taking into account distinctive features.

The study begins with a brief reference to the structure and dynamics of the NFC sector in the 2010-14 period. Afterwards, it reviews recent activity developments and seeks to determine the extent to which these are reflected in profitability. This involves breaking down the effects that influence profitability into operating and financial components of corporate business, while providing some information on the sector's enterprises solvency capacity.

Based on complementary information available in other databases from Banco de Portugal's Statistics Department, details are given on the financial debt of Portuguese enterprises, specifically bank loans. The role played by the export sector in NFC activity in Portugal is also analysed.

The Annex provides a methodological summary of the main concepts used throughout the study. The statistical series under analysis can also be found on Banco de Portugal's website (in Excel format). 12

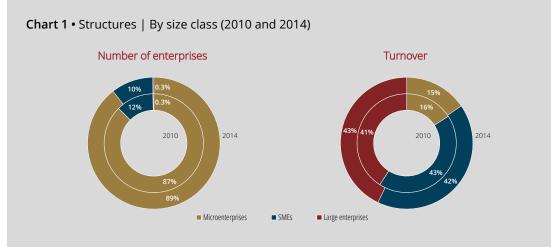
2. Structure and dynamics

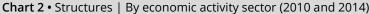
In 2014 the NFC institutional sector encompassed around 390,000 enterprises, of which 89% were **microenterprises**. Large enterprises, representing only 0.3% of the total, accounted for 43% of the sector's turnover (Chart 1).

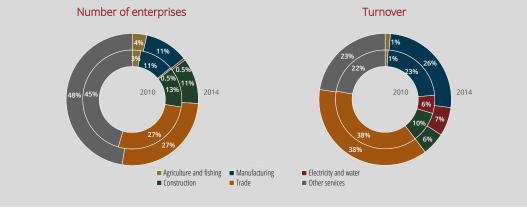
By economic activity sector, **other services** (48%) and **trade** (27%) were the most relevant sectors in terms of the number of enterprises. When considering turnover, **trade** (38%) and **manufacturing** (26%) played a key role (Chart 2).

Compared with 2010, there was an increase in the share of **microenterprises** (2 p.p.), while **large enterprises** reinforced their share of turnover (2 p.p.). Furthermore, the share of **SMEs** declined by 2 p.p. in terms of the number of enterprises and turnover over the same period. The sectoral structure in terms of the number of enterprises underwent little change, similarly to the previous year. However, there was a noticeable increase in the importance of **manufacturing** (+3 p.p.) to the detriment of **construction** (-4 p.p.) in terms of turnover in 2014.

Crossing size with economic activity shows that in 2014 **microenterprises** were dominant in all economic activity sectors in terms of the number of enterprises, their weight ranging from 71% to **electricity and water** and **manufacturing** and 93% in **other services** (Table 1).







	Number of enterprises by size			Turnover by size			
	Micro- -enterprises	SMEs	Large enterprises	Micro- -enterprises	SMEs	Large enterprises	
Total	89.5%	10.3%	0.3%	15.4%	41.7%	42.8%	
Agriculture and fishing	91.9%	8.0%	0.1%	40.7%	53.8%	5.5%	
Manufacturing	71.4%	27.9%	0.7%	5.3%	44.2%	50.5%	
Electricity and water	70.9%	26.4%	2.7%	1.8%	17.4%	80.8%	
Construction	89.1%	10.7%	0.1%	21.9%	47.8%	30.3%	
Trade	90.7%	9.1%	0.2%	19.8%	43.9%	36.3%	
Other services	92.9%	6.9%	0.2%	20.9%	40.6%	38.5%	

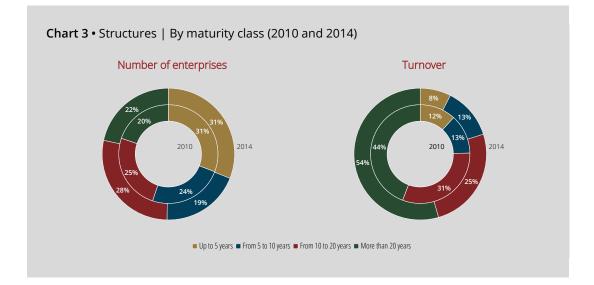
Table 1 • Structures | By economic activity sector and size class (2014)

Note: Darker areas show the most relevant size class per economic activity sector for each of the indicators considered.

Turning to turnover, despite the greater importance of large enterprises in total NFCs (43%), SMEs stood out in agriculture and fishing (54%), construction (48%), trade (44%) and other services (41%). Large enterprises accounted for the most significant share of turnover in electricity and water (81%) and manufacturing (51%).

By maturity class,⁵ the share of enterprises established for less than five years was particularly relevant (31%). In turn, the number of enterprises established for less than 10 years was similar to the number of enterprises established for more than 10 years. This structure shows a greater maturity of the Portuguese corporate landscape compared with 2010, when younger enterprises accounted for 55% of the population (Chart 3).

The same analysis based on turnover shows a clear predominance of enterprises established for more than 10 years, which accounted for 80% of NFC turnover in 2014 (75% in 2010). In this section, enterprises established for more than 20 years accounted for 54% of NFC turnover (44% in 2010).





With regard to the sector's dynamics, the number of active enterprises in Portugal increased by approximately 2% in 2014, following marginal growth in 2013 (Chart 4).

By size class, and similarly to 2013, the increase in the number of enterprises occurred among **microenterprises**, the only size class with a birth/death ratio above 1 (i.e. net creation of enterprises) (Chart 5).

The number of active enterprises increased across nearly all economic activity sectors, **construction** and **electricity and water** being the only sectors with a birth/death ratio below 1. As in 2013, **agriculture and fishing** grew the most, with 2.8 new enterprises created for each enterprise that ceased activity.

Furthermore, **manufacturing** and **trade** continued to follow a recovery trend, which had started in 2012. The number of active enterprises increased in both sectors in 2014. In the case of **manufacturing**, this increase followed a decline in the number of active enterprises in 2013.

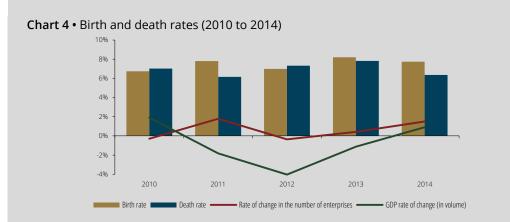
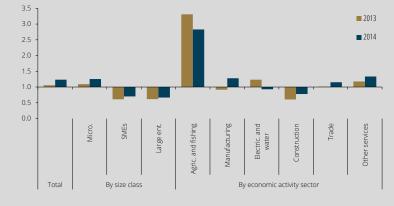


Chart 5 • Birth/death ratio (2013 and 2014)



3. Economic and financial analysis

3.1. Economic environment

In 2014 Portuguese GDP increased by 0.9% in real terms, after dropping by 1.1% in 2013. With the exception of public consumption (which declined by 0.5%), all other components recorded positive developments (Table 2).

Private consumption grew by 2.2% (after falling by 1.2% in 2013), on the back of a reduction in the levels of household spending and debt from previous years. Gross fixed

capital formation increased by 2.8% (after a 5.1% decrease in 2013), accounting for a positive change for the first time since 2009. Imports (7.2%) accelerated from 2013 (4.7%), while exports decelerated, despite a positive change of 3.9% (7.0% growth in 2013).

