EU Energy Market (il)liberalisation: its (in)efficiencies, (un)sustainability and need for energy democracy

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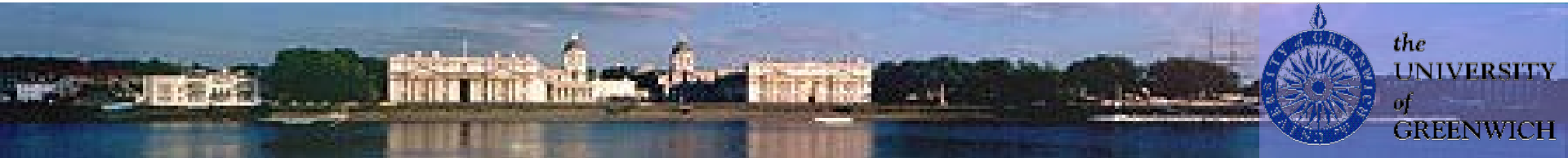
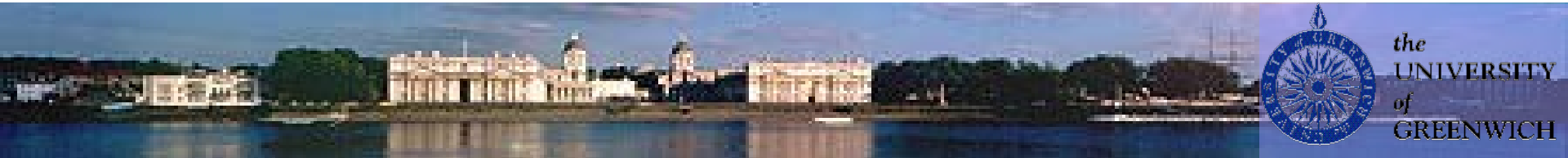


Electricity market liberalisation: a brief history

In the 1990s EU decided to rid of state monopolies in energy and start to gradually ‘open markets to competition’ while:

- ‘distinguish clearly between competitive parts of the industry (e.g. supply to customers) and non-competitive parts (e.g. operation of the networks);
- oblige the operators of the non-competitive parts of the industry (e.g. the networks and other infrastructure) to allow third parties to have access to the infrastructure;
- free up the supply side of the market (e.g. remove barriers preventing alternative suppliers from importing or producing energy);
- remove gradually any restrictions on customers from changing their supplier;
- introduce independent regulators to monitor the sector’ (EC 2017).

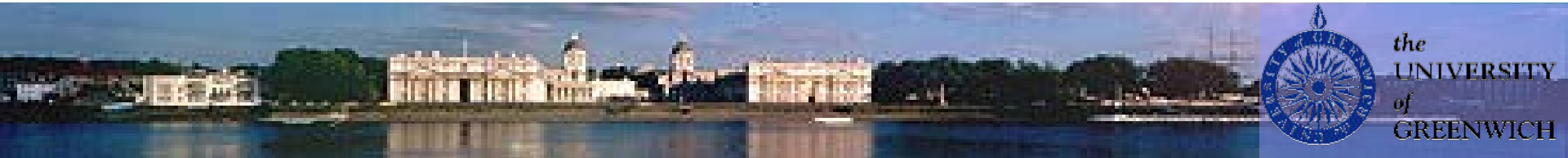


Liberalisation: aims and mechanisms

In the 1990s EU decided to rid of state monopolies in energy and start to gradually 'open markets to competition' to do away with monopolies and by focusing on supply side, neglecting the demand and with help of capacity mechanisms

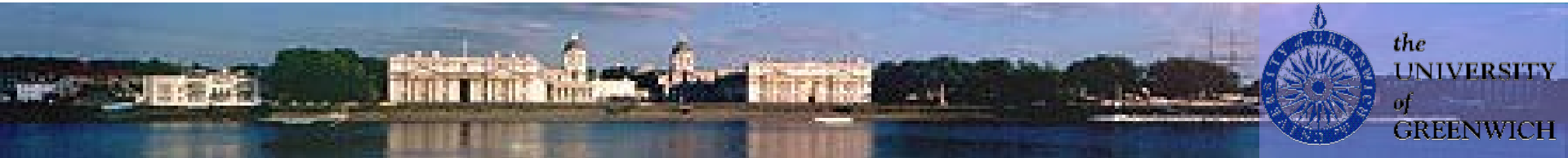
Introduction of 20-20-20 and 2030 targets, stimulation of RE via capacity mechanisms, state aid, ETS, encouragement of investment in green energy

In sum: solve challenges of energy market and need for its restructuring through liberalisation that would save costs, improve efficiency, help decarbonise



Were they met?

1. Market mechanisms and their effectiveness
2. (De)monopolisation
3. Price reduction/best price opportunities
4. Efficiency improvement
5. Security of supply – independence of supply and affordability
6. Decarbonisation



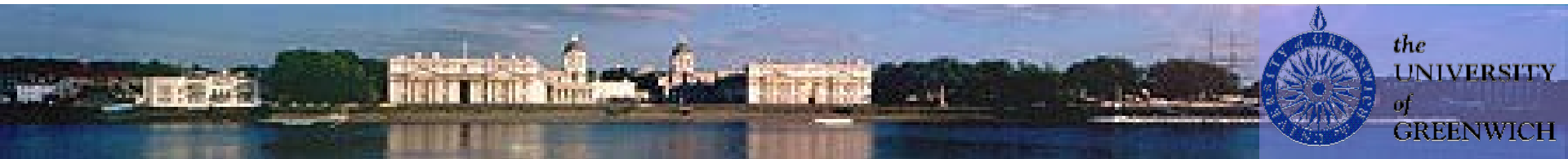
Energy markets cannot be seen in isolation - Prices keep growing while wages are stagnating and depreciating.

By 2016 EU's view/conclusion on electricity markets:

'Electricity markets need to be remodelled in such a way that would ensure their support for the EU's policy objectives [which they clearly contradict], by:

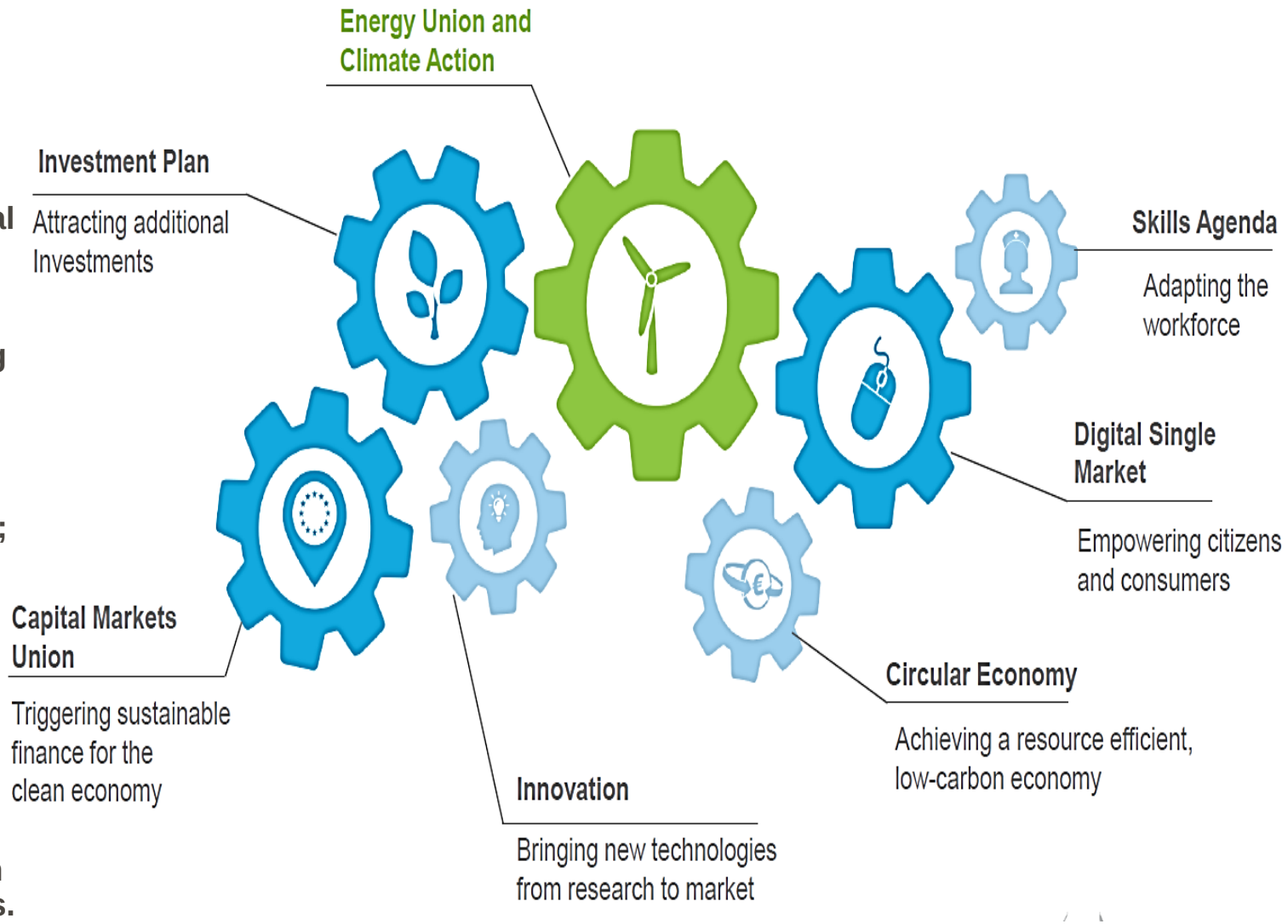
- encouraging investments in flexible low-carbon electricity generation;
- encouraging investments in a stable and adaptable grid that is fit for a growing share of renewables and for new uses of electricity;
- incentivising the use of energy-efficient equipment and consumer goods;
- providing affordable energy for industry and households'.

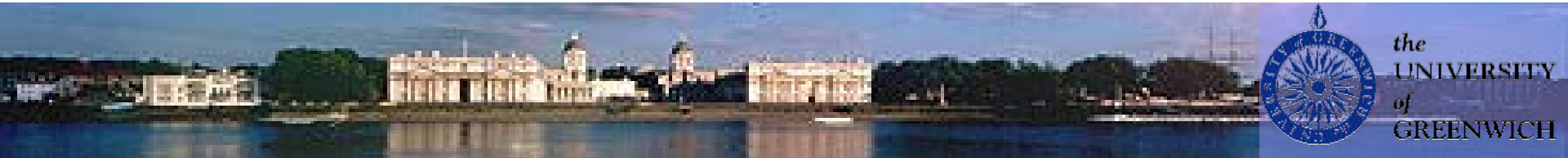
But this will lead to higher costs and will not guarantee investment nor control over the speed or form or area of capacity deployment .



The 4th Package has three main goals:
- Putting energy efficiency first;
- Achieving global leadership in renewable energies;
- Providing a fair deal for consumers'.

To be achieved via 'mutually reinforcing and closely interrelated dimensions':
--- energy security;
- solidarity and trust;
- a fully integrated European energy market;
- energy efficiency contributing to moderation of demand;
- decarbonising the economy; and research, innovation and competitiveness.





Mechanisms for supporting low-carbon power sources

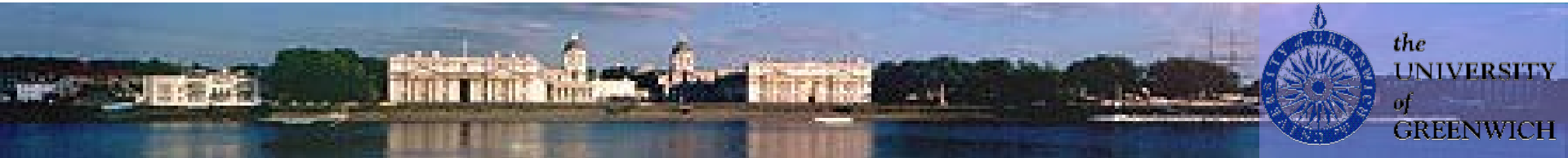
1. Feed-in Tariffs (FiTs)

