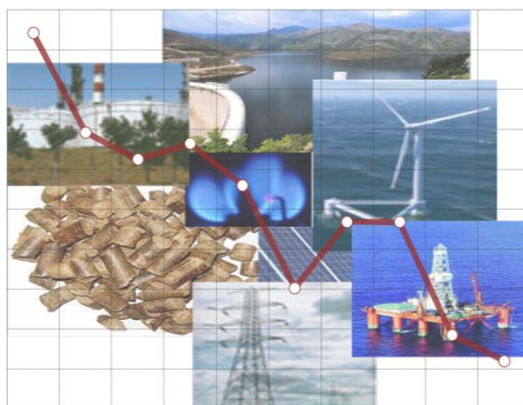


## ***PORTUGAL***

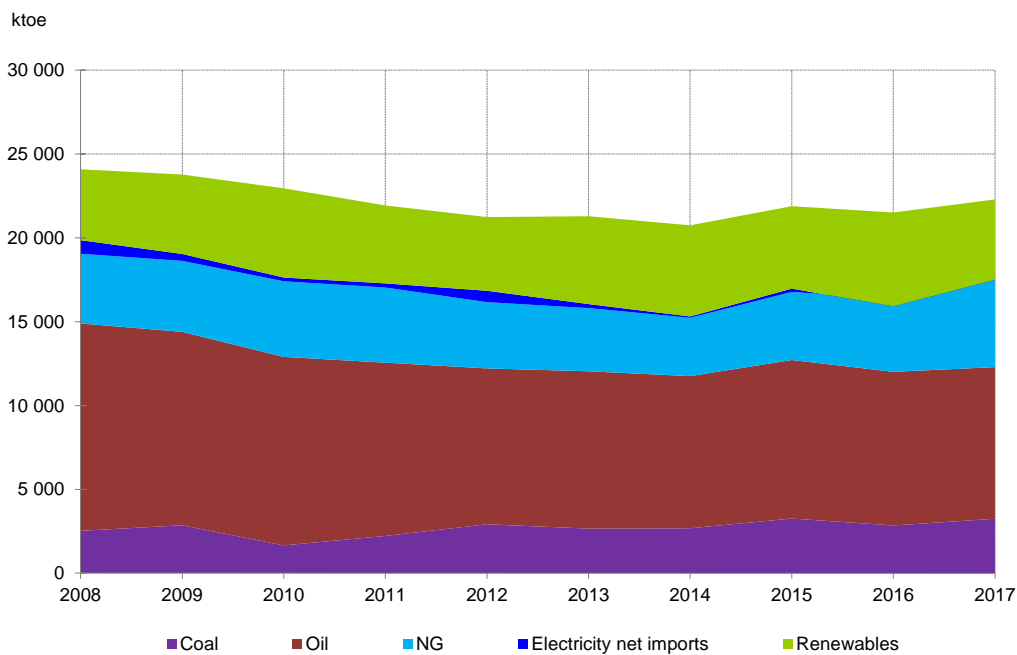
### **KEY ENERGY STATISTICS**



March 2019

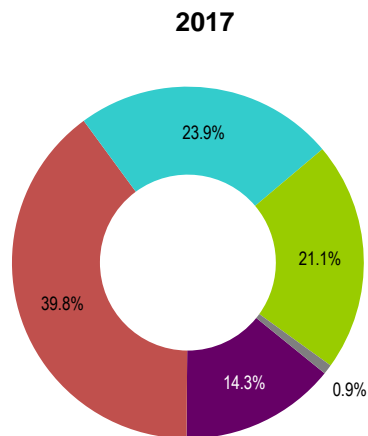
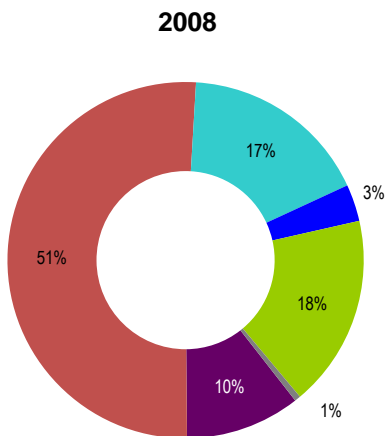