With regard to the first half of 2015, data published by Statistics Portugal points to GDP growth (1.6%). The main components of GDP grew more than in the same period a year before.⁶

	2010	2011	2012	2013	2014 (p)	2015 (1 st half- year) (p)
GDP	1.9%	-1.8%	-4.0%	-1.1%	0.9%	1.6%
Private consumption	2.4%	-3.6%	-5.5%	-1.2%	2.2%	2.9%
Public consumption	-1.3%	-3.8%	-3.3%	-2.0%	-0.5%	0.1%
Gross fixed capital formation	-0.9%	-12.5%	-16.6%	-5.1%	2.8%	6.9%
Exports	9.5%	7.0%	3.4%	7.0%	3.9%	7.2%

-5.8%

-63%

47%

Table 2 • GDP and key expenditure components | Real year-on-year rate of change

78%

Sources: INE and Banco de Portugal.

Note: (p) – preliminary data.

Imports

3.2. Activity and profitability

3.2.1. Turnover

NFC turnover grew slightly above 2% in 2014, following a marginal decrease in 2013 (0.5%). According to preliminary data from the Central Balance Sheet Database, this indicator was relatively stable in the first half of 2015.

In 2014 turnover developments were positive for SMEs (3%), large enterprises (2%) and microenterprises (1%) (Chart 6). It should be emphasized that large enterprises and SMEs had posted negative figures for this indicator in 2013. Most economic activity sectors saw their turnover increase in 2014, with positive changes in turnover and above those seen in 2013. Mention should be made to **other services**, which grew by 4% in 2014, following a null variation in 2013, and **agriculture and fishing** (6%, compared with 2% in 2013).

7 2%

9 5%

Nevertheless, **electricity and water** posted a negative change of 1% (2% growth in 2013), while turnover in **construction** decreased by 5%, which was nonetheless lower than that seen in 2012, when this sector's turnover declined by 24% from the previous year.

Developments in NFC turnover in 2014 stemmed from positive contributions from the

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domestic and external markets (1.4 p.p. and 0.9 p.p. respectively).

The share of turnover (sales and provision of services) from exports increased marginally compared to 2013 (to 22%), while the weight of imports in total purchases of goods and services increased by 1 p.p. (to 28%).

In 2014 the NFCs' balance of goods and services transactions with the external markets remained positive, amounting to 0.2% of turnover, 0.1 p.p. below the ratio for 2013 (Chart 7).

Manufacturing was the only sector with positive developments in this indicator (2 p.p. from 2013). By size class, **large enterprises** continued to show negative values for this indicator (-2%, value below what was registered in 2013), while in the cases of **microenterprises** and **SMEs**, the opposite, was registered (positive balances of 1% and 2% respectively, albeit to a lesser extent than in 2013).

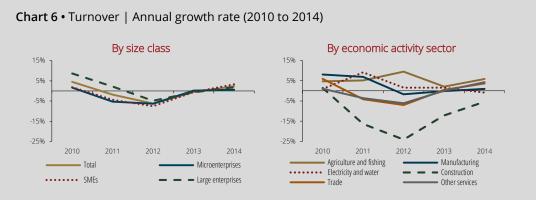
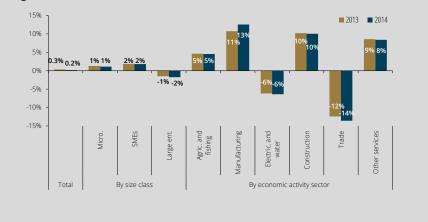


Chart 7 • Balance of goods and services transactions with the external markets | As a percentage of turnover (2013 and 2014)



3.2.2. Operating expenses⁷

NFC operating expenses increased by 2% in 2014 compared with 2013. This increase was broadly based across operating expense components (Table 3).

By size class, the growth rate of operating expenses ranged between 0.1% in microenterprises and 3% in SMEs (2% in large enterprises). In turn, operating expenses declined in construction (5%) and electricity and water (2%).

The largest increases in each operating expense component were observed in SMEs, other services (in terms of the Cost of Goods Sold and Materials Consumed (CoGS)), and agriculture and fishing (in terms of suppliers and external services (SES) and employee expenses). In turn, the largest reductions were seen in microenterprises and electricity and water, with the exception of SES, where construction showed the most negative evolution. In 2014 employee expenses increased for the first time since 2010, most notably by 7% in **agriculture and fishing** and 4% in **manufacturing**, as well as by 3% in both **SMEs** and **large enterprises**. However, employee expenses decreased in **electricity and water** (8% decline from 2013).

3.2.3. EBITDA⁸

Joint developments in operating income and expenses led to an increase in EBITDA in 2014 (1%). Compared with 2013, this indicator declined only among **large enterprises** (14%) and **other services** (17%).

Due to changes in EBITDA below those seen in 2013, associated with the sector's dynamics, the weight of enterprises with EBITDA growth (54%) remained unchanged from 2013 (Table 4). In turn, the share of enterprises with negative EBITDA decreased by 1 p.p. (35% in 2014). Positive developments were broadly based across most aggregates, excluding **agriculture and fishing** and **manufacturing** (0.4 p.p. and 0.04 p.p. increases respectively).

		CoGS	SES	Employee expenses	Operating expenses
Total		2.0%	1.9%	2.3%	2.0%
	Microenterprises	-0.2%	1.1%	-0.9%	0.1%
By size class	SMEs	2.7%	3.5%	3.3%	3.0%
	Large enterprises	2.1%	0.4%	2.7%	1.8%
By economic activity sector	Agriculture and fishing	1.0%	6.2%	7.1%	3.6%
	Manufacturing	-0.3%	3.4%	3.9%	1.0%
	Electricity and water	-1.8%	2.3%	-8.0%	-1.6%
	Construction	0.2%	-10.1%	-0.7%	-5.1%
	Trade	3.5%	2.5%	2.2%	3.3%
	Other services	8.1%	3.8%	2.5%	4.0%

Table 3 • Operating expenses | Annual growth rate (2014)

Note: Darker areas stress the most significant changes by size class and economic activity sector. The lighter areas show all positive changes.

		Share of enterprises with annual EBITDA growth			ises with negative TDA
		2013	2014	2013	2014
Total		53.6%	53.9%	36.2%	35.3%
	Microenterprises	53.4%	53.8%	38.4%	37.6%
By size class	SMEs	55.6%	54.3%	18.3%	17.2%
	Large enterprises	59.0%	57.9%	11.6%	8.2%
By economic activity sector	Agriculture and fishing	55.0%	56.0%	29.2%	29.6%
	Manufacturing	55.9%	53.8%	28.9%	29.0%
	Electricity and water	53.7%	49.4%	31.4%	29.8%
	Construction	52.5%	52.4%	36.5%	35.0%
	Trade	54.1%	54.5%	37.5%	36.9%
	Other services	53.1%	53.7%	37.7%	36.4%

 Table 4 • Enterprises with annual EBITDA growth and enterprises with negative EBITDA (2013 and 2014)

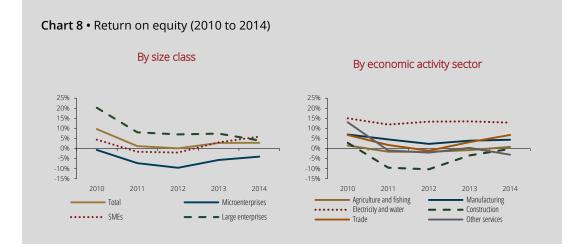
3.2.4. Profitability

Due to marginal growth in NFC operating income, return on equity⁹ in 2014 remained unchanged from the previous year (3%) (Chart 8). According to preliminary data available, ROE seems to have increased in the first half of 2015.