2. Emissions trading

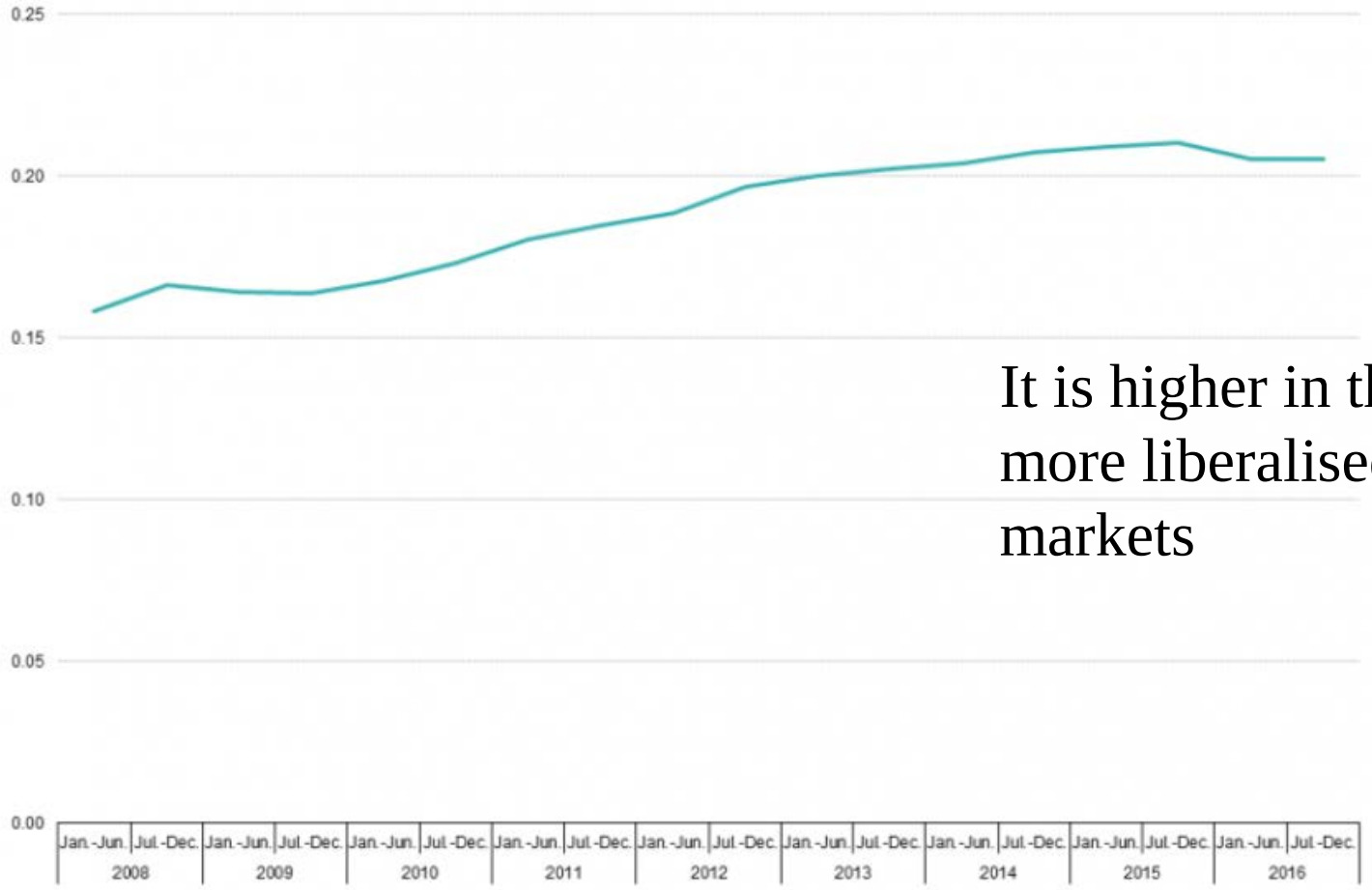
3. Capacity auctions

4. Renewable obligations and

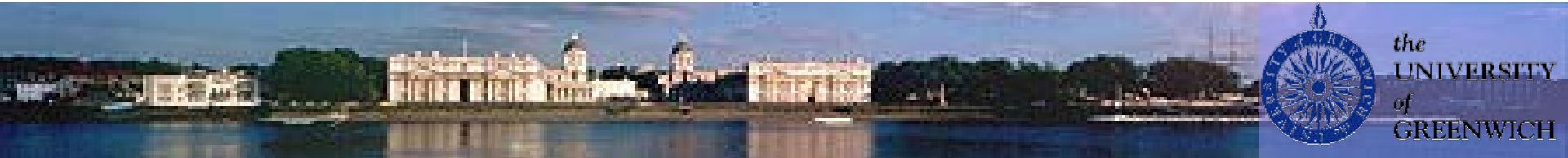
5. Carbon floor price.



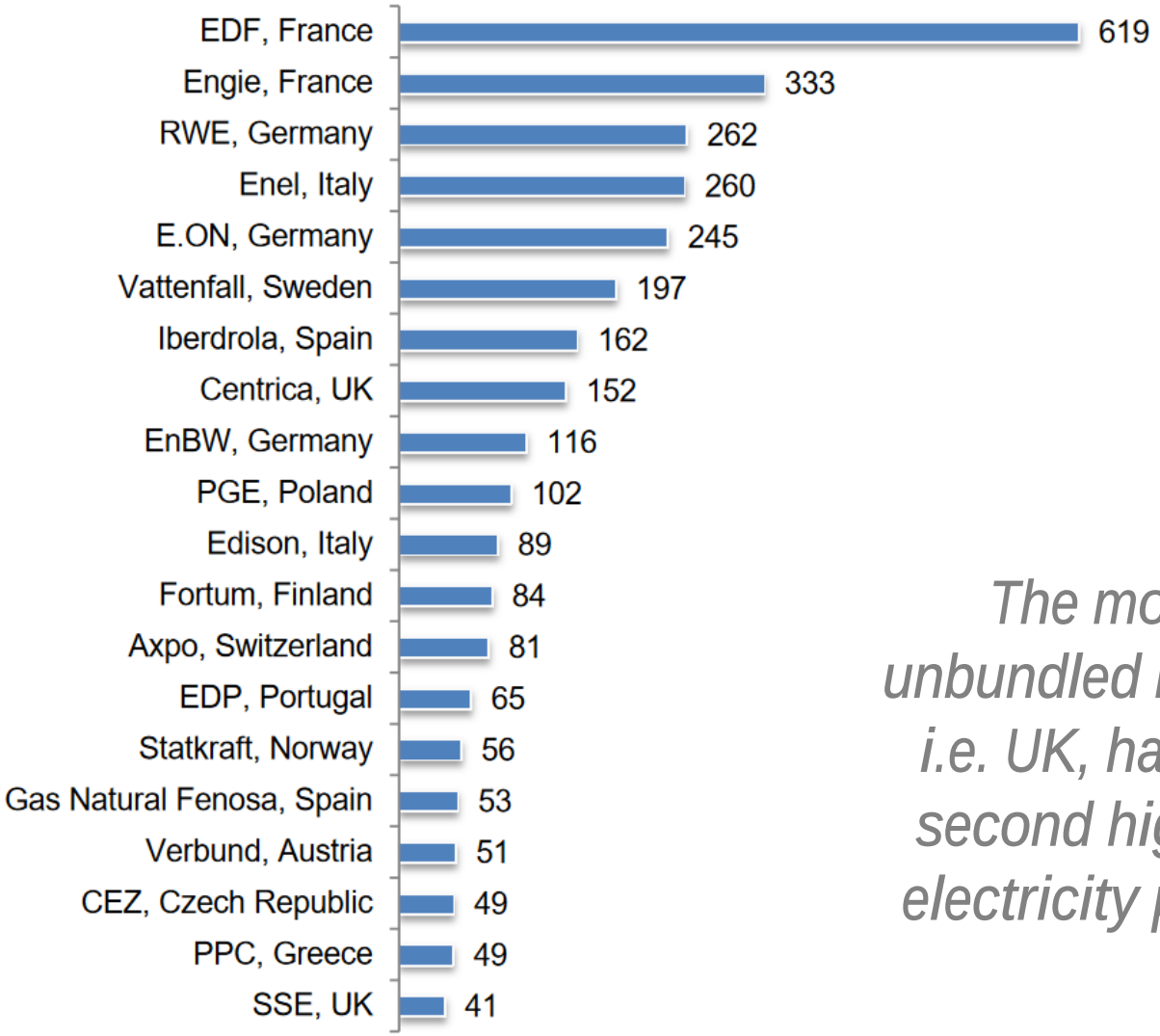
Development of electricity prices for household consumers, EU-28, 2008-2016 (EUR per kWh)



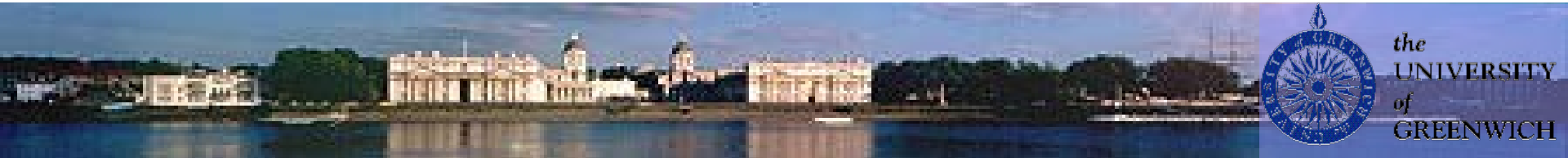
It is higher in the more liberalised markets

