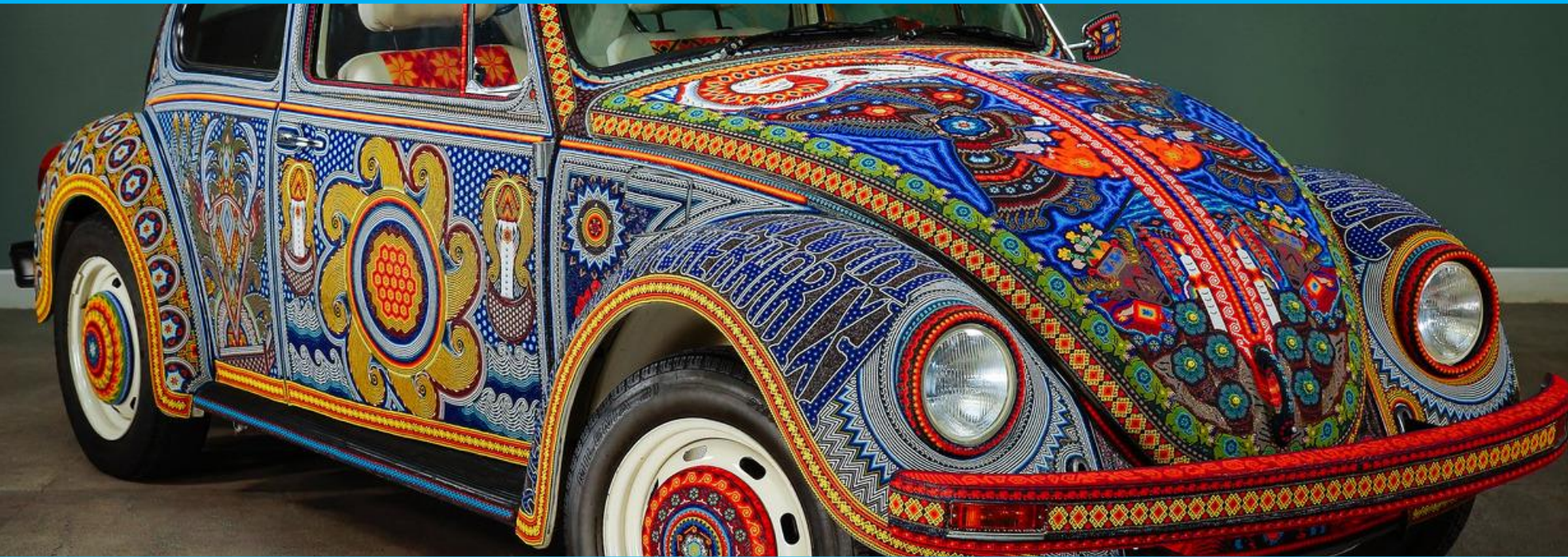


Manufacturing in Mexico



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Why Mexico?



- High-productivity and low-cost center.
- **Productivity has increased more than 50% in the last decade.**¹
- Reshoring of American Companies from China to Mexico.²
- Relocation could reduce their operations costs between 5 and 20%.



Sources:

The Mexican Automotive Industry: Leading the World. Negocios ProMexico April 2015.

1 Boston Consulting Group and the National Bank of Foreign Trade.

2 National Bank of Foreign Trade.



- 11 Free Trade Agreements.
- The **North American Free Trade Agreement (NAFTA)** is the most important.
- NAFTA increased imports in the USA from Mexico from 5% to 40%.

Effects of Free Trade Agreements in the Manufacturing Sector.



45.9% ← FDI → 42.7%



82.9% ← Exports → 5.7%

- After the implementation of NAFTA manufacturing has increased in Mexico.
 - Exports have increased to the USA.
 - FDI from places like Europe has increased significantly.
- Important NAFTA factors:
 - Eliminates tariffs among the three countries.
 - Decreases costs of imports.

Sources:

Reporte sobre comercio e inversion. Inversión y comercio ProMexico. April-June 2015.

Global Manufacturing Competitiveness Ranking.