Profitability levels remained unchanged due to different dynamics, which become clear when looking at developments by size class: positive changes in terms of profitability among **microenterprises** and **SMEs**, compared with 2013, in contrast to a fall in profitability among **large enterprises**.

In any case, for the first time in the course of the period under review, **SMEs** posted the highest profitability levels (6%), above those of **large enterprises** (4%) and **microenterprises** (-4%).

In sectoral terms, **electricity and water** continued to be the sector with the highest return on equity (13%), with **other services** (-3%) in the opposite position. Furthermore, **agriculture and fishing** (1%) posted positive profitability levels while **construction** had marginally negative profitability (-0.2%, following the recovery trend seen in the sector since 2012).



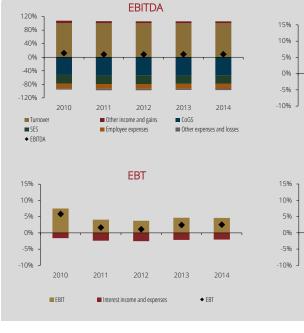
Box 1 | NFC profitability

NFC profitability may be assessed by looking at the weight of the various income and gains components, as well as expenses and losses, in turnover. Breaking down the various NFC earnings components shows that operating income (as measured by EBITDA) is prominently associated with the turnover component (on the income side) and the CoGS, SES and employee expenses components (on the expenses side).

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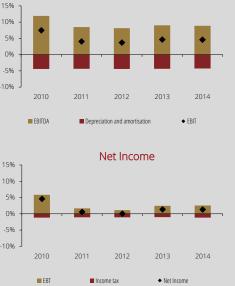
In 2014 EBITDA in NFCs corresponded to 9% of their turnover, similarly to 2013. CoGS was the most representative component in this indicator (55% of the total in 2014), followed by SES and employee expenses (24% and 14% respectively). The other income and gains components (which include operating subsidies, changes in production, own work capitalised, inter alia) and other expenses and losses (also including impairments and provisions) accounted for 6% and 4% respectively of NFC turnover in 2014.

Turning to developments, and taking into account the period between 2010 and 2014, the weight of CoGS in turnover increased by 2.5 p.p. Developments in the weight of other income and gains (2 p.p. below its 2010 level) were offset by a reduction in the weight of SES (also by 2 p.p. from 2010) in total turnover (Chart 9).

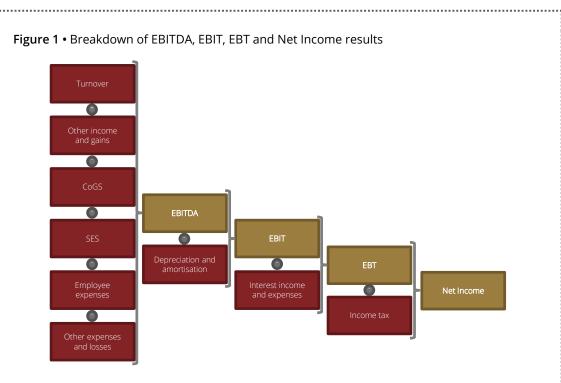


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Chart 9 • Income and gains, expenses and losses and NFC earnings | As a percentage of turnover (2010 to 2014)



EBIT

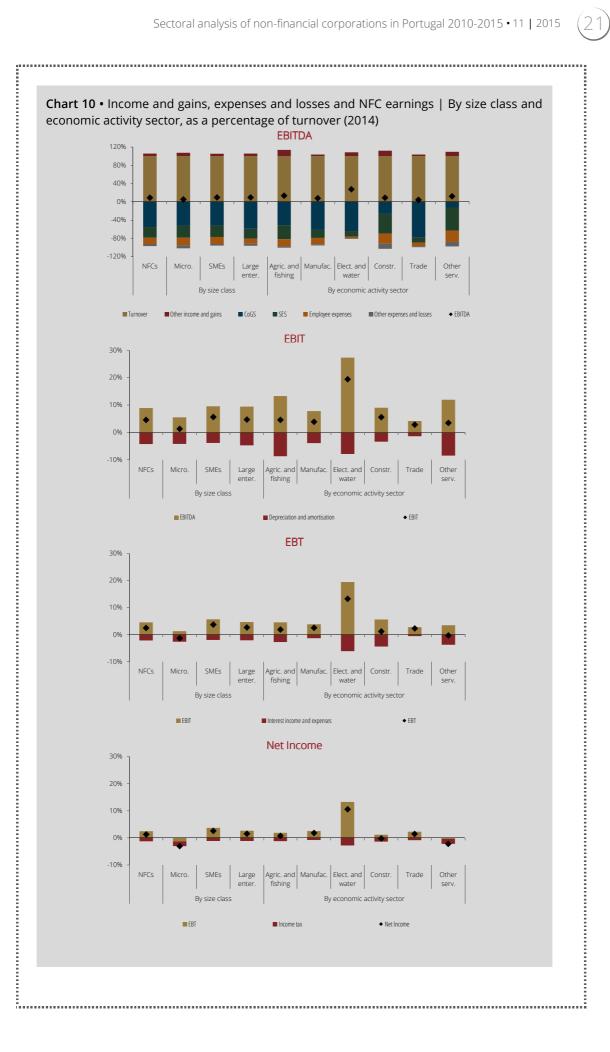


Net NFC profitability incorporates, in addition to its operating income, the effect of components such as depreciation and amortisation (which, deducted from EBITDA, results in EBIT), interest income and expenses (which, assessed in net terms, determines EBT from EBIT) and income tax (which, starting from EBT, results in the net income for the year) (Figure 1). As a whole, these components stood for 8% of NFC turnover in 2014, particularly depreciation and amortisation, which accounted for more than half of that value. The net effect of interest on NFC profitability (given the differential between interest income and interest expenses) accounted for 2% of corporate turnover. Income tax has represented approximately 1.2% of enterprises' turnover. The joint effect of these components determined that the net income for the year stood for 1% of NFC turnover, although EBITDA had accounted for 9% of that benchmark.

The weight of interest in NFC profitability has declined from 2012 onwards (when interest was 2.6% of corporate turnover). The income tax effect increased marginally in 2014 from 2013. Nevertheless, net NFC profitability posted positive changes of 1.3 p.p. from 2012, although these changes were negative, by 3.3 p.p., when compared to 2010.

By size class, operating income of **microenterprises** in 2014 stood for 6% of their turnover, which contrasts significantly with was seen in **SMEs** and **large enterprises**: between 9% and 10% (Chart 10). This was associated with the smaller contribution from employee expenses, in the case of **large enterprises**, and other expenses and losses, in the case of **SMEs**, to their operating income. In turn, other income and gains were more relevant among **microenterprises** as a whole (7% of their turnover), as opposed to the lower weight of CoGS (-3 p.p. than in NFCs).