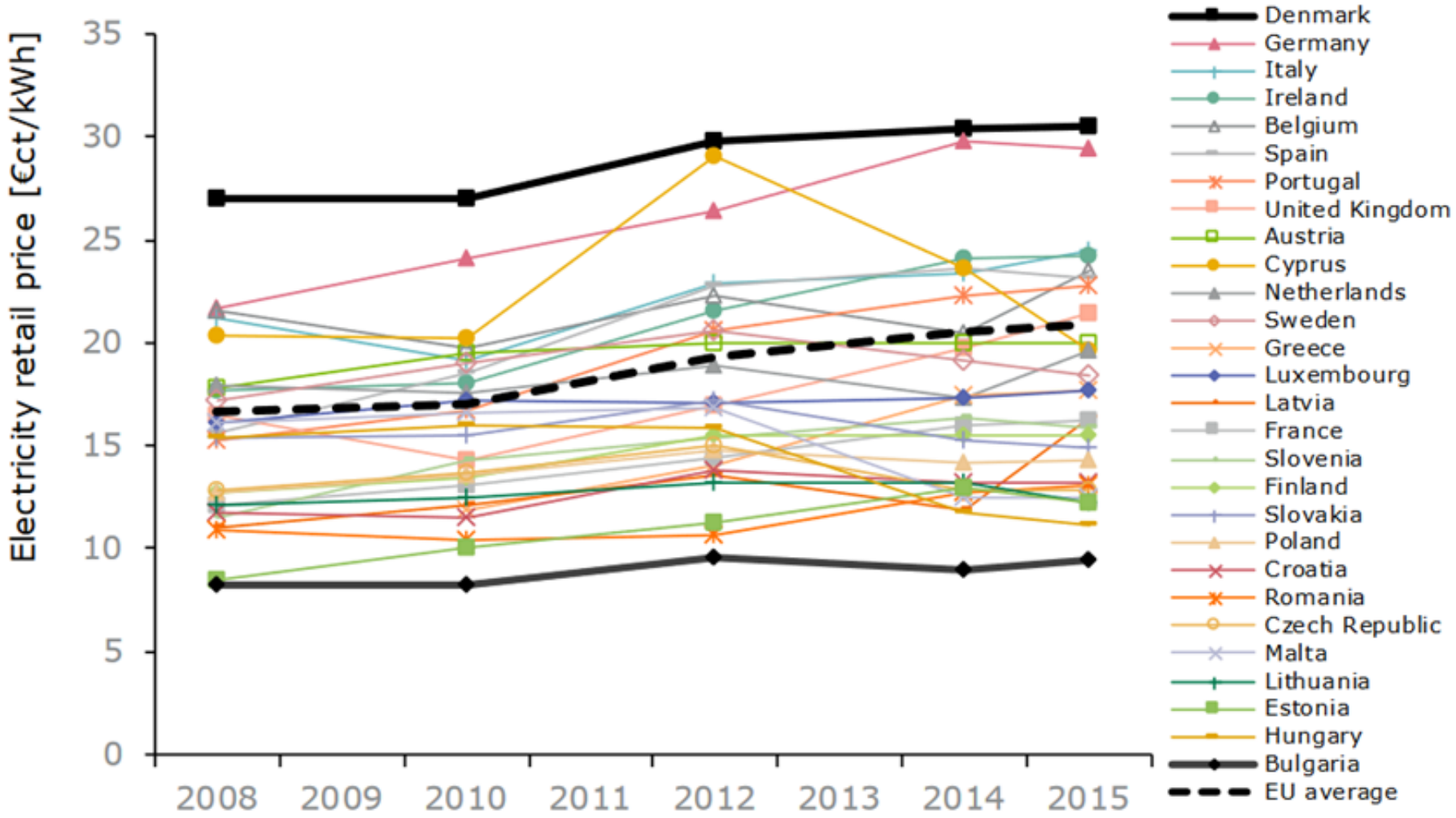


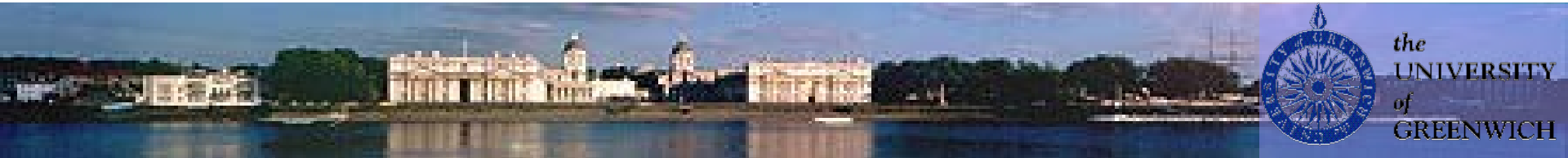
Power Sales Volumes in 2015, volumes in TWh