Current Competitiveness Index

Country	2016		2013 Rank	Trend
	Rank	Index score		
China	1	100.0	1	=
USA	2	99.5	3	▲
Germany	3	93.9	2	▼
Japan	4	80.4	10	▲
South Korea	5	76.7	5	=
United Kingdom	6	75.8	15	▲
Taiwan	7	72.9	6	▼
Mexico	8	69.5	12	▲
Canada	9	68.7	7	▼
Singapore	10	68.4	9	▼

Competitiveness Index in Five Years

Country	Rank	Index score
USA	1	100.0
China	2	93.5
Germany	3	90.8
Japan	4	78.0
India	5	77.5
South Korea	6	77.0
Mexico	7	75.9
United Kingdom	8	73.8
Taiwan	9	72.1
Canada	10	68.1

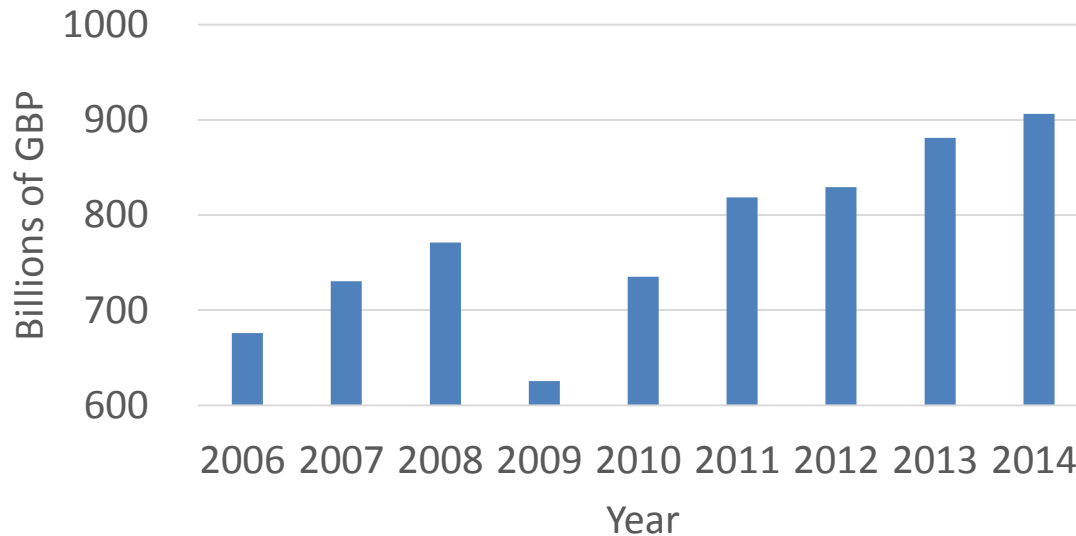
Sources:

1. Deloitte and US Council on Competitiveness: 2016 Global Manufacturing Competitiveness Index.

Mexico's Gross Domestic Product.