As regards to net profitability, as a percentage of turnover, **SMEs** posted positive net profitability levels of around 2.6% of their turnover, which compares favourably with **large enterprises** (1.6%). In turn, **microenterprises** recorded negative net income for the year in 2014 (-3.0%).







Breaking down by economic activity sector, special mention should be made to the operating income of **electricity and water**, **agriculture and fishing** and **other services** (27%, 13% and 12%, respectively, of their turnover). With regard to the contribution from the various components to operating income, other income and gains were particularly relevant in **other services** (10% of its turnover), with a more substantial weight only in **agriculture and fishing** and **construction** (14% and 12% of their turnover). In terms of operating expenses, turnover in **trade** was absorbed by approximately 80% by CoGS, while **construction** and **other services** were the sectors where SES were the most relevant (43% and 50%, respectively, of their turnover).

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Turning to enterprises' net profitability, as a percentage of turnover, mention should be made to the weight of depreciation and amortisation in **agriculture and fishing**, **electricity and water** and **other services** (around 8% and 9% of their turnover). The effect of net interest was more relevant among enterprises in **electricity and water**, **construction** and **other services**, where their weight amounted to approximately 6% of their turnover in 2014 in the first case and 4% for the other sectors. Conversely, regarding the impact of income tax, **manufacturing** and **trade** seem to have been the sectors where this component was less significant (around 1% of their turnover), as opposed to **electricity and water** (3%). Nevertheless, **electricity and water** was the economic activity sector with the highest net profitability: nearly 11% of its turnover corresponded to net income for the year, a weight that was 17 p.p. below the one associated with EBITDA in this sector. In **other services**, where net profitability was negative (corresponding to 2% of turnover), EBITDA was absorbed by 14 p.p. by the other net income for the year (3 p.p., associated with net income that accounted for 2% of the sector's turnover).

3.3. Financial situation

3.3.1. Financial structure

In 2014 the capital ratio of NFCs stood at 30%, i.e. 70% of the assets of enterprises were funded by debt. As in 2013, recourse to this type of financing was particularly important for **microenterprises** (with a capital ratio of 26%) and enterprises in **construction** and **electricity and water** (24% and 25% respectively).

Compared with 2010, the capital ratio of NFCs decreased by 1 p.p. (Chart 11). During this period, **large enterprises** was the size class where this indicator deteriorated the most (5 p.p.), in contrast to the increase in **SMEs** (3 p.p.). In sectoral terms, this indicator deteriorated only in **other services** (6 p.p.) and **electricity and water** (a marginal decrease from 2010).

High leverage was particularly critical for 30% of NFCs in Portugal which recorded negative equity in 2014. This was the case for 32% of **microenterprises**, but only 6% of **large enterprises**. At sectoral level, **trade** and **other services** recorded the highest levels (32% and 31% respectively), while the lowest level was observed in **electricity and water** (20%).

The main sources of debt were interestbearing debt¹⁰ and trade credits, which together accounted for 73% of NFC liabilities (-1 p.p. compared with 2013). The remaining debt corresponds to other liabilities, including, for example, debt to the State, debt to shareholders/partners or other accounts payable¹¹ (Chart 12).

In terms of interest-bearing debt, bank loans¹² were particularly important, accounting for 26% of NFC liabilities (28% in 2013). Intra-group financing was the second most important component of interest-bearing debt (debt to group companies corresponded to 21% of liabilities). Debt securities and other financial debt were less relevant (7% and 4% respectively).

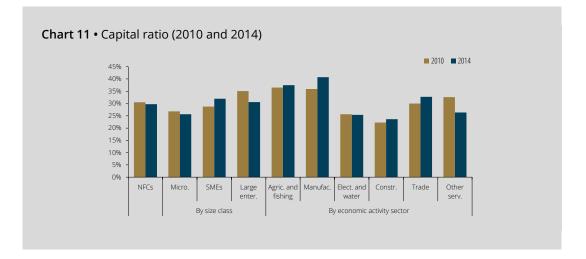
Compared with 2013, only other financial debt and debt to group companies grew (by 2% and 1% respectively) in 2014, while the other components of interest-bearing debt decreased: debt securities (9%), bank loans (8%), and trade credits (1%).

3.3.2. Financial costs and solvency

Developments in interest-bearing debt are particularly pertinent, given that 57% of NFC liabilities were associated with this type of debt in 2014.

Among total NFCs, interest expenses decreased by 7% in 2014, from 2013 (Table 5).

Preliminary data from the Central Balance Sheet Database point to the decrease in interest expenses extending into the first half of 2015.



By size class, in 2014 microenterprises and large enterprises decreased by 14% and 8% respectively. In **SMEs**, interest expenses dropped by 1%, from 2013.

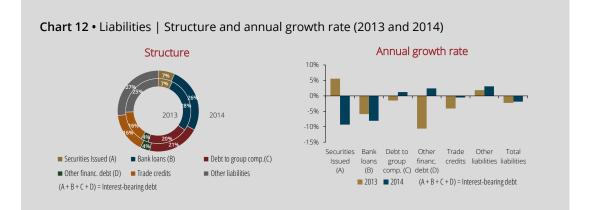
By economic activity sector, **construction** recorded the largest decrease in interest expenses (18%), followed by **manufacturing** (9%), **trade** (8%) and **other services** (5%). The combination of these and EBITDA evolutions resulted in a broadly-based decrease in financial pressure on NFCs (measured by the weight of interest in EBITDA) from 30% in 2013 to 28% in 2014.

Table 5 • Annual growth rate of interest expenses and financial pressure(2013 and 2014)

		Annual growth rate of interest expenses			pressure enses/EBITDA)
		2013	2014	2013	2014
Total		-6.4%	-6.7%	29.9%	27.7%
	Microenterprises	-12.6%	-13.6%	77.1%	56.2%
By size class	SMEs	-13.4%	-1.2%	28.9%	24.3%
61035	Large enterprises	4.6%	-8.1%	23.6%	25.2%
	Agriculture and fishing	-5.8%	0.5%	25.9%	21.3%
	Manufacturing	-5.6%	-8.5%	19.5%	17.2%
By economic activity	Electricity and wa- ter	4.5%	0.1%	28.6%	27.5%
sector	Construction	-15.3%	-17.7%	99.4%	60.0%
	Trade	-15.8%	-8.1%	22.2%	16.3%
	Other services	-5.4%	-5.4%	32.1%	36.6%

Note: Darker areas show the most significant figures by size class and economic activity sector.

If the indicator of financial pressure (interest expenses/EBITDA) may be used to assess the capacity of enterprises to generate EBITDA in order to pay interest, the literature suggests that its opposite may also be analysed (using the interest coverage ratio (ICR), calculated as EBITDA/interest expenses). By analysing this indicator, it is possible to characterise enterprises taking into account different solvency levels.¹³



This analysis only took into account enterprises that had actually paid interest, as the ratio cannot be calculated without this component. The set of enterprises considered in this analysis accounts for 49% of total NFCs, as well as 89% of their total liabilities and 97% of interest-bearing debt (securities issued, bank loans, debt to group companies and other financial debt).

Consequently, for this subset, the share of liabilities corresponding to enterprises which were not generating enough EBITDA to cover interest expenses amounted to 32% in 2014. Around 46% of total liabilities corresponded to enterprises with EBITDA levels at least three times the amount of interest expenses (Chart 13). By size class, **microenterprises** had the largest share of liabilities associated with enterprises which did not generate enough EBITDA to cover interest expenses (53%). By contrast, in **large enterprises** as a whole, 22% of liabilities were associated with enterprises which were not able to pay interest expenses.