The most unbundled market i.e. UK, has the second highest electricity prices




Electricity retail price [€ct/kWh]
35
30
25
20
15
10
5
0
2008
2009
2010
2011
2012
2013
2014
2015
Denmark
Germany
Italy
Ireland
Belgium
Spain
Portugal
United Kingdom
Austria
Cyprus
Netherlands
Sweden
Greece
Luxembourg
Latvia
France
Slovenia
Finland
Slovakia
Poland
Croatia
Romania
Czech Republic
Malta
Lithuania
Estonia
Hungary
Bulgaria
EU average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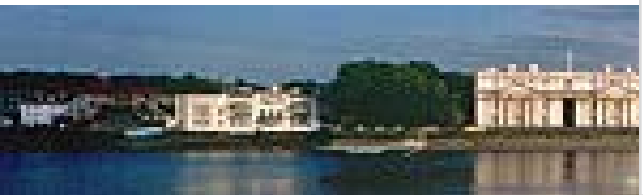
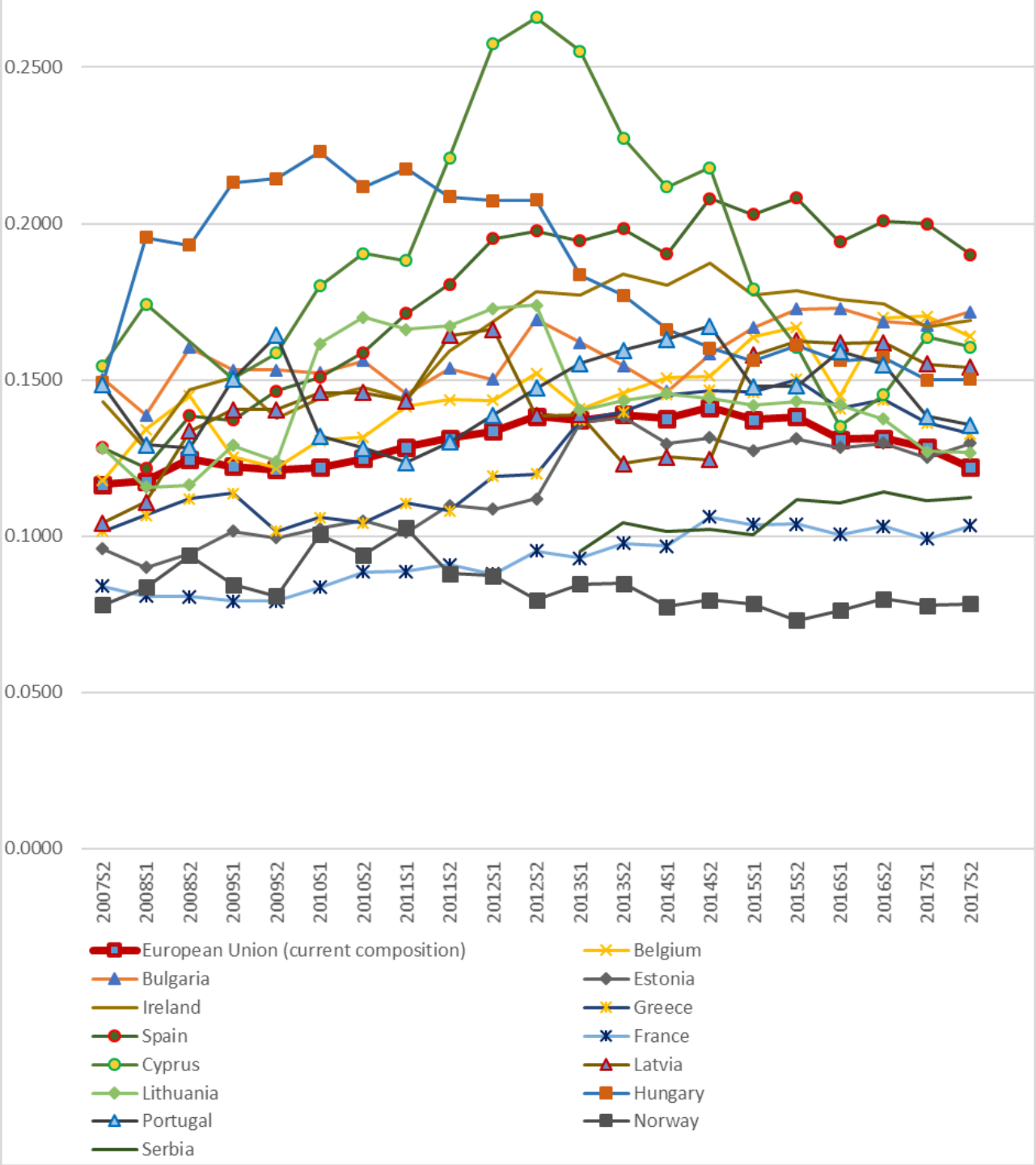
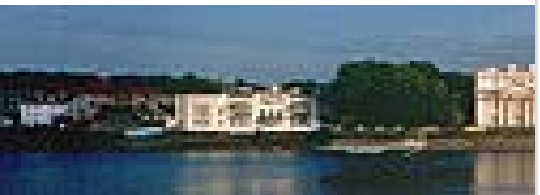
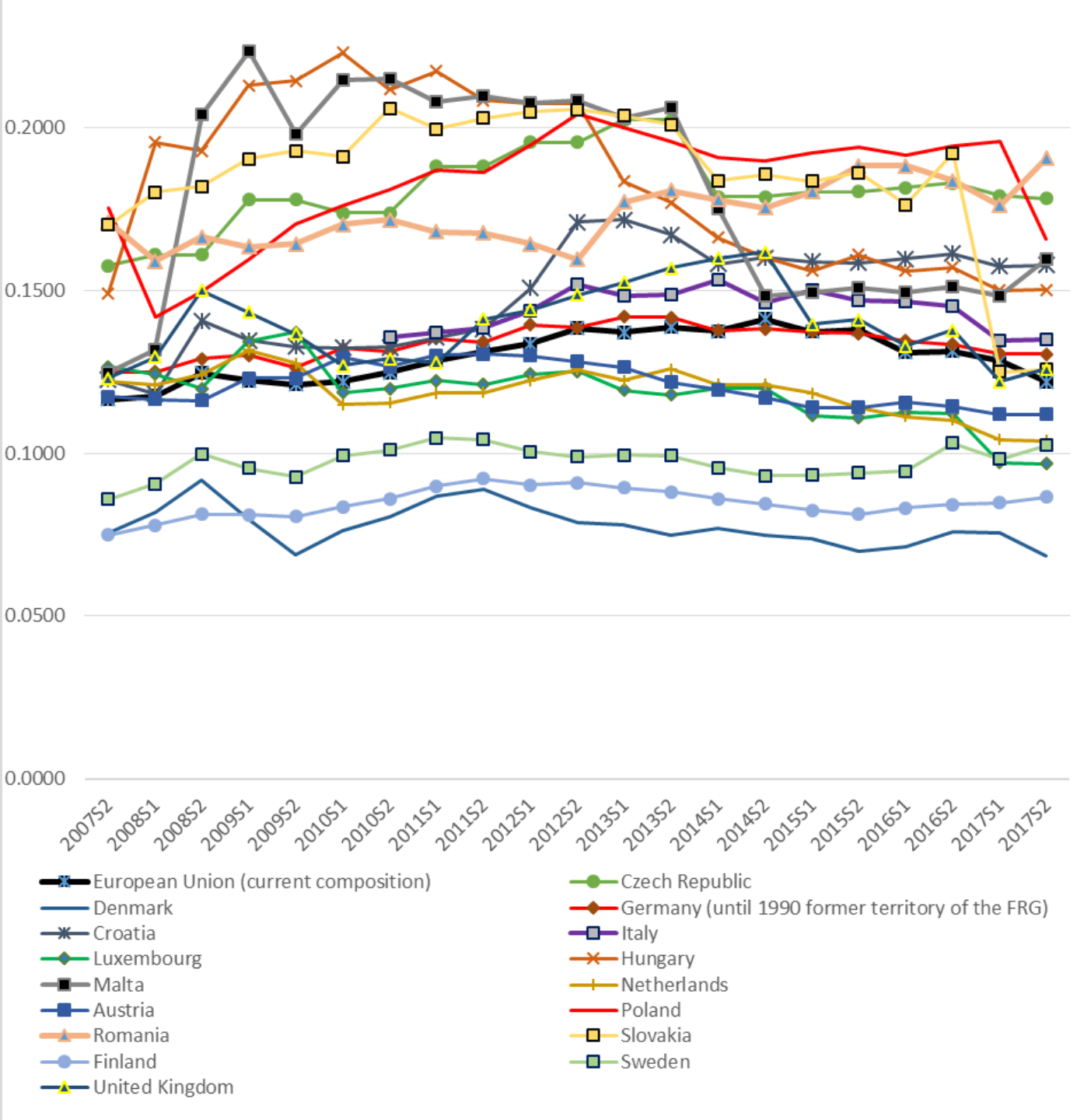
Electricity prices per KWh, PPP adjusted, Euros (1)