# TOTAL PRIMARY ENERGY CONSUMPTION (ktoe)

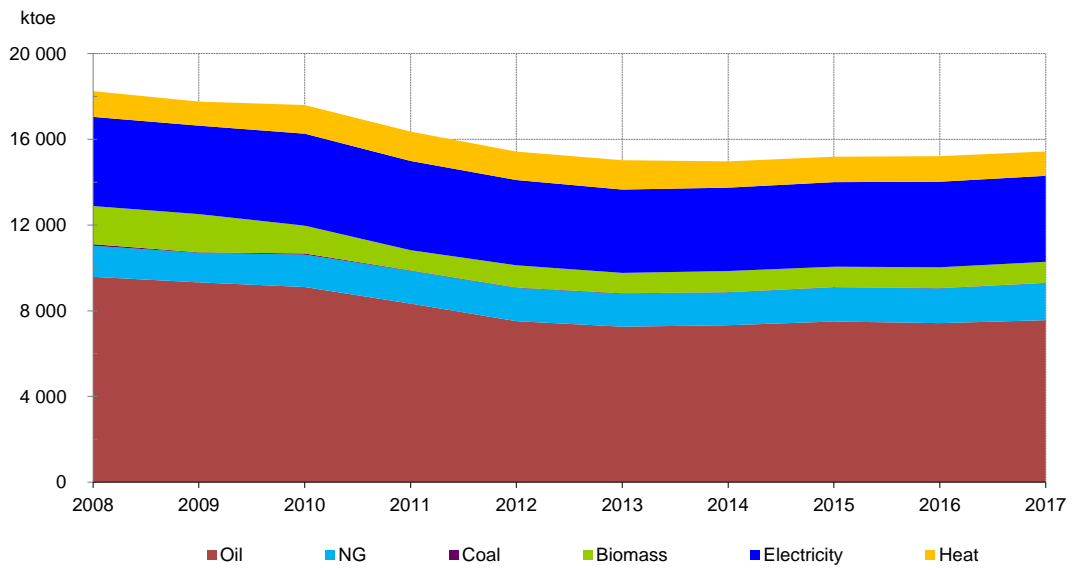


	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017
Coal	2 526	2 858	1 657	2 222	2 915	2 659	2 679	3 259	2 848	3 247
Oil	12 365	11 533	11 241	10 332	9 297	9 381	9 071	9 452	9 161	9 041
NG	4 157	4 233	4 507	4 483	3 950	3 769	3 480	4 064	4 340	5 438
Electricity net imports	811	411	226	242	679	239	78	195	-437	-231
Renewables	4 225	4 737	5 321	4 647	4 395	5 238	5 435	4 916	5 596	4 792
O –Other non renewable	131	139	150	183	246	177	178	148	186	203
<b>Total</b>	<b>24 215</b>	<b>23 911</b>	<b>23 101</b>	<b>22 110</b>	<b>21 482</b>	<b>21 461</b>	<b>20 920</b>	<b>22 033</b>	<b>21 694</b>	<b>22 490</b>

O –Other non renewable

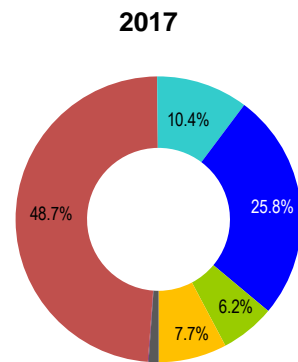
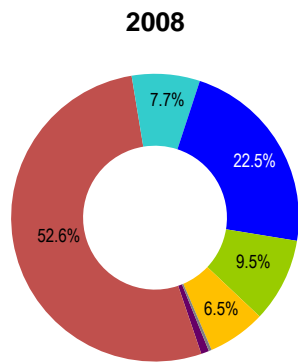