In construction, other services and agriculture and fishing 46%, 41% and 32% of liabilities, respectively, were associated with enterprises with interest coverage ratios below 1. In turn, in electricity and water, 84% of the liabilities of interest-bearing enterprises were associated with enterprises generating an EBITDA that was at least twice the amount of interest expenses. Evolution-wise the increase observed since 2010 in the share of liabilities associated with enterprises with an interest coverage ratio below 1 was interrupted in 2013 (Chart 14). This stemmed from developments in the operating income of NFCs and a downward trend in interest expenses. The share of liabilities associated with enterprises with an interest coverage ratio below 1 has actually been offset by developments in the share of enterprises with a ratio of or above 3.

In 2010 the share of liabilities of enterprises associated with an interest coverage ratio of or above 3 amounted to 57%, while 25% of total liabilities were associated with enterprises with an indicator below 1. Nevertheless, the differential between these shares narrowed by 18 p.p. between 2010 and 2014 (32 p.p. in 2010, standing at 14 p.p. in 2014).

The available evidence supports this view, when taking into account the number of enterprises according to their interest coverage ratio. In 2014 the share of enterprises generating enough EBITDA to cover at least three times the amount of interest expenses amounted to 57%. This corresponds to a differential of 23 p.p. compared with enterprises which did not generate enough EBITDA to cover interest expenses (Chart 15). 26

Chart 13 • Share of liabilities held by enterprises based on their interest coverage ratio | By size class and economic activity sector (2014)

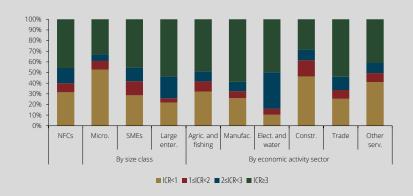


Chart 14 • Share of liabilities held by enterprises based on their interest coverage ratio (2010 to 2014)

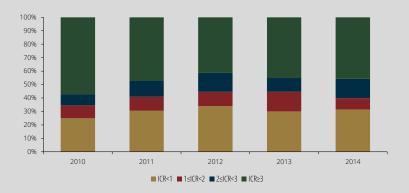
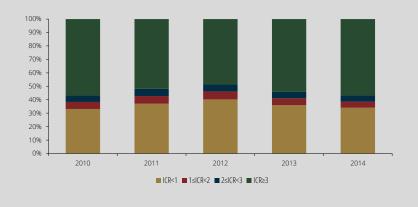


Chart 15 • Number of enterprises based on their interest coverage ratio (2010 to 2014)



Box 2 | Bank loans¹⁴

According to information from Banco de Portugal's Central Credit Register, loans granted by resident credit institutions (CIs)¹⁵ to NFCs have decreased in the past few years, accounting, at the end of June 2015, for only 77% of the figure observed at the end of 2010 (Chart 16).

During the same period, the quality of credit granted to enterprises deteriorated. At the end of June 2015, the non-performing loans ratio amounted to 16.3%, compared with 4.8% at the end of 2010.

Focusing the analysis on the most recent period, loans granted to non-financial corporations by the resident financial sector recorded a slightly negative change in the first half of 2015, compared with the end of 2014.

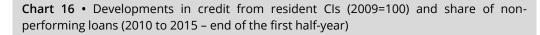
At the end of the first half of 2015, half of the loans were associated with **SMEs** (50%), while **micro-enterprises** held 35% and **large enterprises** 15% (Chart 17). This distribution is similar to that of 2010.

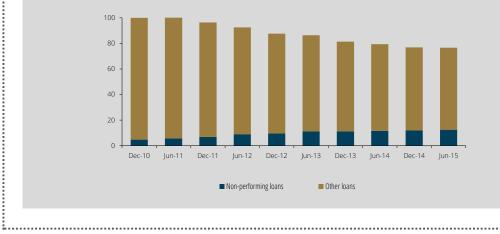
At sectoral level, **other services** held the largest share of loans granted by the financial sector at the end of the first half of 2015 (41%), followed by **construction** and **manufacturing** (18% and 17% respectively). Compared with the end of 2010, the share of **construction** fell by 5 p.p., offset by an increase in the shares of the other sectors, in particular **manufacturing** (2 p.p.).

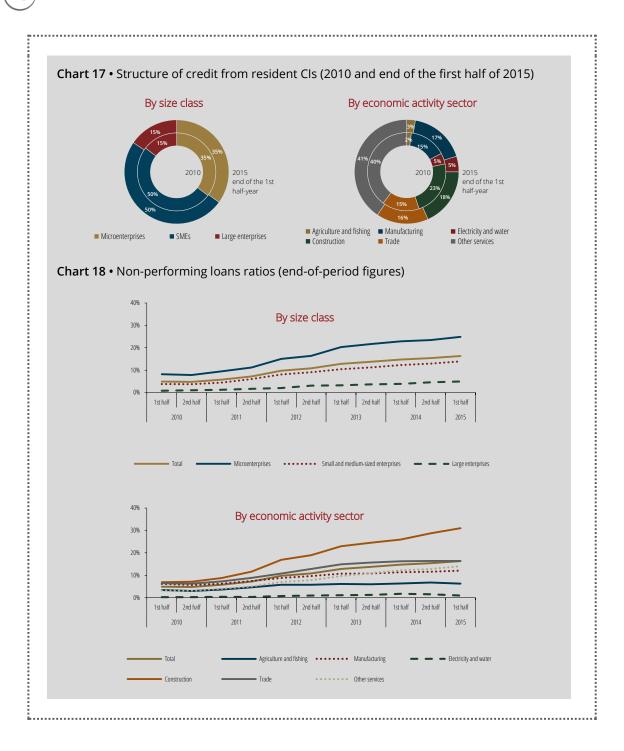
The non-performing loans ratio¹⁶ of NFCs continued to follow a growth path in the first half of 2015 (0.9 p.p., compared with the end of 2014), with negative developments across all size classes and most economic activity sectors (Chart 18).

Compared with the end of 2014, by size class, the largest increase was posted by **microenterprises** (1.4 p.p.), with a non-performing loans ratio of 24.9% at the end of the first half of 2015. The ratio grew by 0.9 p.p. (to 13.9%) in **SMEs**, and by 0.4 p.p. in **large enterprises** (to 5.0%). In 2010 **microenterprises** recorded a non-performing loans ratio of 7.8% (compared with 3.7% for **SMEs** and 1.0% for **large enterprises**).

In sectoral terms, **construction** continued to have the highest non-performing loans ratio (31.0%), followed by **trade** (16.4%) and **other services** (14.1%). In 2010 these sectors had recorded non-performing loans ratios of 7.1%, 6.3% and 3.1% respectively. The non-performing loans ratio of **electricity and water** continued to be the lowest (1.0%, compared with 0.3% in 2010), improving in the first half of 2015 (0.5 p.p.), similarly to **agriculture and fishing**, with a non-performing loans ratio of 6.3% at the end of the first half of 2015 (3.0% in 2010).







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Trade credit financing accounted for 16% of NFC liabilities in 2014, similarly to 2013.