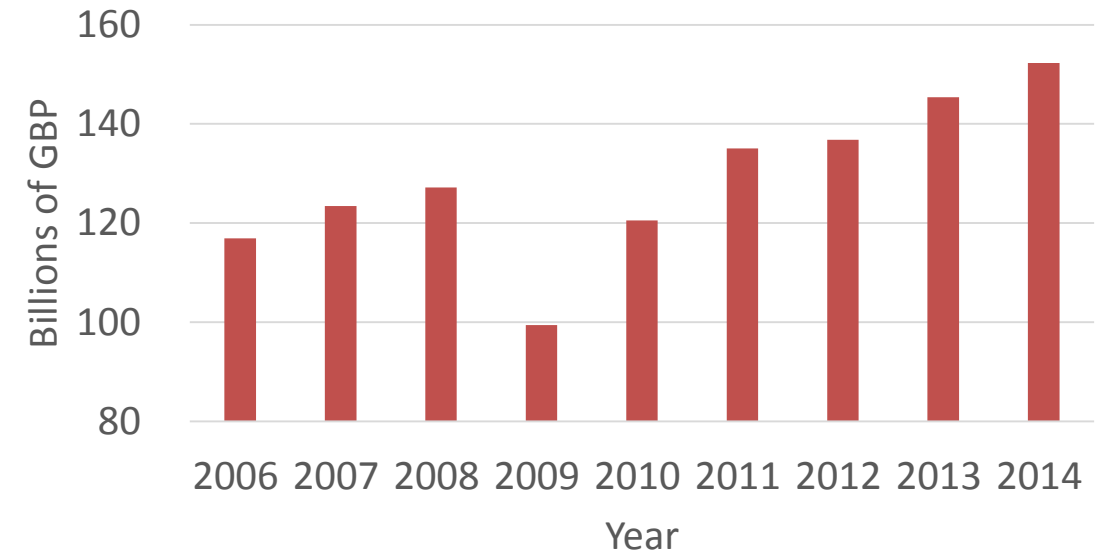


GDP of Mexico (Billions GBP)



- **Mexico has an estimated GDP of 902 Billions GBP.**

Manufacturing % of GDP (Billions GBP)



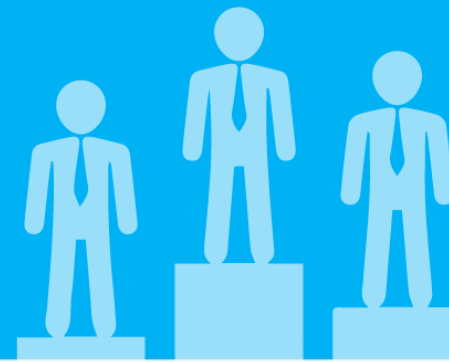
- **Manufacturing represents 17% of Mexico's GDP.**

Sources:

INEGI: Producto Interno Bruto (PIB) – trimestral. <http://www.inegi.org.mx/est/contenidos/proyectos/cn/pibt/default.aspx>

The World Bank: Manufacturing, value added (% of GDP). <http://data.worldbank.org/indicator/NV.IND.MANF.ZS>

GDP Ranking.



- Mexico has the **15th highest GDP in the world.**
- But the **GDP per capita is ranked in the 66th position.**
- In GDP per capita Mexico can be compared to countries like Brazil, Turkey, Costa Rica and Malaysia.

Country	GDP		GDP per capita	
	(USD bn)	Ranking	(USD)	Ranking
USA	17419	1	54597	10
China	10380	2	7589	80
Japan	4616	3	36332	27
Germany	3860	4	47590	18
UK	2945	5	45653	19
France	2847	6	44538	20
Brazil	2353	7	11604	61
Italy	2148	8	35823	28
India	2050	9	1627	145
Russia	1857	10	12926	58
Canada	1789	11	50398	15
Australia	1444	12	61219	5
South Korea	1417	13	28101	31
Spain	1407	14	30278	29
Mexico	1283	15	10715	66
Indonesia	889	16	3534	118
Netherlands	866	17	51373	12
Turkey	806	18	10482	68
Saudi Arabia	752	19	24454	34
Switzerland	712	20	87475	4