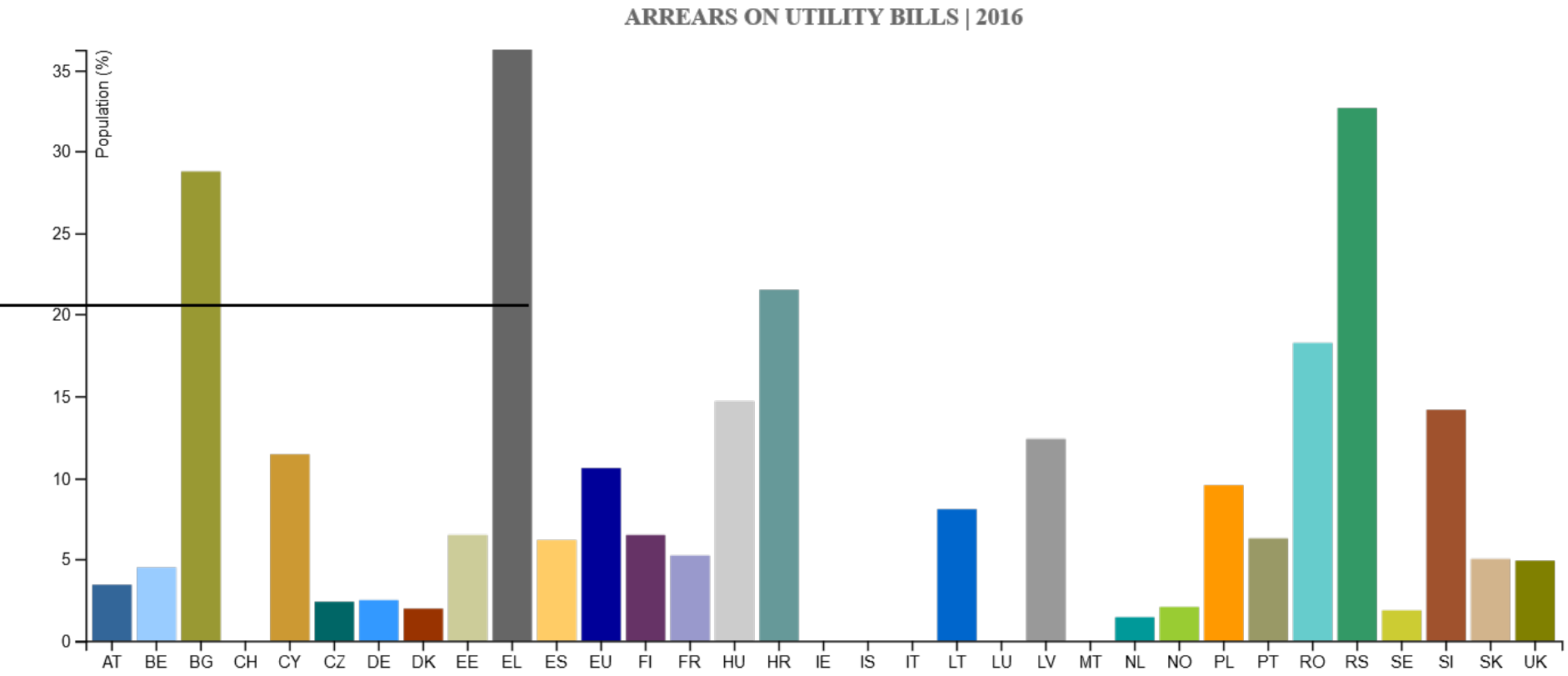


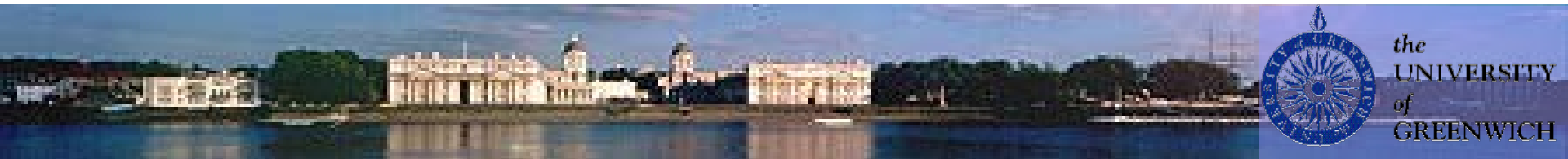
Electricity prices per KWh, PPP adjusted, Euros (2)





Energy poverty as arrears on utility bills, EU in 2016





Security of supply?

Import dependency by type of fuel – it's growing, not falling

Many big companies are in financial trouble

Problem of affordability

Market failures…

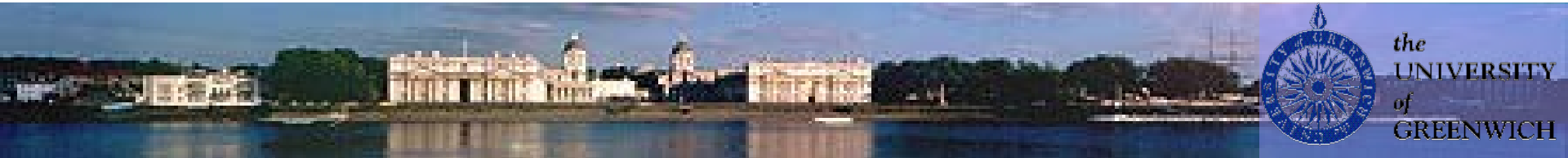
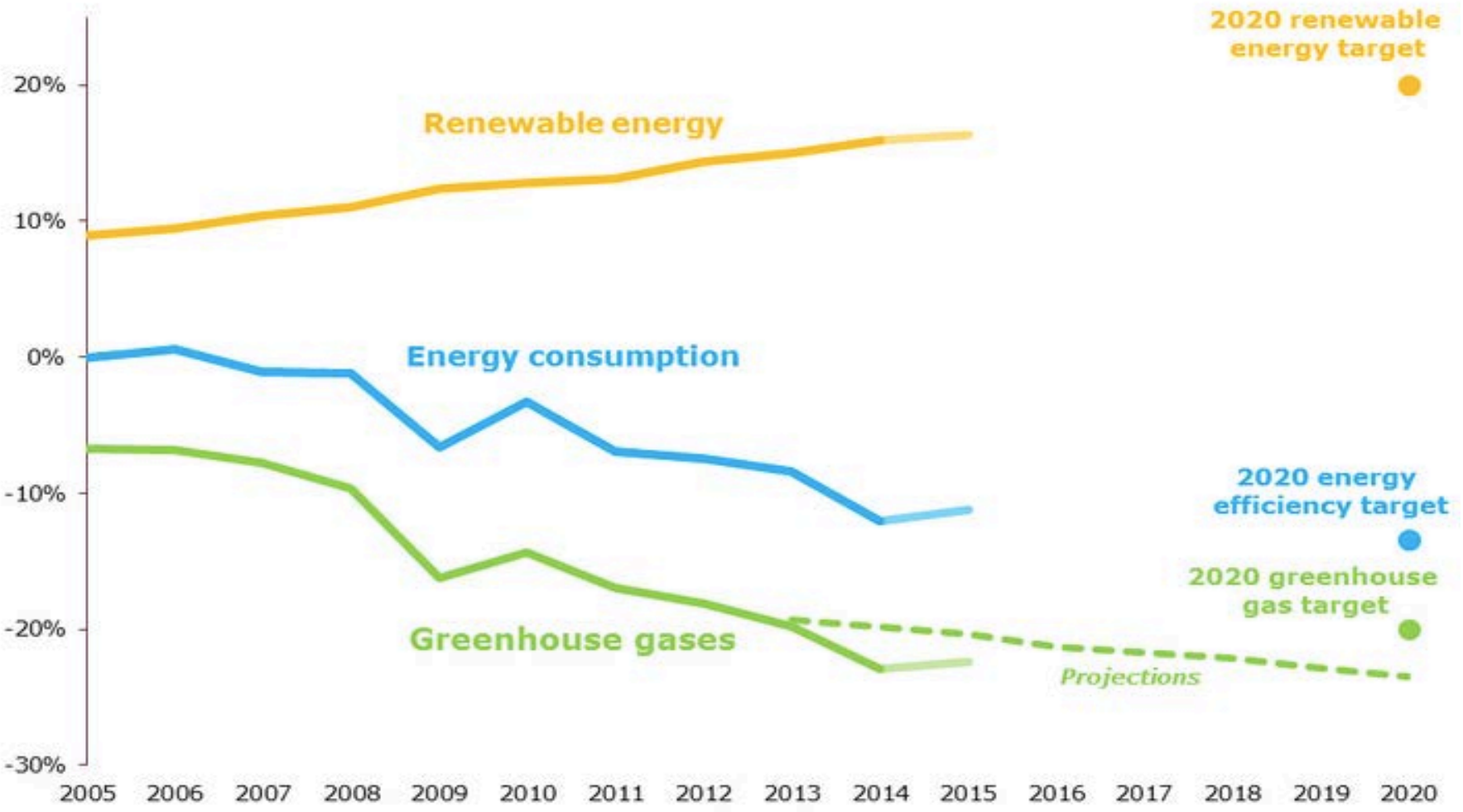
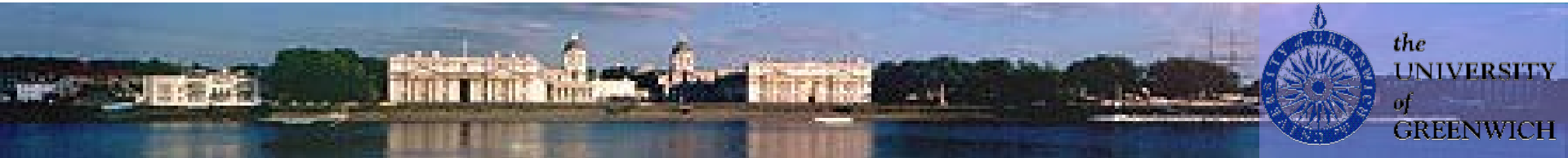
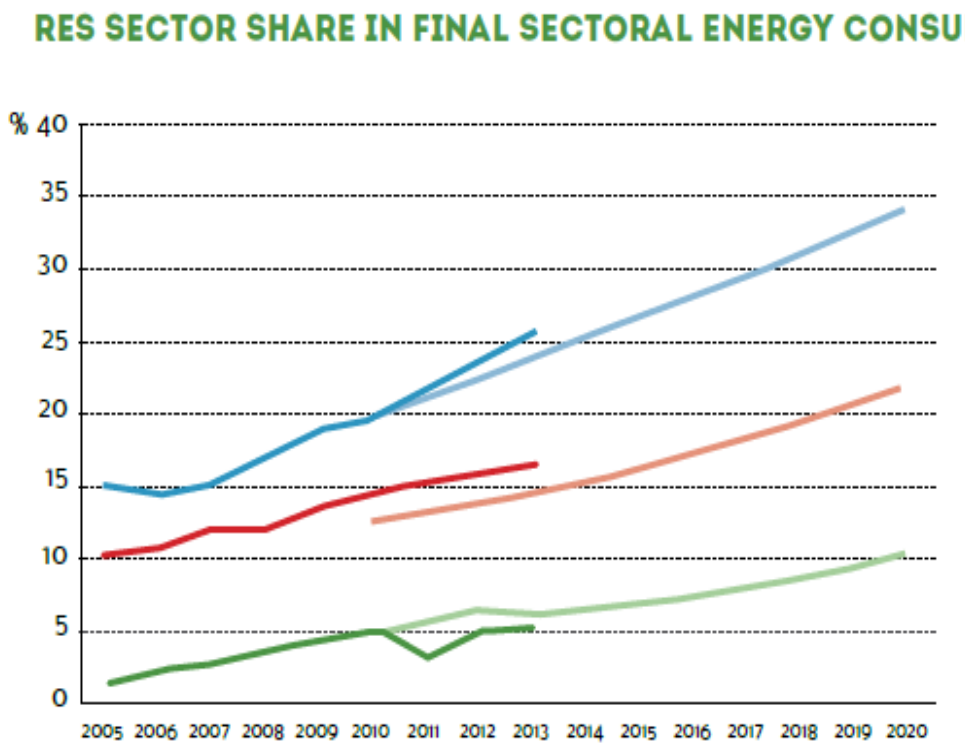