However, in net terms, the sector did not obtain financing through this means. In fact, enterprises financed their customers by more than they obtained in financing from suppliers. In fact, the balance of accounts payable and accounts receivable, weighted by turnover, remained negative in 2014 (3%) (Chart 19).

This balance was negative across all size classes, in particular **SMEs** (6%).

Large enterprises and microenterprises had negative net trade credit financing equivalent to around 1% of their turnover.

By economic activity sector, only **agriculture and fishing** (3%) and **trade** (1%) obtained net trade credit financing. In the other sectors, credit obtained from suppliers was lower than credit granted to customers, particularly in **construction** (-14%), where this indicator showed some stability in 2014, having departed from a deteriorating trend up to 2013.



Chart 19 • Net trade credit financing | As a percentage of turnover (2010 to 2014)

Note: Net trade credit financing was calculated as the difference between accounts payable (net of advances) and accounts receivable (net of advances and adjustments).



4. Analysis of the export sector

In 2014 the export sector accounted for 6% of the number of enterprises, 25% of the number of employees and 37% of turnover of NFCs in Portugal (Chart 20). These shares registered an upward trend in the 2006-14 period.

The export sector comprises enterprises for which the external market has greater relevance. Hence, every year this sector includes enterprises where:

- at least 50% of turnover from exports of goods and services; or
- at least 10% of turnover from exports of goods and services where these exceed €150,000.

Since the criteria used in the definition of the export sector result in a certain degree of volatility in this characterisation, it is important to also assess the set of enterprises which, while partially operating in the external market, do not comply with these requirements.

In the 2006-14 period, the export sector comprised, on average, 40% of total exporting enterprises. Of these, 30% obtained at least half of their turnover from exports of goods and services (criterion 1). For the remaining enterprises, at least 10% of turnover originated each year from exports of goods and services, when these exceeded $\leq 150,000$ (criterion 2) (Chart 21).

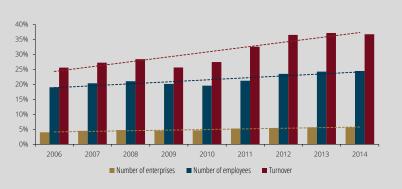
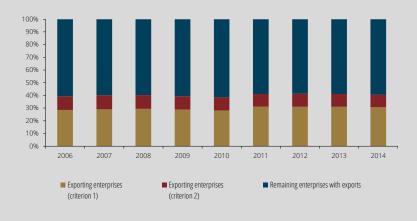


Chart 20 • Share of the export sector in total NFCs (2006 to 2014)







4.1. Export sector dynamics

Over one-fifth of total exporting enterprises identified for each year could be considered to be exporting enterprises over the entire 2006-14 period. A very significant share of Portuguese exports was associated with a small and stable set of enterprises. This set of enterprises accounted for two-thirds of the export sector's volume of exports.

During the period under review, most exporting enterprises (62%), whether or not included in the export sector, remained in the same category the following year (Chart 22).

Only 6% of enterprises in the export sector ceased exporting the following year, with this share increasing to 17% for the remaining exporting enterprises. However, the share of enterprises withdrawing from the external market because they have ceased their activity is the same for both cases (1% and 2% respectively). A total of 4% of enterprises with exports integrated the export sector each year strengthening their relationship with the external market, given that in the previous year they were a part of the remaining exporting enterprises.

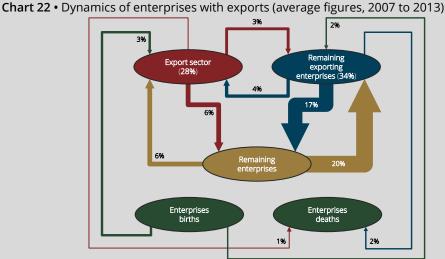
Each year, around 6% of enterprises went from not exporting to directly belonging to the export sector. In addition to these, each year there is an average of 20% of enterprises with exports that did not export the previous year.

Developments in NFC exports show that, on average, the most significant contribution was made by the set of enterprises that were a part of the export sector for two consecutive years. In 2014 this contribution amounted to 4 p.p., resulting in a rate of change in NFC exports of 4% (Chart 23). However, the contribution of new exporting enterprises and enterprises which ceased exporting each year is still very significant. This contribution was, in fact, higher than that of enterprises in the export sector, in absolute terms, in 2013 and 2014. Nevertheless, both in 2014 and 2013, the net contribution associated with the volatility in total enterprises was virtually nil (-0.4 p.p. and 0.7 p.p. respectively).

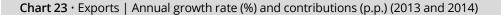
Consequently, although the export sector comprises a set of enterprises which grant some volatility and dynamics, available evidence indicates that one of its main features is the existence of a relatively stable set of enterprises, despite the contribution of the remaining exporting enterprises to the volume of NFC exports.

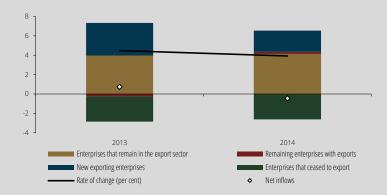
Since 2012, around 5% of new enterprises each given year have directly integrated the export sector (around 3% of enterprises with exports), an increase from the 2006-11 period. In addition, in 2014, 3% more new enterprises exported (corresponding to around 2% of total enterprises with exports) (Chart 24).

The larger share of new exporting enterprises is largely associated with enterprises where exports account for more than 50% of their turnover, as well as with a higher relative share of the remaining enterprises with exports in total NFCs, which started their activity in every year of the 2006-14 period. Considering both sets of enterprises, their share in total new NFCs in 2014 amounts to approximately 9%, around 4 p.p. above the figure for 2006.



Note: Due to the use of a one-year timeframe in the analysis shown in Chart 22, the dynamics of enterprises with exports recorded in the 2006-14 period can only be assessed in the 2007-13 period (in order to weigh the situation of enterprises in the year before and the year following the period under review). The shares were calculated on the basis of the set of enterprises with exports. This means that in each given year there are enterprises which are no longer included in this set, resulting in a sum of shares above 100%.





Note: For the purposes of this analysis, enterprises that remain in the export sector are those exporting enterprises which meet the necessary conditions to be a part of the export sector over two consecutive years. Remaining enterprises with exports are those which, although exporting, do not meet the export sector's criterion. New exporting enterprises include enterprises which started their activity that year and which export, as well as enterprises which began exporting that year (irrespective of whether they are included in the export sector). Enterprises that ceased to export are those which, having exported in a given year (whether included or not in the export sector), do not export the following year. Net inflow is the difference between the contributions of new exporting enterprises and enterprises that ceased to export.

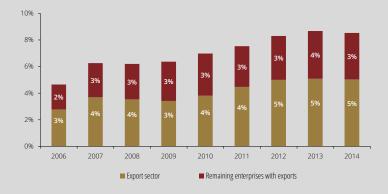


Chart 24 · Enterprises with exports | Share in the total number of new enterprises (2006 to 2014)

4.2. Geographical relevance of the export sector

Breaking down the weight of the export sector by economic activity sector shows that, in certain sectors, the weight of exporting enterprises has been higher than the average weight of these enterprises in total NFCs, more specifically in manufacturing, mining and quarrying and transportation and storage (Chart 25).

As for geographical location, the weight of exporting enterprises (taking into account number of enterprises, number of employees and turnover) is more relevant in the Aveiro, Braga and Viana do Castelo districts (Figure 2). Viseu, Porto and Leiria also stand out, considering the importance of exporting enterprises in the activities of these districts, on the basis of the indicators analysed.