# TOTAL FINAL CONSUMPTION (ktoe)

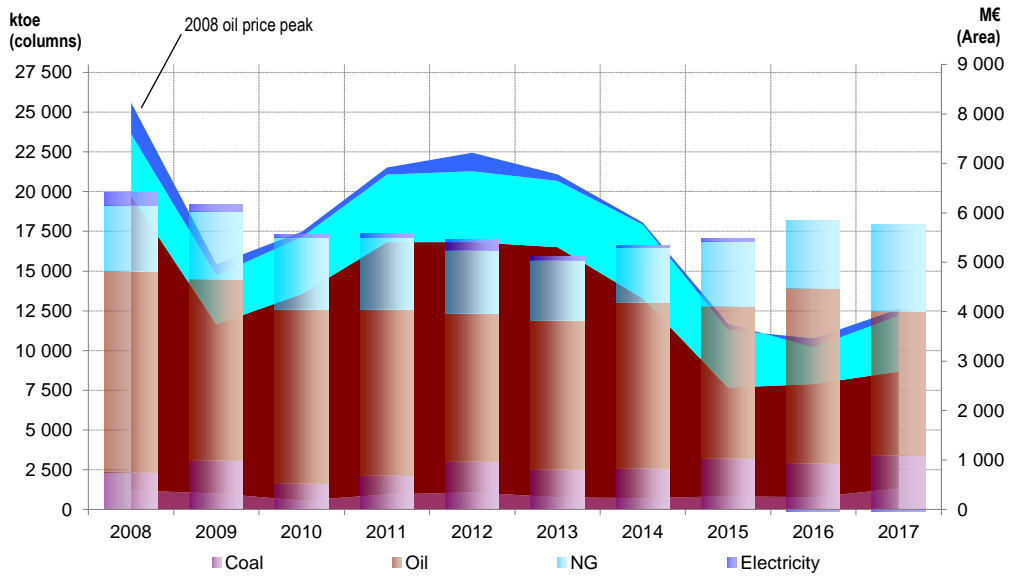


	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017
Oil	9 582	9 324	9 106	8 334	7 513	7 257	7 324	7 498	7 422	7 561
NG	1 451	1 378	1 514	1 525	1 551	1 530	1 530	1 590	1 618	1 729
Coal	71	22	50	20	19	25	12	14	14	11
Biomass	1 781	1 785	1 301	947	1 037	955	987	954	974	983
Electricity	4 159	4 126	4 289	4 162	3 977	3 888	3 889	3 944	3 990	4 011
Heat	1 202	1 123	1 336	1 370	1 326	1 369	1 226	1 186	1 192	1 136
O	65	74	102	135	216	142	163	135	166	181
<b>Total</b>	<b>18 311</b>	<b>17 832</b>	<b>17 699</b>	<b>16 494</b>	<b>15 640</b>	<b>15 166</b>	<b>15 131</b>	<b>15 321</b>	<b>15 377</b>	<b>15 613</b>