Figure 1 EU progress towards 2020 climate and energy targets





Is EU on track with its targets?

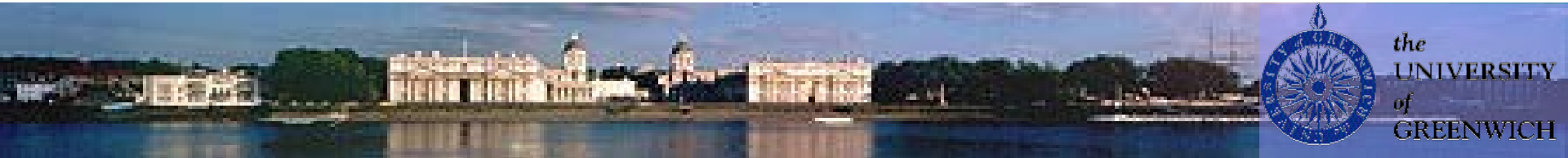


But there are 'buts'…

Figure 2: Actual EU-28 RES sector shares from 2005-2013 and NREAP planned shares (actual 2013 shares are estimated for LU). Source: Fraunhofer ISI based on Eurostat and NREAPs

RES-E and RES-H&C - higher than planned, while the share of RES-T is still lagging behind

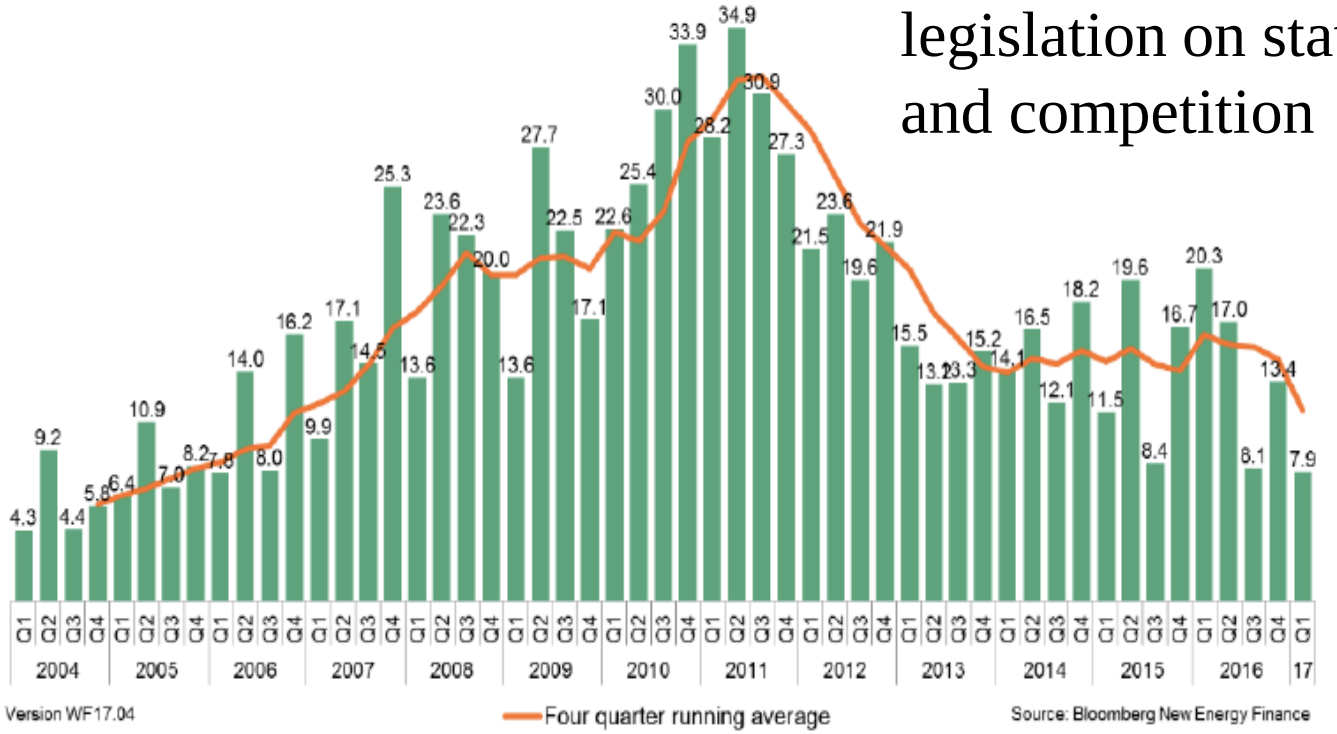
Source: 'EU Roadmap 2015' (EC 2015: 8)



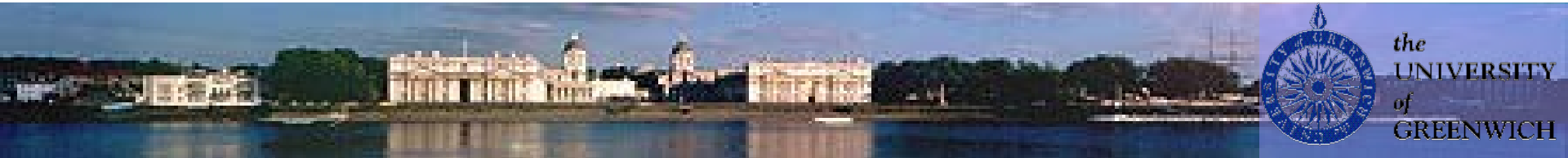
Europe new investment in clean energy

($ billion)