In fact, in the 2006-14 period, the export sector was, on average, responsible for more than 30% of the number of employees in Aveiro, Braga and Viana do Castelo (41% of the number of employees in the first case). In turn, the weight of exporting enterprises in these districts stood between 7% and 8%.

Regarding Viseu, Porto and Leiria, the number of employees associated with exporting enterprises accounted for 26% to 27% of total NFC employees in these districts (5%, 6% and 7% of enterprises respectively).

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Overall, when considering all enterprises in Aveiro, Braga, Viana do Castelo, Viseu, Porto and Leiria (within the Minho, Douro and Beira Litoral regions), the weight of activities associated with mining and quarrying, manufacturing and transportation and storage stands out when compared with the remaining geographical locations.

When focusing only on private non-financial corporations¹⁷ with activities associated with agriculture and fishing, manufacturing and other services (i.e. excluding construction and electricity and water), the distinction is even clearer. Around 37% of enterprises in these regions were associated with mining and quarrying, manufacturing and transportation and storage (around 22% in the remaining districts). These activities accounted for 77% of turnover of enterprises in these districts (52% in the remaining districts) and 68% of the number of employees (around 31% in the remaining districts) (Chart 26).

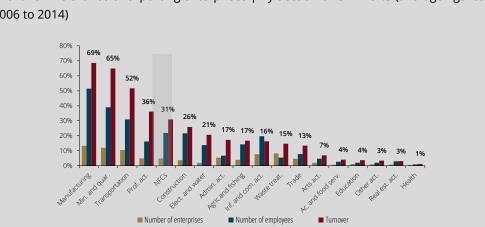
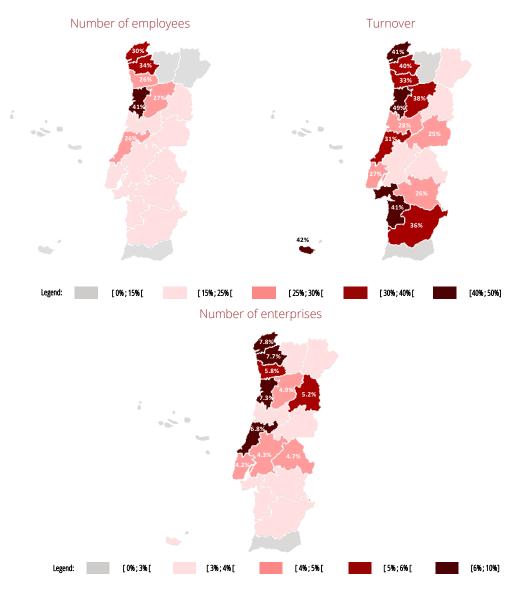
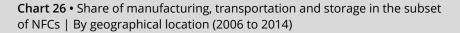
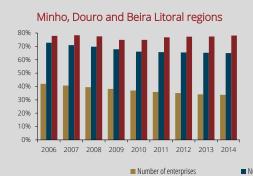


Chart 25 · Relevance of exporting enterprises | By Section of CAE-Rev.3 (average figures, 2006 to 2014)

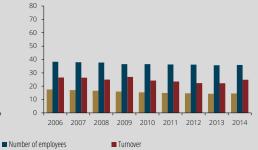
Figure 2 • Relevance of exporting enterprises | By geographical location (average figures, 2006 to 2014)











Note: Only private non-financial corporations with activities associated with Sections A, B, C, H, I, J, L, M, N, P, Q, R and S of CAE-Rev.3 were considered in this analysis, specifically activities associated with **agriculture and fishing**, **manufacturing** and **other services**.



The importance of these activities for the Portuguese corporate landscape in the locations under review has been particularly relevant in terms of the number of employees. In the 2006-14 period, the share of employees associated with these activities in the Minho, Douro and Beira Litoral regions was 37 p.p. higher than that of the remaining districts (a differential of 25 p.p. and 16 p.p. when considering turnover and number of enterprises respectively).

When considering the number of enterprises, however, the differential decreased by 3 p.p. between 2006 and 2014, as a result of a larger decline in the share of enterprises associated with activities in **mining and quarrying**, **manufacturing** and **transportation and storage** in the districts in the Minho, Douro and Beira Litoral regions (-8 p.p., compared with -5 p.p. in the remaining districts). A similar trend was observed when considering the number of employees. Similarly, while the share of turnover associated with the activities of enterprises in the remaining districts increased by 2 p.p., it grew by only 0.3 p.p. in the Minho, Douro and Beira Litoral regions, with the differential decreasing when considering this indicator.

To sum up, on the basis of the data shown, it may be concluded that the export sector is more important for certain economic activities. In turn, in terms of the geographical location of their enterprises, these activities are more relevant for the Minho, Douro and Beira Litoral regions, irrespective of the indicator used, making a particularly important contribution in terms of number of employees. These activities (and the export sector as a whole) are therefore particularly important for employment in the regions under analysis.



Notes

1. The NFC sector is one of the economy's five institutional sectors. The institutional sectorisation of economic agents is carried out in accordance with the 2010 European System of National and Regional Accounts (ESA 2010), approved by Regulation (EU) No 549/2013 of the European Parliament and of the Council of 21 May 2013. ESA 2010 is a harmonised benchmark on the compilation methodology and a deadline for release of the national accounts of EU countries, including statistics under Banco de Portugal's responsibility. The series under review (2010-15) is based on the ESA 2010 delimitation. Based on this national accounts regulation, sole proprietors are included in the households' institutional sector. Hence, all data on the NFC sector throughout this document exclude sole proprietors (in Portugal these account for around two-thirds of enterprises, but only 5% of the respective turnover).

2. The Central Balance Sheet Database is a database with economic and financial information on NFCs in Portugal. Information is based on annual accounting data reported within the scope of *Informação Empresarial Simplificada* – IES (Simplified Corporate Information) and quarterly accounting data reported by enterprises through the quarterly survey of non-financial corporations. Annual data cover nearly all NFCs and quarterly data cover around 4,000 enterprises, representing 50% of turnover in the sector. For further details on the activities of the Central Balance Sheet Database, see *Supplements to the Statistical Bulletin* 1/2008 – *Simplified reporting: inclusion of the Simplified Corporate Information in the Statistics on Non-Financial Corporations from the Central Balance Sheet Database*, and 2/2013 – *Statistics on non-financial corporations of the Central Balance Sheet Database: Methodological notes*, as well as the Central Balance Sheet Study |19 – *Sector Tables and Enterprise and Sector Tables: Methodological Notes*. Long Time Series 1995-2013 of November 2014.

3. For the sake of simplicity, this study refers to 'enterprise' and 'non-financial corporation' (NFC) interchangeably when referring to NFCs as a whole, as defined in Note 1.

4. Central Balance Sheet Database statistics are published in Banco de Portugal's *Statistical Bulletin* (Chapters A and G) and in Sector Tables, both available on Banco de Portugal's website and BP*stat* | Statistics Online.

5. A definition of enterprise maturity used in this study is detailed in the Annex.

6. For more information on economic developments in Portugal, please refer to the *Economic Bulletin*, published on a quarterly basis and available at www.bportugal.pt

7. The 'operating expenses' aggregate is calculated from the sum of the cost of goods sold and materials consumed (CoGS), supplies and external services (SES) and employee expenses.

