

CBI MARKET SURVEY

The castings and forgings market in Spain

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Introduction

This CBI market survey provides exporters in developing countries (DCs) with information on some of the main developments in the castings and forgings market in Spain. The information is complementary to the information provided in the CBI market survey 'The castings and forgings market in the EU', which covers the EU in general. That survey also contains an overview and explanation of the selected products dealt with, some general remarks on the statistics used, as well as information on other available documents for this sector. It can be downloaded from <http://www.cbi.eu/marketinfo>.

1 Market description: industrial demand and production**Industrial demand**

Because no data for the demand for castings and forgings are available, this survey puts a focus on two major end-user industries that offer good opportunities for developing country (DC) exporters: the engineering and the construction industry. Since both industries use many cast and forged parts and products, the production output of both industries is a good indication for the demand for cast and forged parts in these industries.

Engineering industry

Spanish production in the engineering industry increased 4.9% per year in the period 2002-2006, to more than €37.5 billion in 2006. The large Spanish engineering industry ranked fifth in the EU, behind France and the UK, but ahead of Sweden and the Netherlands. Of the main castings and forgings consuming engineering categories, especially "engines and turbines" (+17.8% per year), "bearings, gears, gearing and driving elements" (+11.7%) and "electric motors, generators and transformers" (+8.8%) performed the best. The position of Spain in the EU was especially strong in "electric motors, generators and transformers" (2nd largest producer with 12% market share), "machine tools, woodworking machinery and welding equipment" (5th with 4% market share), "pumps and compressors" (7th with 4% market share) and "agricultural machinery" (7th with 4% market share).

Despite the world, EU, and Spanish economic growth forecasts for 2008 (+3.8%, +1.7% and +1.9% respectively) and 2009 (+3.9%, +1.8% and +1.9%), leading to a good demand for engineering products in the country, it is difficult to predict to what extent the Spanish manufacturers will benefit from this. For example, some suggest that Spain is losing productivity and hence there will be weak export growth ahead, although the Euro-area recovery will benefit exporters. On the other hand, recent figures show that, although exports decreased, production for the local market increased strongly. Please also note that, although the EU is far from running the risk of recession, the EU and Spanish economy is and will be clearly affected by the housing and credit crisis in the United States.

Construction industry

After a total growth of 15% in the period 2002-2005, the Spanish construction industry amounted to €161 billion in 2005. The industry continued to grow in 2006 and 2007, but growth came to an end in 2008. After more than a decade of rapid growth, the construction industry has seen a rapid slowdown in orders and there is already talk of a crisis. The large Spanish construction industry ranked fifth in the EU, behind Italy and France, but ahead of the Netherlands and Ireland.

Major end-users

Automotive, including industrial vehicles, accounted for the major share (56%) of domestic foundry production in 2006. Automotive was followed by valves, pumps and fittings (15%), wind power (5%, up from 3% in 2005), agricultural machinery (4%), construction and cement industry (3%), machine tools (3%), domestic appliances and electricity (both 2%), die-making (2%), and construction machinery (2%). The prospects for the wind power segment are reported to be very good, with a forecast growth of 200% until 2015. Apparently, the foundries producing for this segment have not experienced the pressure on margins until 2006, as was the case in other EU countries.

Production

The large Spanish foundry industry ranked fourth in the EU, behind Italy and France, but ahead of the UK and Poland. Nodular iron castings accounted for 47% of total production, followed by iron castings (33%) and light and ultra light castings (10%). In 2006, the medium-sized production of metal castings totalled 1.33 million tonnes, an increase of 3.9% per year since 2002, mainly because of a strong growth in nodular iron production (+14.7% per year). In 2006, the country was home to about 100 large ferrous metal foundries and about 50 non-ferrous metal foundries, which was the same as in 2002. In the same period, the average turnover per employee increased by 6.4% per year to more than €135,000 – an amount which is the fifth largest in the EU, behind Germany, France, Austria and Belgium, but ahead of the Netherlands and Finland.

The Spanish forge industry is also relatively large: it ranked fifth in the EU, behind France and the UK, but ahead of Poland and the Czech Republic. In 2006, the medium-sized production of forgings totalled 327,000 tonnes, an increase of 3% per year compared to 2002. The average output per employee grew to one of the highest in the EU (920 tonnes annually in 2006), only behind Italy and comparable to Germany.