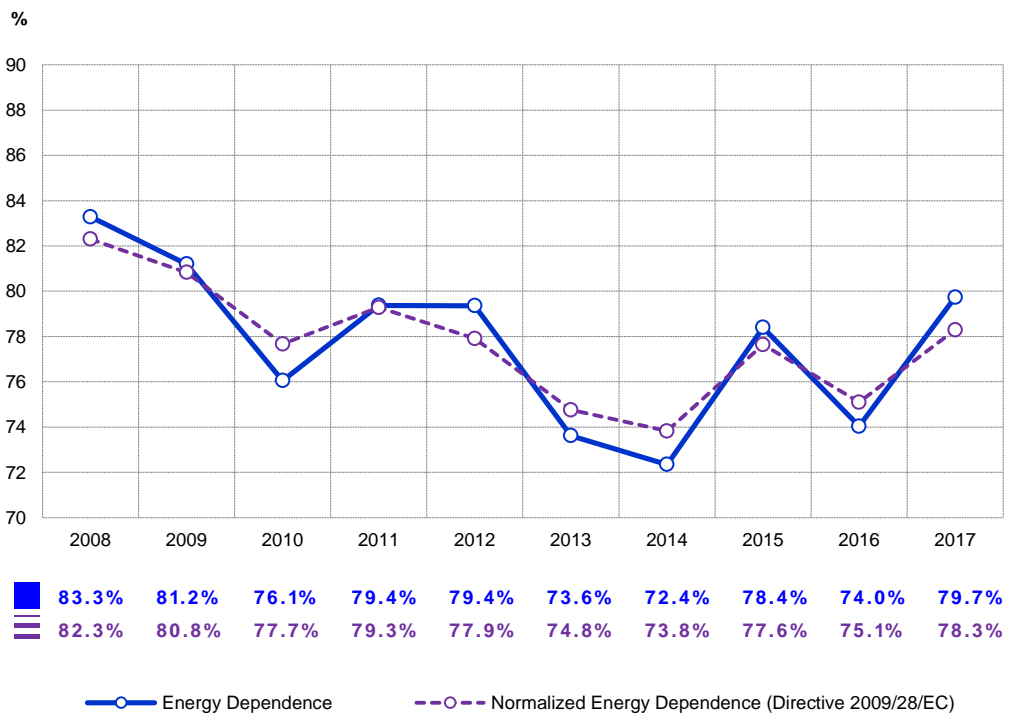
O – Other energy sources



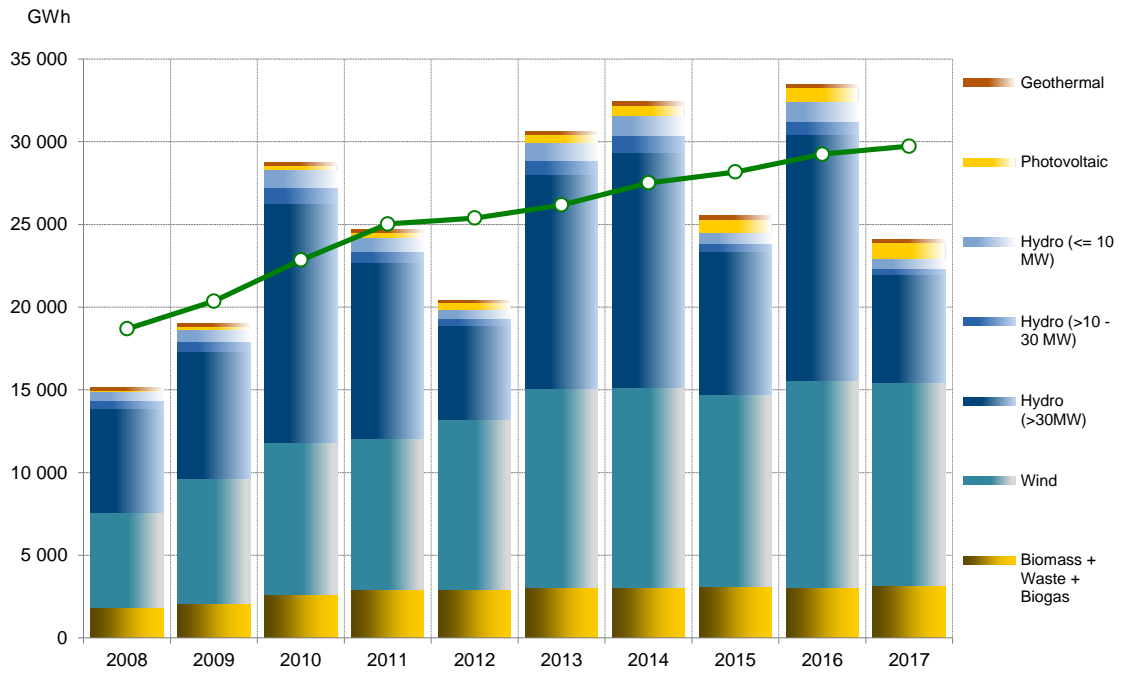
## NET IMPORTS



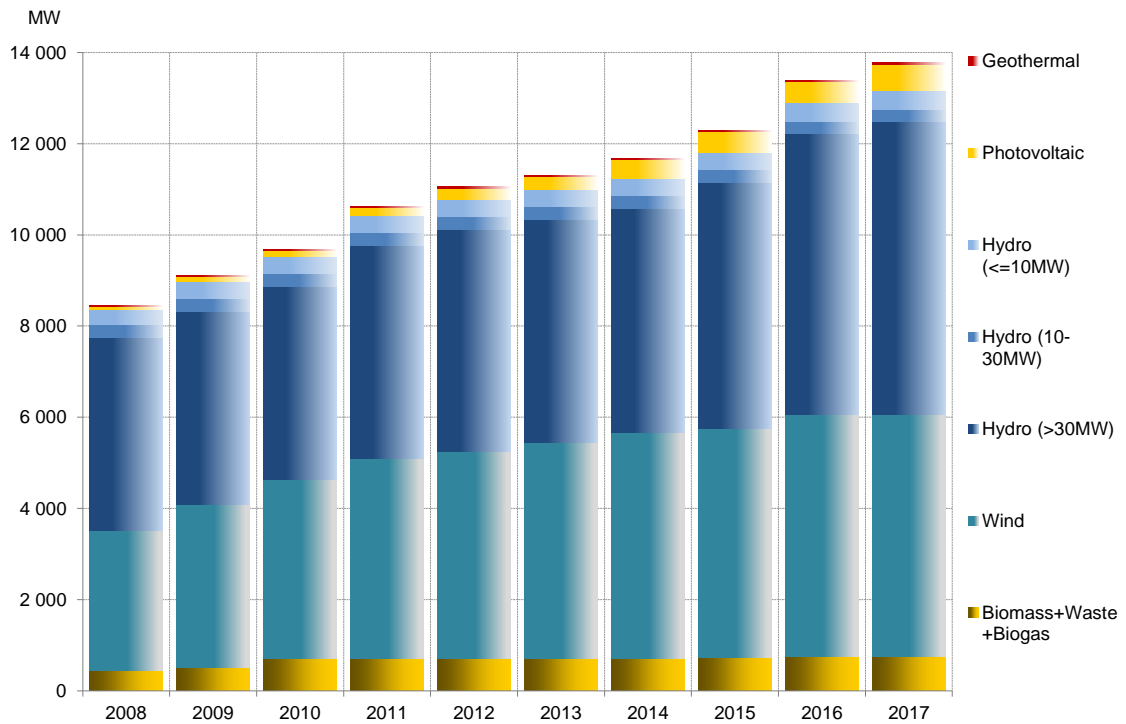
## ENERGY DEPENDENCE (%)



