

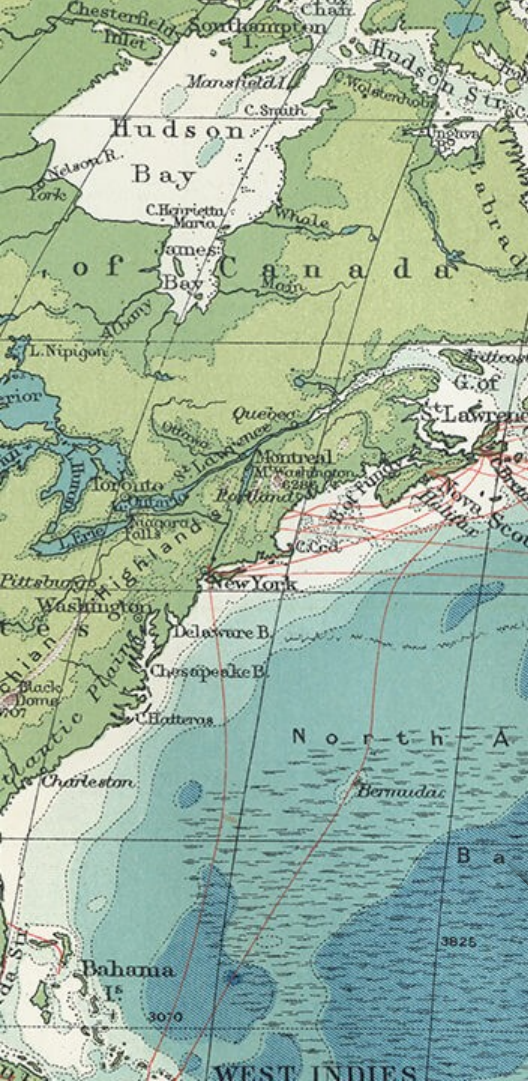
RELATION BETWEEN COMPANIES AND GROSS DOMESTIC PRODUCT IN SPAIN FROM 2008 TO 2017



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1.

DESCRIPTION

Let's start with the story

A compass rose with eight points, indicating North, South, East, and West. The rose is white with a blue outline and is positioned below the text.

DESCRIPTION



OBJECTIVE

The purpose of this project is to collect, develop and analyze statistical data, and construct several suitable representations about this data, explaining a history, what is happened. We want to explain a little part of the business world in Spain along the crisis.

PROBLEMATIC SUCCESS

Spanish financial crisis (2008 – 2014)



A historical map of North America and Europe. Red lines represent shipping routes. In North America, routes connect the Atlantic coast (New York, Boston) to the Gulf of St. Lawrence and the Great Lakes (Montreal, Toronto). In Europe, routes connect the British Isles (London, Liverpool) to the Mediterranean (Genoa, Barcelona) and the Atlantic (Lisbon, Bordeaux). The map also shows the Tropic of Cancer and various geographical features like Hudson Bay and the Iguazu Plateau.

2.

FIRST STEP

How should we do it?





Steps for communicating map information



- Consider what the real-world distribution of the phenomenon might look like
- Determine the purpose of the map and its intended audience
- Collect data appropriate for the map's purpose
- Design and construct the map
- Determine whether users find the map useful and informative.

3. DATA

How should we do have?



STUDY ZONE





“

*Lambert azimuthal
equal-area
projection*



PROJECTION

Lambert azimuthal equal-area projection

- Preserves the area of individual polygons while simultaneously maintaining a true sense of direction from the center.
- The general pattern of distortion is radial
- shape is minimally distorted, less than 2 per cent, angular
- Distortion is more significant
- Small shapes are compressed radially from the center and
- elongated perpendicularly

DATASETS



Companies by Region and main activity

- 1) Extractive industries
- 2) Building
- 3) Trade, transport and catering
- 4) Information and communication
- 5) Financial and insurance activities
- 6) Professional and administrative activities
- 7) House selling activities
- 8) Public administration and defense
- 9) Artistic activities

Gross Domestic Product per capita

It is a measure of a country's economic output that accounts for its number of people. It divides the country's gross domestic product by its total population.

That makes it the best measurement of a country's standard of living. It tells you how prosperous a country feels to each of its citizens.