Among the largest foundries and forges of Spain are:

- Betsaide - <http://www.betsaide.com> - forge
- Comforsa - <http://www.comforsa.com> - forge
- Fundiciones de Ódena - <http://www.funosa.com> - foundry
- Lingotes Especiales - <http://www.lingotes.com> - both casting and forging activities
- Microfusión Alfa - <http://www.microfusionalfa.com> - foundry
- Saint-Gobain Canalización - <http://www.saint-gobain-canalizacion.com> - comprises both foundry and forge activities
- ULMA Forging - <http://www.ulmaforging.com> - a manufacturer specialised in forged ASME flanges and fittings for the oil and energy industry.
- Victorio Luzuriaga Usurbil - <http://www.fagorederlan.es> - forge of Fagor Ederlan

Trends and characteristics

A major trend that influences the castings and forgings demand and production in Spain is the growing number of innovative applications of aluminium and magnesium castings. Other trends are:

- **Relocation of engineering production.** In recent years, a few engineering operations have been outsourced to low cost countries (LCCs), especially Central and Eastern European (CEE) countries. So far, outsourcing often concerns labour-intensive and series production of standard products and parts that can easily be made in LCCs.
- **Growth of electric drives production.** Considering the relatively late industrialisation of the Spanish industrial sector, as well as the ongoing modernisation initiatives and infrastructure investments to ensure compliance with EU regulations, the Spanish electric drives market is expected to show the fastest growth of all EU countries between 2006 and 2012. Local manufacturers will benefit from this trend, resulting in a continuous growing production output.
- **Electrical engineering industry needs more iron castings.** The years 2007-2009 will be marked by an increasing demand for iron castings from the electric engineering industry.

- **Still low added-value casting production in Spain.** Apparently, the country is still home to some low added-value serial production of civil engineering (iron) castings, such as manhole covers. This can be deduced from the increased competition reported from imports from China, putting Spanish production for this segment under pressure.
- **Automotive foundries continue to feel pressure.** With regard to production of iron castings for the automotive industry, the competitive pressure from imports from developing countries released somewhat in 2006. The production for this segment increased in 2006, but the Spanish foundries experienced increased pressure on margins from their automotive customers, a trend which was seen in other EU countries as well.

Opportunities and threats

The main opportunities and threats for developing country (DC) exporters are the following:

- + Growing construction output will lead to an increasing demand for castings and forgings in the next few years.
- + Light weight products and eco-friendly and energy-efficient technologies offer good opportunities for those DC exporters that are able to supply such products.
- + Spain is still home to some low added-value serial production of castings. This offers opportunities for DC foundries that can take over this kind of production.
- + Growing market for drives and transmissions stimulated local production.
- ± The growing economy is expected to drive a healthy demand for engineering products in the years to come, which could also stimulate local engineering production. On the other hand, a further shift of engineering production towards LCCs may lead to a deceleration of demand growth for castings and forgings of the Spanish engineering industry.

Refer to Section 7 of the CBI market survey covering the EU market for more information on opportunities and threats.

2 Trade channels for market entry

Trade channels

The most common trade channels for DC exporters are direct sales to end-users, trade via traditional importers, supply agents, traditional agents, or subcontracting by EU foundries or forges. Although there are several options, supplying directly to end-users has some advantages and could be one of the most interesting trade channels, because there is a larger chance of a long-lasting relationship. DC exporters should therefore put efforts into building up supplier relationships with end-users. Refer to the CBI market survey covering the EU market for a detailed explanation of relevant trade channels in this market.

Examples of potential trade partners

Some examples of (subcontractors to) OEMs in Spain are:

- AEG - <http://www.lafert.com> - electric motors
- Conjinetes de Friccion - <http://www.nb-cofrisa.com> - bearings
- Holcim - <http://www.holcim.es> - cement plants
- SKF - <http://www.skfprodind.skf.es> - bearings
- Unidad Hermetica - <http://www.electrolux.com> - refrigerator compressors

Price structure

It is very difficult to give a general idea of the price structure in this industry, as prices and margins differ to a great extent. They may depend on size of the order, length and type of distribution chain, terms of delivery, added value / finishing and materials concerned. Bearing this in mind, some rough indications of margins in the chain could be given. Agents work with margins between 3-7%, for importers this is 15–35%. The margin depends on the level of care and attention an intermediary has to give to the process. Products that do not need much extra care, like finished and ready-to-use products, such as valves, will be sold with a smaller margin than products that need extra handling or even need to be stored.