8. EBITDA means earnings before interest, taxes, depreciation and amortisation.

9. Return on equity is calculated as the ratio of net income to equity and measures return on capital employed.

10. Interest-bearing debt refers to all liabilities with payable interest. A more detailed definition is presented in the Annex.

11. The analysis excludes liability components considered eminently related to accounting procedures, such as deferred expenses and provisions. Thus, 'Other liabilities' includes debt to the State and other public entities, debt to shareholders/partners (non-interest-bearing) and other current liabilities and accounts payable.

12. Box 2 / Bank loans provides additional information on this source of funding.

13. A similar analysis is presented in the study by the International Monetary Fund (IMF) – Global Financial Stability Report, of October 2015.

14. The Central Credit Register is a database managed by Banco de Portugal, which gathers information provided by participating entities (resident institutions) regarding credit granted. For more information, please refer to Banco de Portugal Booklet No 5, *Central de Responsabilidades de Crédito* (Portuguese version only).

15. These include banks, savings banks and mutual agricultural credit banks (generically called 'banks' in this study), as well as factoring companies, credit-purchase financing companies and financial leasing companies. Over 95% of credit granted by resident credit institutions to NFCs in 2015 came from banks.

16. The non-performing loans ratio is based on information on credit granted by resident CIs in Banco de Portugal's Central Credit Register by calculating the ratio of the amount of credit overdue to total credit obtained. Credit is deemed to be overdue when the respective repayments are not paid on the due payment dates. Credit customers may default as regards principal and/or interest and other expenditure. Credit is deemed to be overdue, in the case of principal, once the maximum period of 30 days after maturity has elapsed without settlement; and, in the case of interest and other expenses, once the due date for settlement has passed.

17. For the purposes of analysing the geographical relevance of the export sector, the subset of private NFCs was taken into account, i.e. excluding the set of the public sector entities which are part of the NFC institutional sector.





Methodological summary

Methodological summary

Capital ratio: Ratio of equity to total assets.

Economic activity sector: The enterprises classified in Sections K – *Financial and insurance activities;* O – *Public administration and defence; Compulsory social security,* T – *Activities of households as employers; Undifferentiated goods- and services-producing activities of households for own use* and U – *Activities of extraterritorial organisations and bodies* in CAE-Rev.3, were excluded from this analysis as they do not fall within the NFC institutional sector.

Financial pressure: Ratio of interest expenses to EBITDA.

Interest-bearing debt: Interest-bearing debt refers to all liabilities with payable interest, obtained through debt securities issues, loans granted by credit institutions and financial companies, intra-group financing and other loans.

Interest coverage ratio: Ratio of EBITDA to interest expenses, calculated, on an individual basis, only in situations where the enterprise recorded interest expenses.

Maturity: Enterprise maturity refers to the age of the enterprise as at the analysis reference date. Four maturity classes are considered: up to five years; from five to (but not including) ten years; from ten to (but not including) 20 years; and more than 20 years.

Return on equity: Ratio of net income for the year to equity. As both items (numerator and denominator) may be positive or negative, at individual level, the indicator is only calculated in situations where equity is positive.

Size of the enterprise: Enterprises were grouped into three classes: microenterprises, small and medium-sized enterprises and large enterprises. The criteria for this classification were taken from the European Commission Recommendation of 6 May 2003 concerning the definition of micro, small and mediumsized enterprises. According to this Recommendation, microenterprises are defined as enterprises which employ fewer than 10 persons and whose annual turnover and/or balance sheet total does not exceed €2 million. For the purpose of this study, small and medium-sized enterprises (SMEs) exclude microenterprises, employ fewer than 250 and more than 10 persons and have an annual turnover between €2 million and €50 million and/or an annual balance sheet total between €2 million and €43 million. Large enterprises are any enterprises which are not classified above.



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Abbreviations and acronyms

- CAE Portuguese Classification of Economic Activities
- Cls credit institutions
- CoGS cost of goods sold and materials consumed
- EBIT earnings before interest and taxes
- EBITDA earnings before interest, taxes, depreciation and amortisation
- EBT earnings before taxes
- ESA 2010 European system of national and regional accounts 2010
 - GDP gross domestic product
 - ICR interest coverage ratio
 - IES Informação Empresarial Simplificada (Simplified Corporate Information)
 - INE Instituto Nacional de Estatística (Statistics Portugal)
 - NFCs non-financial corporations
 - p.p. percentage points
 - SES supplies and external services
 - SMEs small and medium-sized enterprises (excluding microenterprises)
 - SNC Sistema de Normalização Contabilística (Accounting Standards System)



References

Banco de Portugal (2008), *Simplified reporting: inclusion of the Simplified Corporate Information in the Statistics on Non-Financial Corporations from the Central Balance Sheet Database*, Supplement 1/2008 to the Statistical Bulletin, May 2008.

http://www.bportugal.pt/en-US/Estatisticas/PublicacoesEstatisticas/Pages/SuplementosaoBoletimEstatistico.aspx

Banco de Portugal (2013), *Statistics on non-financial corporations of the Central Balance Sheet Database: Methodological notes*, Supplement 2/2013 to the Statistical Bulletin, October 2013. http://www.bportugal.pt/en-US/Estatisticas/PublicacoesEstatisticas/Pages/SuplementosaoBoletimEstatistico.aspx

Banco de Portugal (2014), Sectoral Analysis of non-financial corporations in Portugal 2009-2014, Central Balance Sheet Studies, No 18, November 2014.

http://www.bportugal.pt/en-US/ServicosaoPublico/CentraldeBalancos/Pages/EstudosdaCentraldeBalancos.aspx

Banco de Portugal (2014), Sector Tables and Enterprise and Sector Tables: Methodological Notes. Long Time Series 1995-2013, Central Balance Sheet Studies, No 19, November 2014. http://www.bportugal.pt/en-US/ServicosaoPublico/CentraldeBalancos/Pages/EstudosdaCentraldeBalancos.aspx

Banco de Portugal (2015), *Central de Responsabilidades de Crédito*, Banco de Portugal Booklets, No 5, April 2015 (Portuguese version only).

http://www.bportugal.pt/pt-PT/PublicacoeseIntervencoes/Banco/CadernosdoBanco/Paginas/CadernosdoBanco.aspx

Banco de Portugal (2015), Analysis of enterprises in the export sector in Portugal, Central Balance Sheet Studies, No 22, June 2015.

http://www.bportugal.pt/en-US/ServicosaoPublico/CentraldeBalancos/Pages/EstudosdaCentraldeBalancos.aspx

Banco de Portugal (2015), *Economic Bulletin*, October 2015. http://www.bportugal.pt/en-US/EstudosEconomicos/Publicacoes/BoletimEconomico.aspx

Commission Recommendation of 6 May 2003 concerning the definition of micro, small and medium-sized enterprises (2003/361/EC).

Decree-Law No 381/2007 of 14 November on the definition of the Portuguese Classification of Economic Activities, Revision 3 (CAE-Rev.3) (Portuguese version only).

International Monetary Fund (2015), Global Financial Stability Report, October 2015.

Regulation (EU) No 549/2013 of the European Parliament and of the Council of 21 May 2013 on the European system of national and regional accounts in the European Union.





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