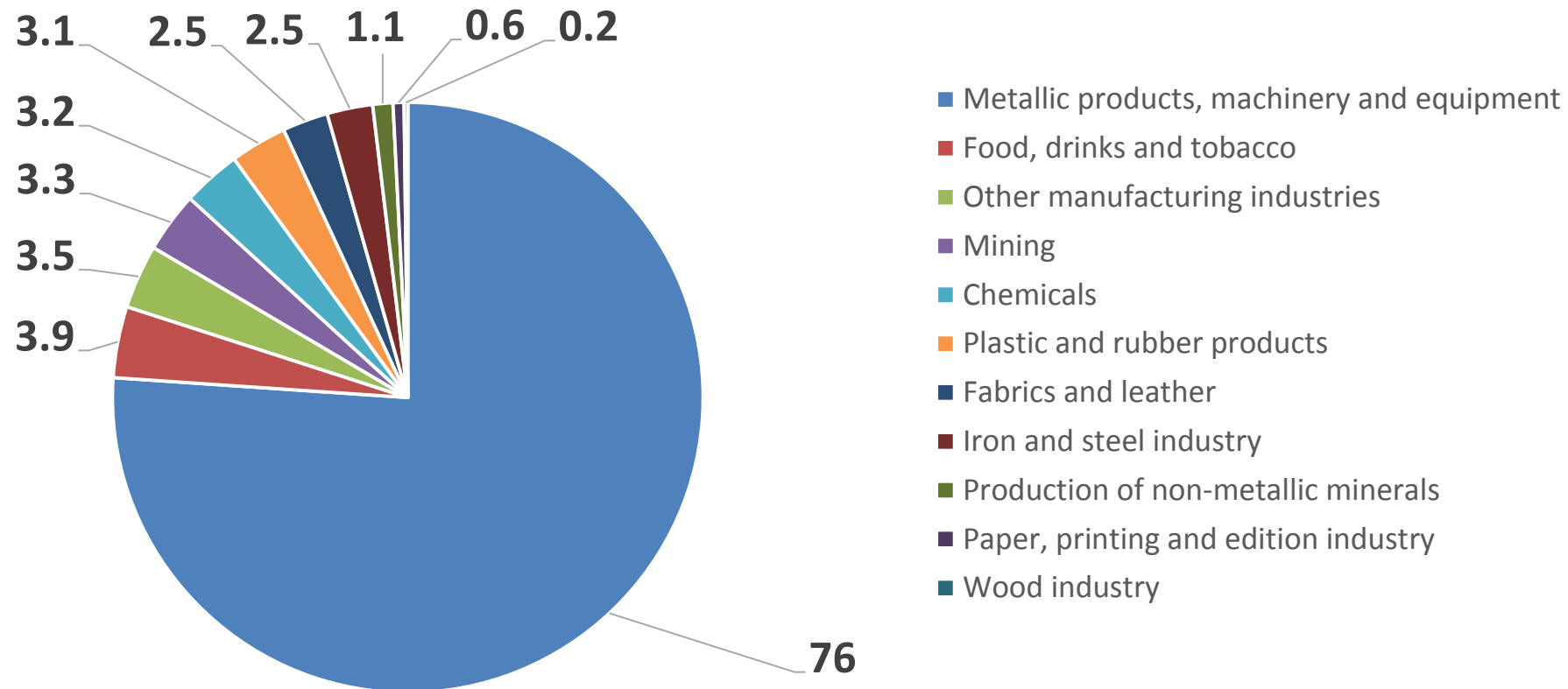
Sources:

1. IMF, World Economic Outlook, April 2015.

Important Manufacturing sectors.



Percent of exportations of the different manufacturing sectors.