Useful sources

Some examples of available sources to find clients:

- Association of Spanish Distributors - <http://www.anged.es> – click on 'Empresas Asociadas'.
- Association of Catalan Commercial Agents - <http://www.coacb.com>
- Castings Exporters' Association of Spain - <http://www.fundigex.es> - choose the English version and click on 'Index'.
- Multiprecio - <http://www.multiprecio.com.es> - company database (only in Spanish)
- National Association of Engineering Goods Manufacturers - <http://www.sercobe.es> - choose the English version and click on 'Members'.
- Spanish Association of Agricultural Machine Manufacturers - <http://www.ansemat.org> - choose the English version and click on 'Members'.
- Spanish Association of Manufacturers of Textile Machinery - <http://www.amec.es/amtex> - choose the English version and click on 'Associations and companies'.
- Spanish Chamber of Commerce - <http://www.confespacomercio.com>
- Spanish Federation of the Foundry Associations - <http://www.feaf.es> - choose the English version and click on 'Associated companies'.
- Spanish Forging Association (SIFE) – <http://www.forjas.org> - click on 'Members' list'.
- Spanish Shipbuilders Association - <http://www.uninave.es> - choose the English version and click on 'Members'.

3 Trade: imports and exports

Imports

In 2006, Spain was a large importer of castings and forgings, ranking fifth in the EU, behind Italy and the UK, but ahead of Belgium and the Netherlands. Between 2002 and 2006, the total import value annually increased by 12% to €17.3 billion (16.1 million tonnes) in 2006. The increase in value was partly caused by the increasing prices of raw materials (refer to Section 4). The product group shares were as follows:

- Iron and steel products: 42% of total. Annual increase in import value of 17%.
- Parts of machinery, railway equipment and vehicles: 21% of total. Annual increase in import value of 9%.
- Articles of iron, steel or base metal: 16% of total. Annual increase in import value of 11%.
- Plastic and rubber products: 10% of total. Annual increase in import value of 6%.
- Light and ultra light products: 6% of total. Annual increase in import value of 7%.
- Copper and zinc products: 5% of total. Annual increase in import value of 21%.

Between 2002 and 2006, imports from DCs annually increased by 34% in value. Compared to 2002, the total share of DCs in import value increased from 7.6% to 15.6% in 2006. The DCs' shares in imports of some product groups showed better growth compared to other product groups, as can be seen below:

- Light and ultra light products: growing from 6.6% to 15.1% in value.
- Plastic and rubber products: growing from 2.6% to 5.3% in value.
- Iron and steel products: growing from 12.8% to 25.5% in value.
- Articles of iron, steel or base metal: growing from 8.4% to 15.5% in value.
- Parts of machinery, railway equipment and vehicles: growing from 2.8% to 3.6% in value.
- Copper and zinc products: growing from 2.9% to 3.7% in value.

China accounted for 40% of all imports coming from DCs, followed by Turkey (19%), Brazil (10%), Egypt (5%), India (4%), and Iran (4%). Beside the fast growing Chinese share of DC exports to Spain (+153% in the period 2002-2006), other DCs that saw a large increase of their share were Cuba, Thailand, Tunisia, Malaysia, Kazakhstan, Syria, Egypt and Colombia.

Of all intra-EU imports a small part may be re-exports, but the exact value of re-exports is unknown because Eurostat does not allow for such detailed analysis.

Exports

In 2006, Spain was a medium-sized exporter, ranking eighth in the EU, behind the Netherlands and Austria, but ahead of Sweden and the Czech Republic. The total export value of Spain showed an annual increase of 12% in the period 2002-2006, totalling €13 billion in 2006.

Exports consisted of:

- Iron and steel products, accounting for 40% of total exports (€5.2 billion). Annual increase in export value of 16%.
- Articles of iron, steel or base metal, accounting for 18% of total exports (€2.3 billion). Annual increase in export value of 8%.
- Parts of machinery, railway equipment and vehicles, accounting for 17% of total exports (€2.2 billion). Annual increase in export value of 9%.
- Plastic and rubber products, accounting for 11% of total exports (€1.4 billion). Annual increase in export value of 6%.
- Light and ultra light products, accounting for 9% of total exports (€1.2 billion). Annual increase in export value of 12%.
- Copper and zinc products, accounting for 5% of total exports (€636 million). Annual increase in export value of 21%.