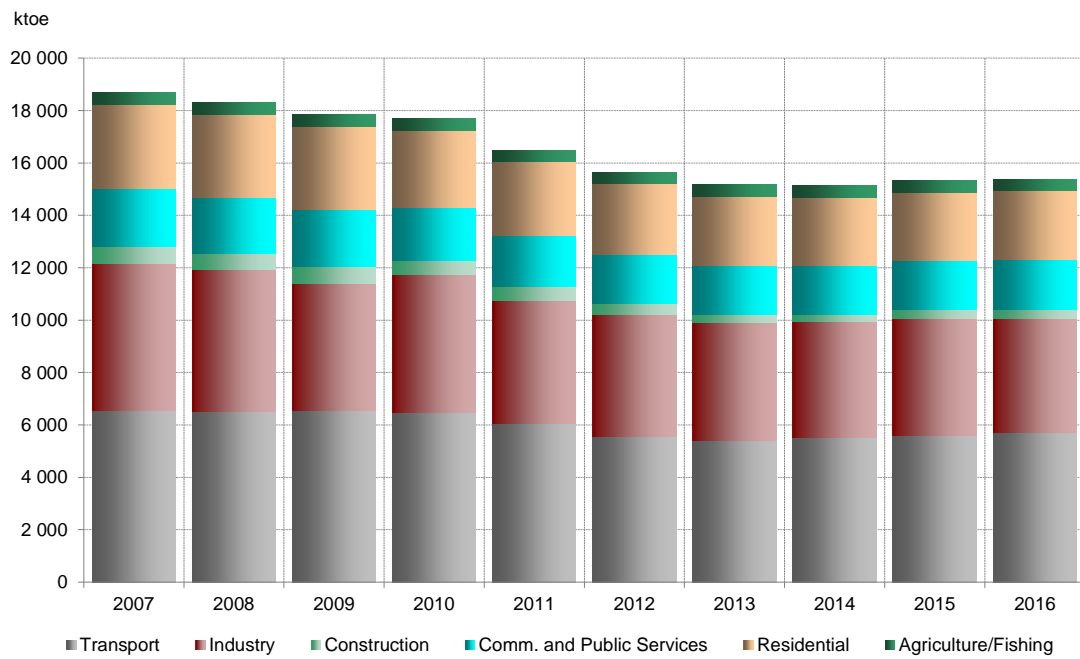
## RENEWABLE ELETRICITY PRODUCTION (GWh)



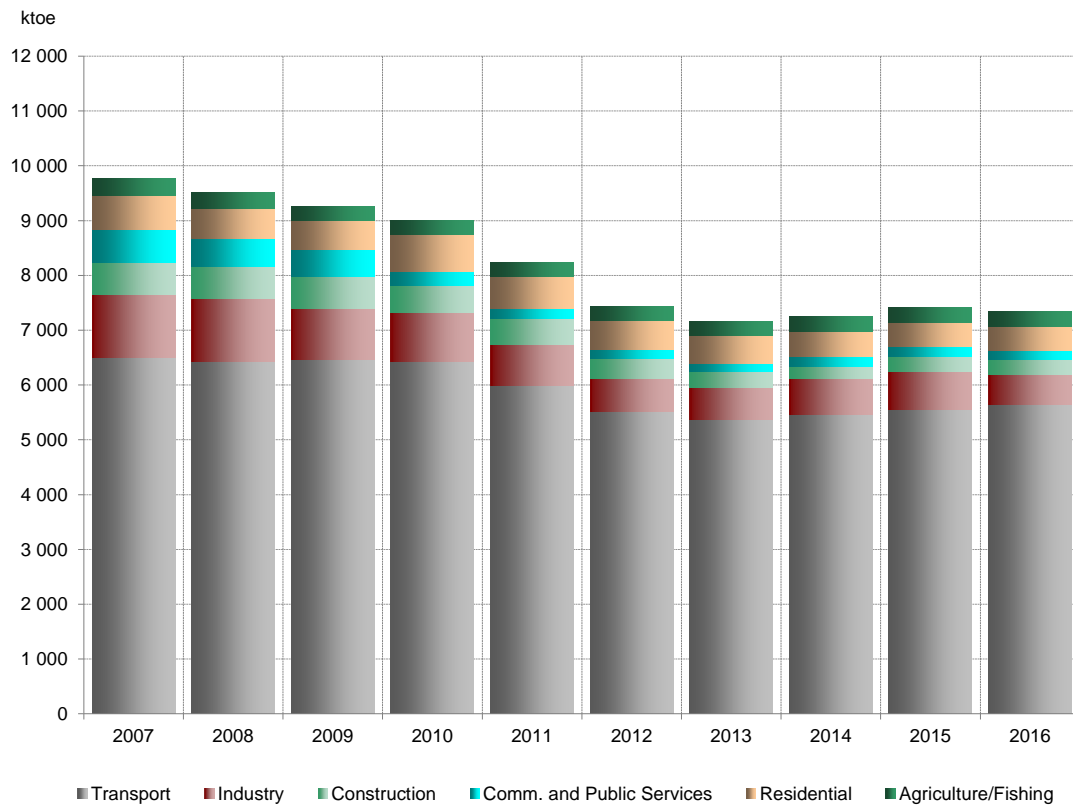
## RENEWABLE INSTALLED CAPACITY (MW)