Data source: Spanish Statistical Office

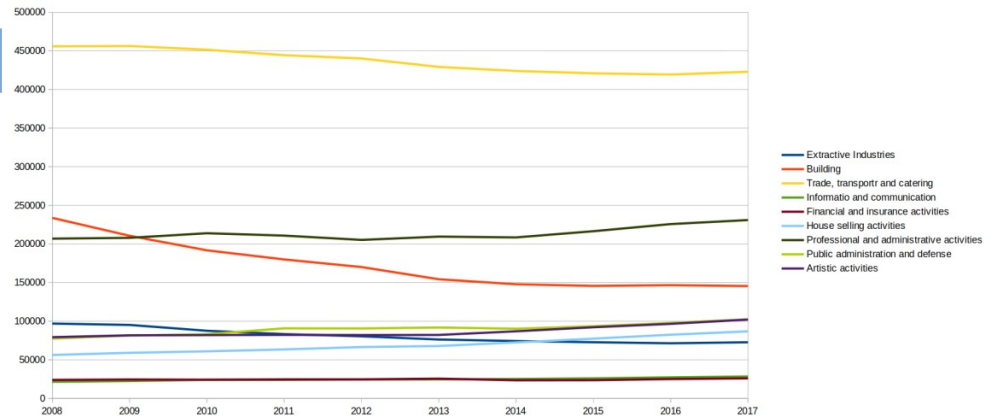
Companies



We can group them



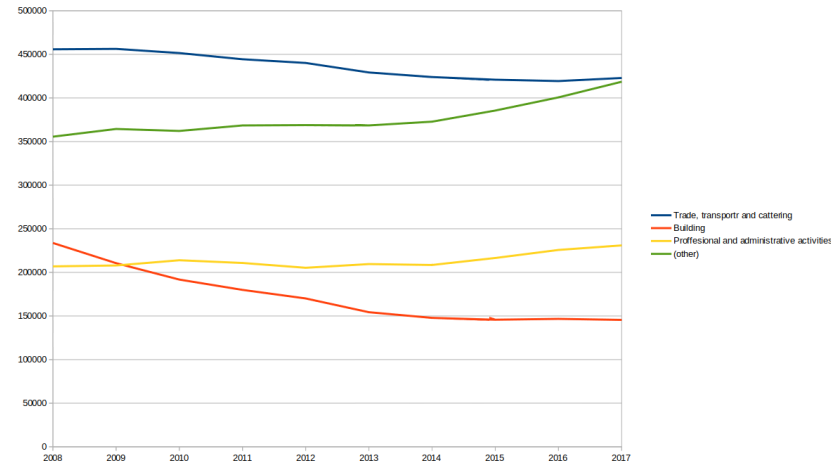
CATALUÑA		2008
Extractive industries		96926
Building		233730
Trade, transport and catering		455808
Information and communication		21554
Financial and insurance activities		24002
House selling activities		56274
Professional and administrative activities		206896
Public administration and defense		77518
Artistic activities		79332



We can group them



CATALUÑA 2008	
Trade, transport and catering	455808
Building	233730
Professional and administrative activities	206896
Other	355606



REPRESENTATION METHODS



FOR STATIC MAP

Star or spider graph. The multivariate ray-glyph or star is constructed by extending rays from an interior circle, with the lengths of the rays made proportional to values associated to each variable.

FOR DYNAMIC MAP

Pie chart. These variables can be depicted using the pie chart, as a circle divided into sectors representing the proportion of each variable.