Probably a small part of exports consists of re-exports to other EU countries, mainly to neighbouring countries, but the exact value of re-exports is unknown because Eurostat does not allow such a detailed analysis.

Opportunities and threats

- + Spain was the fifth largest importer of castings and forgings in the EU in 2006.
- + In 2006, Spain was a net-importer of castings and forgings, running trade deficits for iron and steel products (€7.4 billion), articles of iron, steel or base metal (€212 million), plastic and rubber products (€158 million), copper and zinc products (€55 million).
- + The total import value of all product groups increased in the period 2002-2006.
- + The DC share of total imports grew by 105% in the period 2002-2006, which was faster than in the EU on average (81%).
- + The import share of DCs was 15.6% in 2006, above the EU average (8.2%).
- ± The Chinese share of DCs' exports to Spain grew fast in the period 2002-2006 (+153%), but also some other DCs saw a large increase of their share.
- Spain ran trade surpluses for parts of machinery, railway equipment and vehicles (€30 million), light and ultra light products (€40 million).
- China accounted for 40% of all imports coming from DCs. This was a higher share than in the EU on average (39%).

Useful sources

- EU Expanding Exports Helpdesk - <http://exporthelp.europa.eu> → go to: trade statistics
- Eurostat - official statistical office of the EU - <http://epp.eurostat.ec.europa.eu>
- Understanding Eurostat: Quick guide to EasyComext - http://epp.eurostat.ec.europa.eu/newxtweb/assets/User_guide_Easy_Comext_20080117.pdf

4 Price developments

One of the major trends that affect the costs and revenues of Spanish castings and forgings production is price pressure, which results in importers/agents and OEMs as well as their suppliers continuing their search for opportunities to reduce cost prices of parts by 10-30%. This may be underlined by the fact that prices in the engineering industry increased only 8.6% in the period 2000-2005. In 2006, there was some relief of the price pressure, which can be seen from the fact that prices increased by almost 4% compared to 2005.

As in other EU countries, the industry had to deal with increasing raw material and energy prices, as well as increasing wage costs (amounting to €17.25 per man-hour in 2005, which is comparable to the wages in Eastern Germany, but much higher than the wages in Portugal and

CEE countries). Please refer to the CBI market survey covering the EU market for castings and forgings for more information on trends related to price developments.

Useful sources

- CAEF Eurofoundry - <http://www.caef-eurofoundry.org>
- European Engineering Industries Association (Orgalime) – <http://www.orgalime.org>
- Eurostat – official statistical office of the EU – <http://epp.eurostat.ec.europa.eu> - by comparing import value and volume, it is possible to get an idea of import prices.
- London Metal Exchange – <http://www.lme.co.uk>

5 Market access requirements

As a manufacturer in a developing country preparing to access Spain, you should be aware of the market access requirements of your trading partners and the Spanish government. For information on legislative and non-legislative requirements, go to 'Search CBI database' at <http://www.cbi.eu/marketinfo>, select castings and forgings sector and Spain in the category search, click on the search button and click on market access requirements.

Detailed information on packaging can be found on the ITC website on export packaging: <http://www.intracen.org/ep/packaging/packit.htm>. Information on tariffs and quota can be found at <http://exporthelp.europa.eu>.

6 Doing business

Information on doing business, such as approaching potential business partners, building up a relationship, drawing up an offer, handling the contract (methods of payment, and terms of delivery) and cultural differences can be found in CBI's export manuals 'Export Planner', 'Your image builder' and 'Exporting to the EU'. These can be downloaded from <http://www.cbi.eu/marketinfo> - go to search publications. Beside a number of sources already mentioned in previous sections, other useful sources that contain market information and information on doing business in Spain are:

- Subcontratación - <http://www.bilbaoexhibitioncentre.com> - annual trade fair in September, Bilbao.
- Aluminium / Expomoldes / Fundicion - <http://www.metalspain.com> - biannual trade fair in June, Zaragoza, uneven years.
- Association of Electronic Material Manufacturers - <http://www.afme.es>
- Association for Purchasing and Supply Management - <http://www.aerce.org>
- Association of Spanish Construction Contractors - <http://www.seopan.es>
- Revista de Metalurgia - <http://www.cenim.csic.es> - metalworking magazine
- Confemetal - <http://www.confemetal.es/principal.htm> - metalworking magazine

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