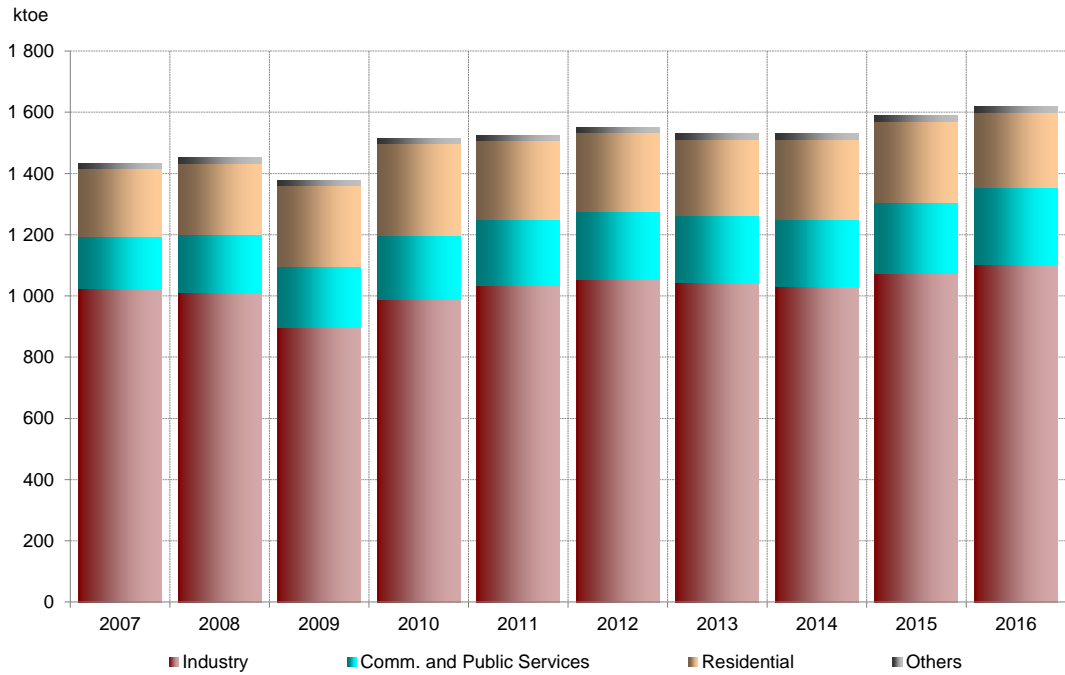
## TOTAL FINAL CONSUMPTION BY ACTIVITY SECTOR (ktoe)