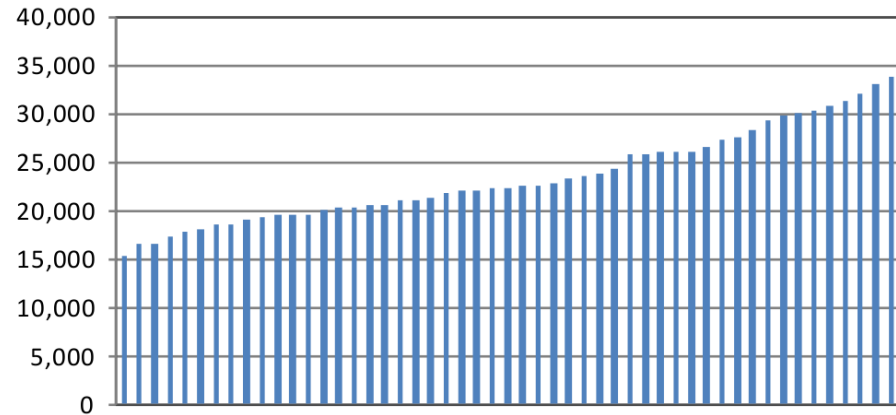
Gross Domestic Product



We can classify them



	2008	2012	2017
ANDALUCÍA	18,625	16,666	18,470
ARAGÓN	26,650	24,267	27,403
ASTURIAS, PRINCIPADO DE	22,336	20,005	22,046
BALEARS, ILLES	25,717	23,224	25,772
CANARIAS	21,186	19,017	20,425
CANTABRIA	22,850	20,559	22,513
CASTILLA Y LEÓN	22,421	21,150	23,555
CASTILLA - LA MANCHA	19,697	17,864	19,681
CATALUÑA	28,332	26,041	29,936
COMUNITAT VALENCIANA	21,878	19,288	22,055
EXTREMADURA	16,633	15,313	17,262
GALICIA	21,226	19,533	22,497
MADRID, COMUNIDAD DE	32,155	30,455	33,809
MURCIA, REGIÓN DE	20,354	18,168	20,585
NAVARRA, COMUNIDAD FORAL DE	30,128	27,485	30,914
PAÍS VASCO	31,243	29,275	33,088
RIOJA, LA	25,986	23,917	26,044



VALUE	DIFFERENCE	VALUE	DIFFERENCE
15313		22497	76
16633	1320	22513	16
16666	33	22850	337
17262	596	23224	374
17864	602	23555	331
18168	304	23917	362
18470	302	24267	350
18625	155	25717	1450
19017	392	25772	55
19288	271	25986	214
19533	245	26041	55
19681	148	26044	3
19697	16	26650	606
20005	308	27403	753
20354	349	27485	82
20425	71	28332	847
20559	134	29275	943
20585	26	29936	661
21150	565	30128	192
21186	36	30455	327
21226	40	30914	459
21878	652	31243	329
22046	168	32155	912
22055	9	33088	933
22336	281	33809	721
22421	85		

We can classify them



- Minimum to 17000
- 17000 to 22000
- 22000 to 25000
- 25000 to 28000
- 28000 to maximum

REPRESENTATION METHODS



FOR STATIC MAP

Doughnut graph

(Pie graph with an area of the center cut out)

In this symbol we do not use proportional values.

FOR DYNAMIC MAP

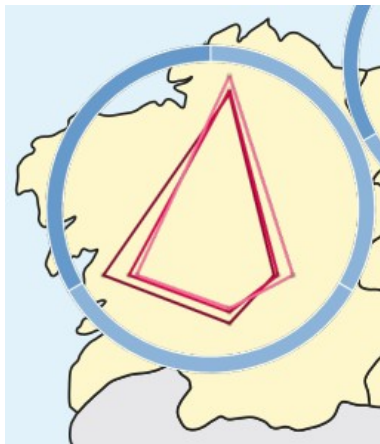
Choropleth map.

Areas are shaded or patterned in proportion to the measurement of the statistical variable being displayed on the map.