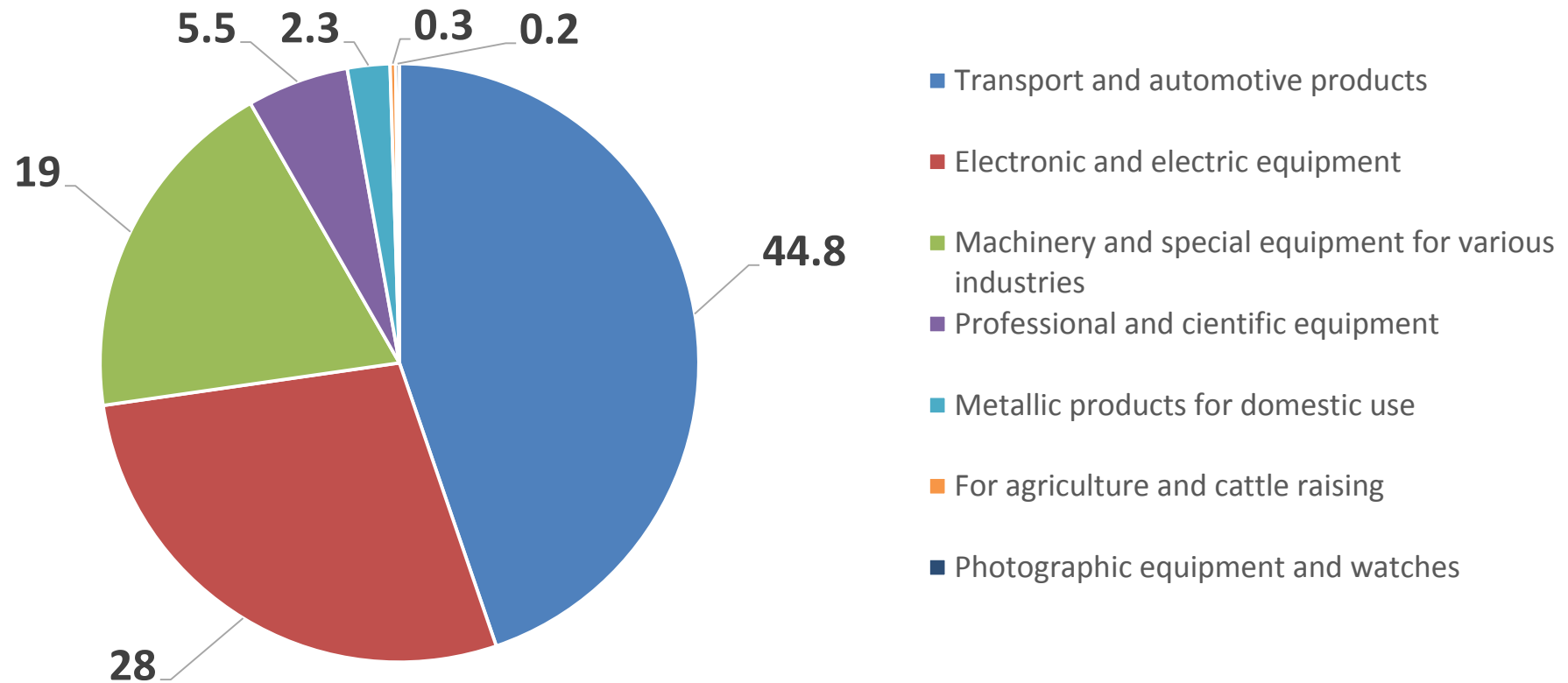
Sources:

Reporte sobre comercio e inversion. Inversión y comercio ProMexico. April-June 2015.

Metallic products, machinery and equipment manufacturing.



Exportation of the Metallic products, machinery and equipment sector.



Sources:

Reporte sobre comercio e inversion. Inversión y comercio ProMexico. April-June 2015.

The Automotive Industry in Mexico.



7th

Largest producer
of vehicles in general ⁵
(3.39 million vehicles)⁵

4th

Exporter of light vehicles
(2.64 million vehicles)⁹



**Participation of the automotive
and auto parts industries:**

3% of national GDP⁷

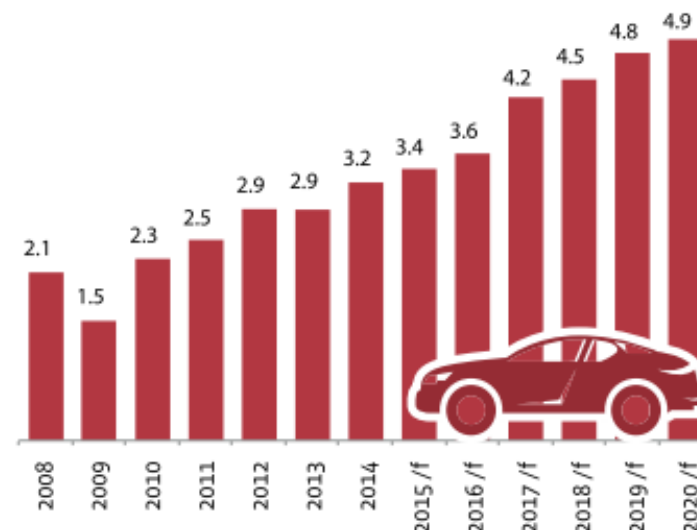
17% of manufacturing GDP⁷

20% of Foreign Direct Investment

32% of total exports⁹

LIGHT VEHICLE PRODUCTION IN MEXICO (MILLIONS OF UNITS)

In 2014, **3.2 million units**, were produced, reaching the highest level ever. Forecasts indicate that by 2020, **4.9 million units** will be produced.



f / forecasts for the year
Sources: AMIA (2008-2014), Global Insight (2015-2020)

Sources:

The Mexican Automotive Industry: Leading the World. Negocios ProMexico April 2015.

The Automotive Industry in Mexico.