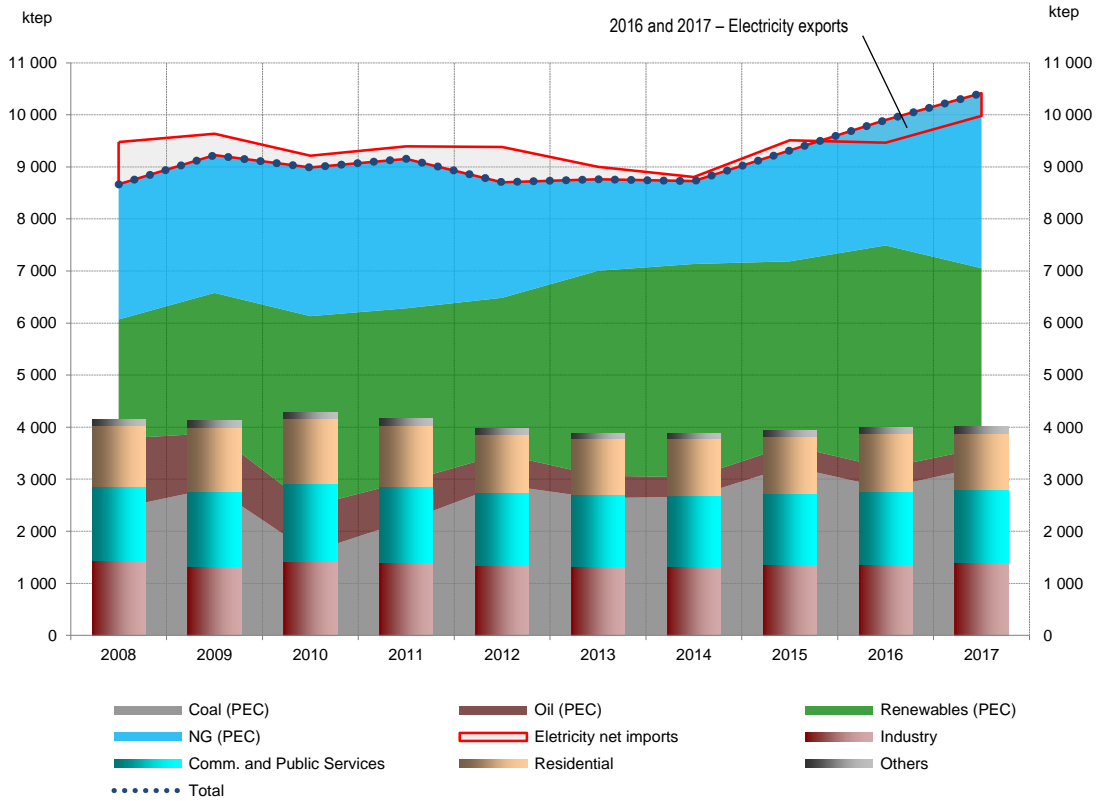
## OIL FINAL CONSUMPTION BY ACTIVITY SECTOR (ktoe)



## NATURAL GAS FINAL CONSUMPTION BY ACTIVITY SECTOR (ktoe)



## ELECTRICITY (ktep)

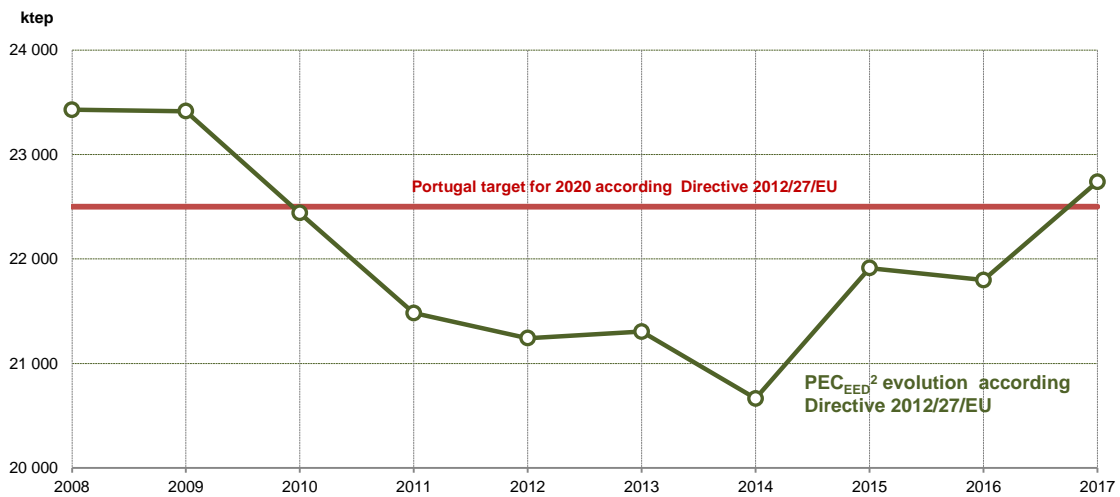
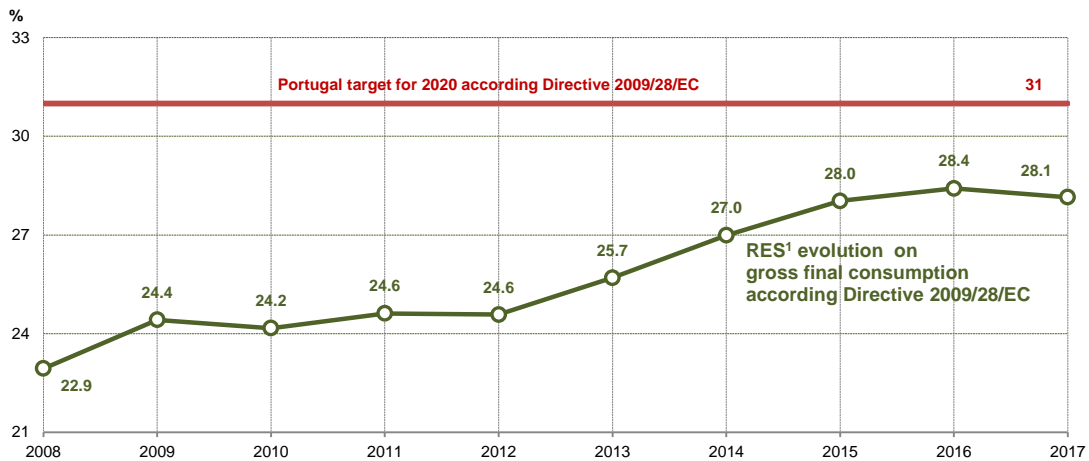