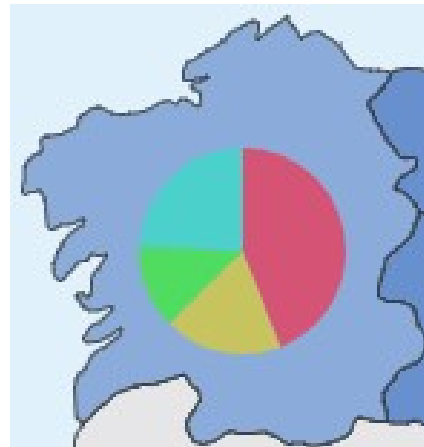
REPRESENTATION METHODS



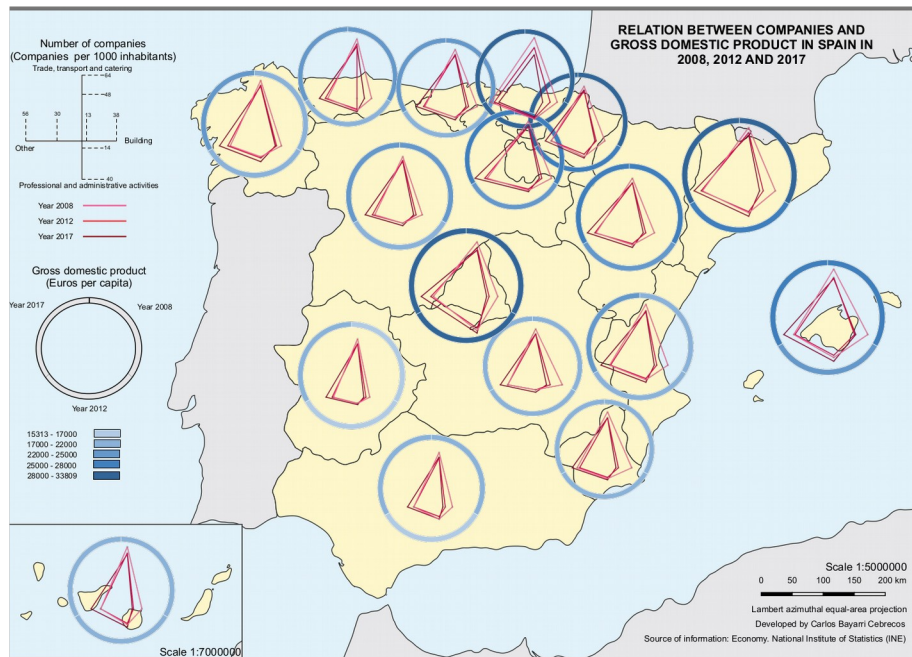
FOR STATIC MAP



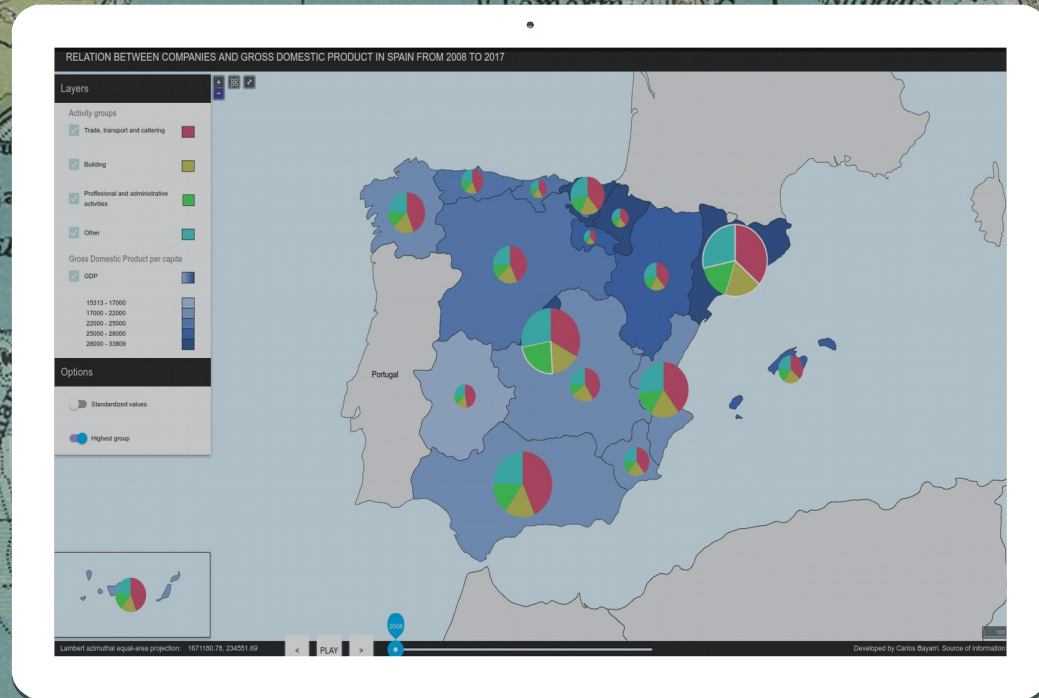
FOR DYNAMIC MAP

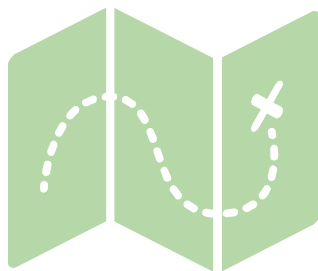


STATIC MAP



DYNAMIC MAP





THANKS!

Any questions?

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bayarricebrecos@hotmail.com