THE INDUSTRY IN MEXICO

Some of the light vehicles manufactured in Mexico



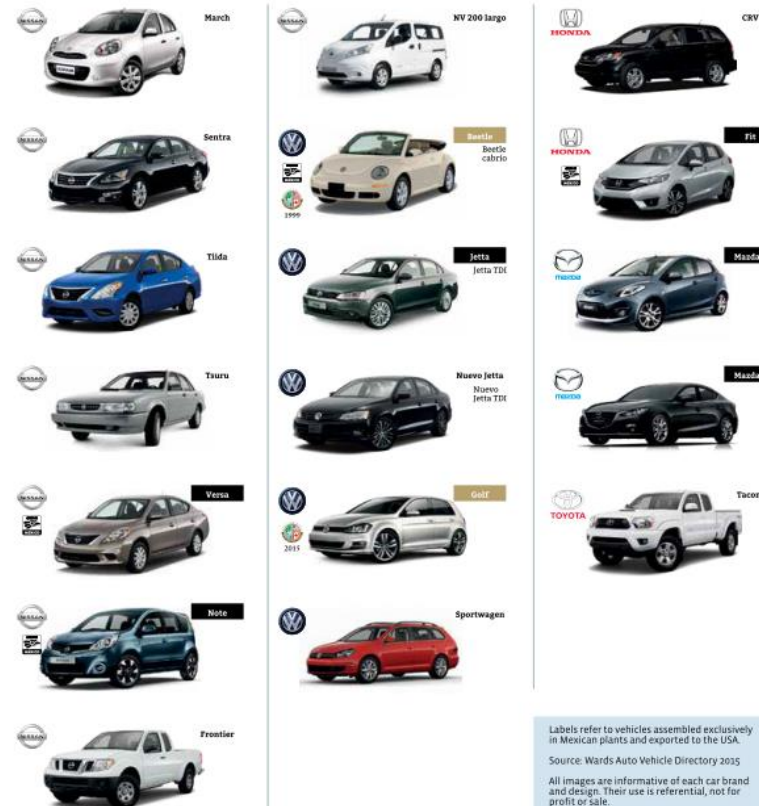
Production
Models exclusively
made in Mexico



Production
Luxury vehicles
made in Mexico



Renowned
Cars and trucks of the year, by
North American Car & Truck of the Year



Labels refer to vehicles assembled exclusively
in Mexican plants and exported to the USA.
Source: Wards Auto Vehicle Directory 2015
All images are informative of each car brand
and design. Their use is referential, not for
profit or sale.

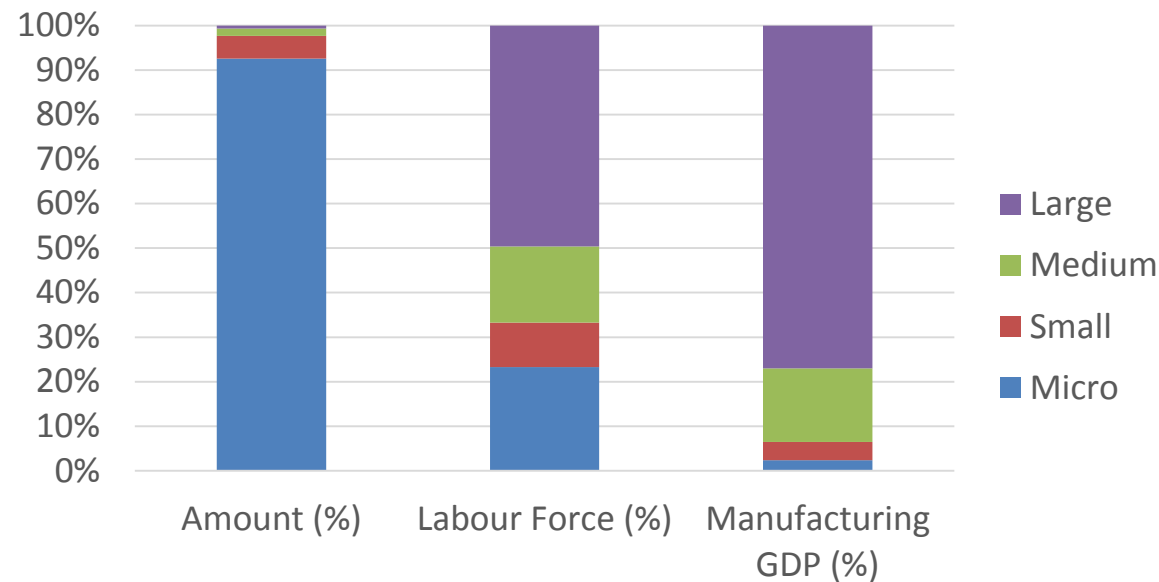
Sources:

The Mexican Automotive Industry: Leading
the World. Negocios ProMexico April 2015.

Manufacturing SMEs in Mexico.



Comparison between SMEs and Large Manufacturing Enterprises in Mexico.



- SMEs represent 99% of the enterprises in Mexico.
- Employ 50% of the labour force.
- They produce 23% of the Manufacturing GDP.

Source:

INEGI. Micro, pequeña, mediana y gran empresa. Estratificación de los establecimientos. Censos económicos 2009.

http://www.inegi.org.mx/prod_serv/contenidos/espanol/bvinegi/productos/censos/economicos/2009/comercio/micro_peque_media/Mono_Micro_peque_mediana.pdf

Manufacturing SMEs in Mexico.



- Almost 450,000 Manufacturing **SMEs** in Mexico.
- The most important areas are:
 - **Textile and footwear.**
 - **Food Industry.**
 - **Metallic Products.**
- **Disadvantages for SMEs in Mexico:**
 - Lack of easy access to financial credits.
 - Unable to invest in equipment or machinery.
 - Difficulties to export their products.
 - Lack of certification.
 - Unable to pay attractive salaries.



Sources:

The Mexican Textile Industry: Weaving its future with creativity. Negocios ProMexico Junio 2012.

El Financiero: Necesario Elevar exportaciones de Pymes, afirma ProMexico. Site: <http://www.elfinanciero.com.mx/economia/necesario-elevar-exportaciones-de-pymes-afirma-promexico.html>

Gross domestic expenditure on research and development (GERD).

- Mexico has the 2nd lowest GERD in percent of GDP from the 34 countries of the OECD.
- The average GERD in percent of GDP among all the OECD countries has been of 2.7 in the last 10 years.

GERD as % of GDP										
Country	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013
Israel	3.92	4.09	4.19	4.48	4.39	4.15	3.96	4.10	4.25	4.21
Japan	3.13	3.31	3.41	3.46	3.47	3.36	3.25	3.38	3.34	3.47
Finland	3.31	3.33	3.34	3.35	3.55	3.75	3.73	3.64	3.42	3.31
Sweden	3.39	3.39	3.50	3.26	3.50	3.42	3.22	3.22	3.28	3.30
Germany	2.42	2.43	2.46	2.45	2.60	2.73	2.72	2.80	2.88	2.85
United States	2.49	2.51	2.55	2.63	2.77	2.82	2.74	2.76	2.70	2.73
Mexico	0.39	0.40	0.37	0.37	0.40	0.43	0.45	0.43	0.43	0.50

Sources:

OECD.stat: Main Technology and Science Indicators.

https://stats.oecd.org/Index.aspx?DataSetCode=MSTI_PUB

Future perspective.

- Besides the Automotive Industry, Mexico is trying to become a key element in the **Aerospace** sector.
- The **reshoring** of American companies and the increase of **R&D** are also in the government's plans.



Sources:

Mexican Aerospace Industry: A booming innovative driver. Negocios ProMexico Junio 2015.

Challenges and conclusions.

- **Challenges:**
 - **Exploit Manufacturing potential in different sectors.**
 - **Integrative solutions for SMEs** (credit, exportations, certifications, etc.).
 - Investment in **R&D**



- **Conclusions:**
 - **Manufacturing Competitiveness drivers** can improve.
 - Government and institutions can **improve the context for SMEs.**
 - Increasing the investment in **R&D** is fundamental.

Sources:

Mexico manufacturing surge hides low-wage drag on economy. Reuters. June 20

Acknowledgements.