PEC - Primary energy consumption (area chart) in electricity production (CHP included).

Electricity consumption by sector in columns chart.



# PORTUGAL TARGETS FOR 2020



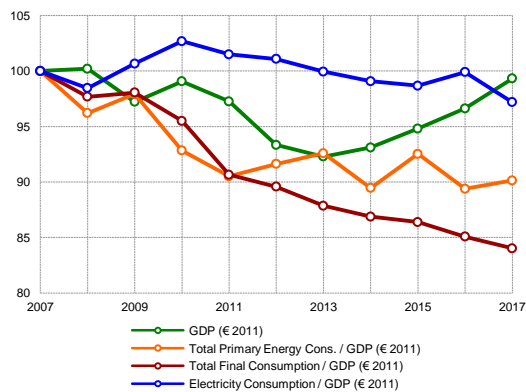
<sup>1</sup> RES - Renewables Energy Sources.

<sup>2</sup> PEC<sub>EED</sub> - Primary Energy Consumption, according Directive 2012/27/EU definition.

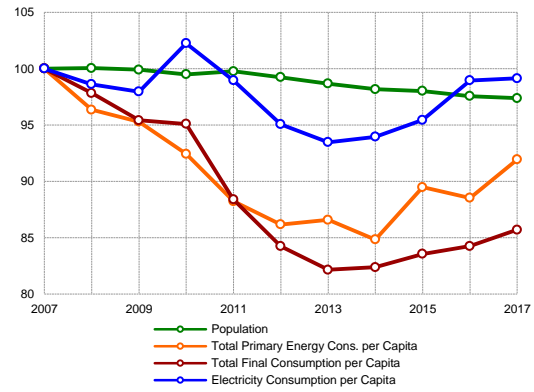
PEC<sub>EED</sub> Primary energy consumption, according Directive 2012/27/EU methodology for Energy Efficiency. Includes international aviation and excludes non energy consumptions.

Target Portugal defined the objective of saving 25% of primary energy consumption by 2020 compared to projections, related to 2007.

## ENERGY CONSUMPTION / GDP (2007=100)



## ENERGY CONSUMPTION PER CAPITA (2007=100)



## CONCEPTS AND ACRONYMS

CHP	Combined heat and power – Simultaneous production of heat and electricity, using the same equipment or power plant.
Domestic production	Primary energy produced within the national territory. Excludes transformation.
ED	Energy dependence (%) $ED(\%) = \frac{(Imports - Exports)}{(Primary\ Energy\ Consumption + International\ Navigation + International\ Aviation)} \times 100$
Exports	Amount of energy that physically leaves the national territory.
FEC	Final energy consumption – Total final observed consumption. Excludes energy transformation, consumption of energy sector and oil consumption as raw material.
FGEC	Final gross energy consumption, calculated according to Directive 2009/28/EC methodology. Based on FEC, adding international aviation and excluding remaining non-energy uses.
GDP	Gross domestic product.
Imports	Amount of energy that physically enters the national territory, whether customs clearance has taken place or not.
International aviation	Fuels delivered to aircraft for international aviation, which is determined on the basis of destination locations. Excludes fuels used by military aircraft from any nationality.
International navigation	Fuels delivered to ships for international navigation, which is determined on the basis of destination port. Excludes fuels used by military ships and fishing vessels from any nationality.
ktoe	10 <sup>3</sup> toe
NG	Natural Gas.
PEC	Primary energy consumption – Total energy used or transformed to other energy form. Includes imports, domestic production and non-energy use. Excludes exports, international navigation, international aviation and stock changes (final - initial).
PEC <sub>DDE</sub>	Primary energy consumption, according Directive 2012/27/EU methodology for energy efficiency. Based on PEC, adding international aviation and excluding non-energy uses.
RES	Renewable energy sources.
toe	Ton oil equivalent (10 Gcal; 41,869GJ).