Complicated by contradicting EU legislation on state aid and competition



Bloomberg New Energy Finance



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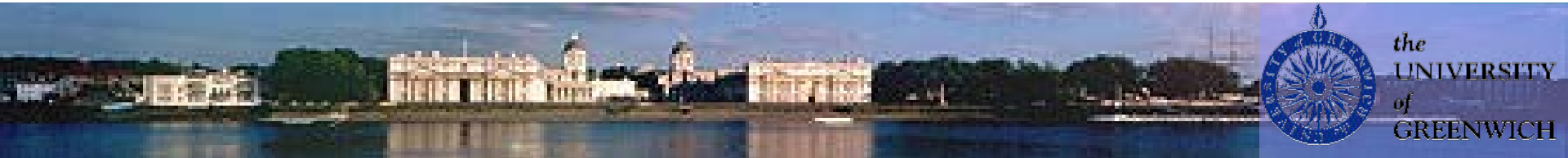
Additional effects and challenges :

1. *The market did not demonopolise as was planned – we have an oligopolistic picture instead. More generators but still few large ones; more retailers yet that 'choice' did not lead to drop in prices – the answer is not in more competition but in the way it is managed.*
2. *The jobs landscape in the sector is changing to the worse*
3. *Pressure on smaller EU economies to meet RE targets that take away from socio-economic need*
4. *ETS shifts the problem around, state aid helps but is hard to disburse, FiTs work but cause controversy in competition, Capacity auctions and Carbon Floor Price have potential*
5. *Carbon reduction targets do not always work in the intended way, nor are set accurately*
6. *The international dimension of energy trade, production and consumption need to be addressed properly (e.g. global emissions and goods transportation) and the urbanisation challenges (e.g. H&C and T) need a separate discussion for the 4th Package to be taken seriously*



Why markets fail in energy as public services?

Neo-classical economics – principles and problems or how is private provision "sold" to us

Built upon assumptions of self-interest, human as utility-maximising "rational" (?) being

Is this compatible with the pillars of sustainability?

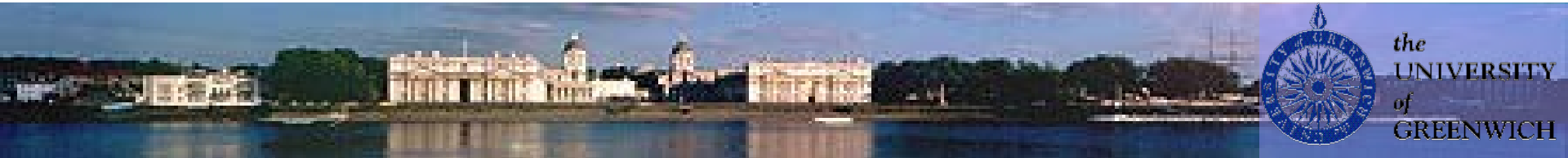
Complex issues can be ascribed monetary values including utility itself and the environment – proven to be wrong

Is this compatible with the pillars of sustainability?

These two elements allow for concept of efficiency e.g. profit-maximisation - race to the bottom and exponential growth in a finite world don't work

Is this compatible with the pillars of sustainability?

We need to talk about public vs private provision and our definition of efficiency



Public services provision: public vs private

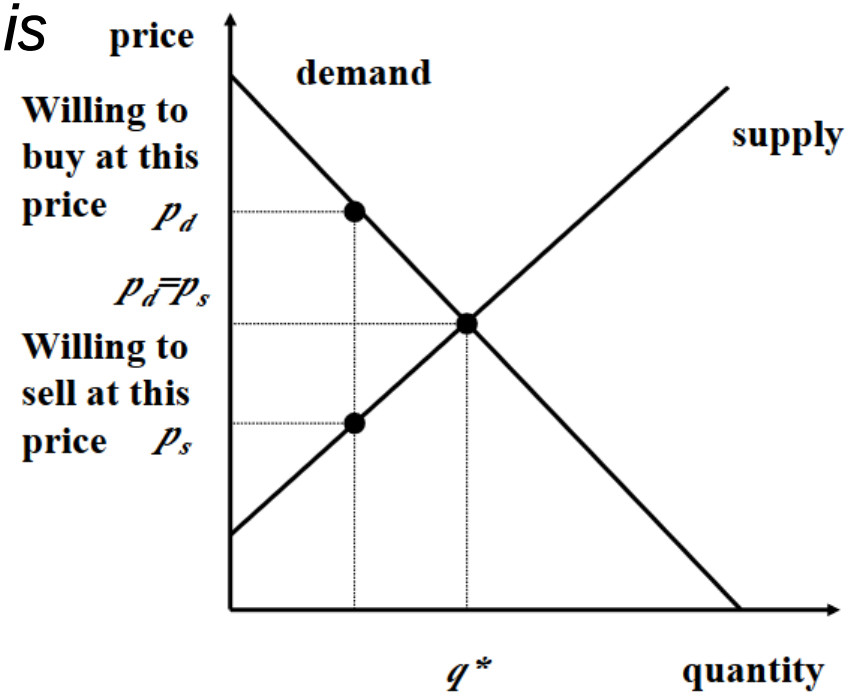
Public services are of universal demand

Willingness or, rather, ability to pay is not the same for all consumers…

In private provision at market prices there will be unmet demand

It can be met by subsidies to the company or the customer.

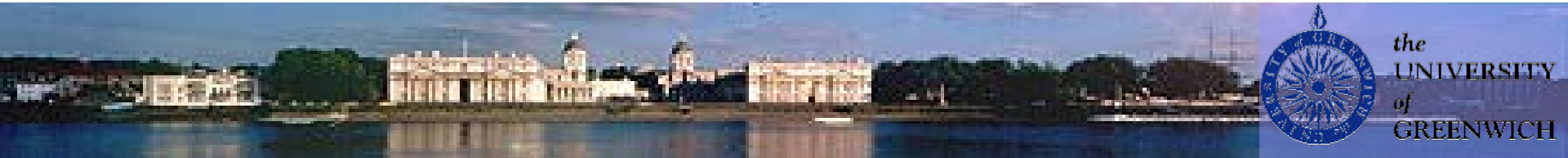
But subsidies mean more Expenditure – so how can it be 'cost efficient'?!



Public vs private efficiency

1. the empirical evidence undermines a fundamental part of the argument for privatisation and use of the private sector.
2. Efficiency is not the same as cutting costs. Lower costs may simply mean lower quality of service; or they may mean that the company is taking its profits by cutting the jobs, pay and conditions of its workers, without improving systems of work
3. comparisons between public and private sector performance are rarely made. In the great majority of cases, private companies only compete for outsourced contracts against other private companies; and a privatisation by sale goes, by definition, to a private buyer (Hall 2014)
4. *Moreover, liberal market is really illiberal in such modelling and you cannot have both optimal allocation for public and capital at the same time (Amartya Sen)* - The system then must be changed into a form that allows a free distribution of resources instead of guarding competition.

There is no economic case for private ownership/operation of public services, it is ideological.

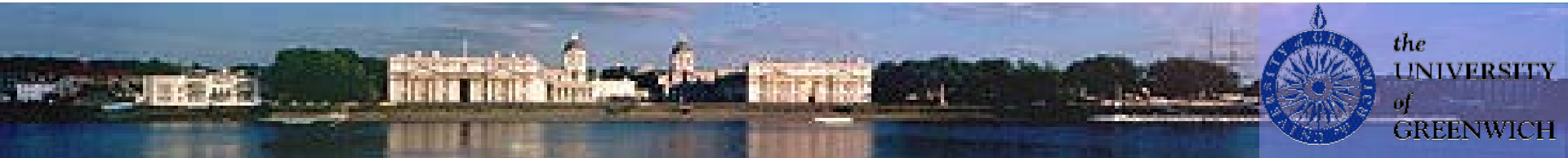


Private capital chase profit, not human need… and thus fails to allocate adequately, esp in the transition scenario

- *Utilities require high capital investment*

- *Comparatively higher economic risks associated with investment were due to the exposure risk of long-term capital intensive investment that relates to contract renegotiations, tariff levels, and currency fluctuations*

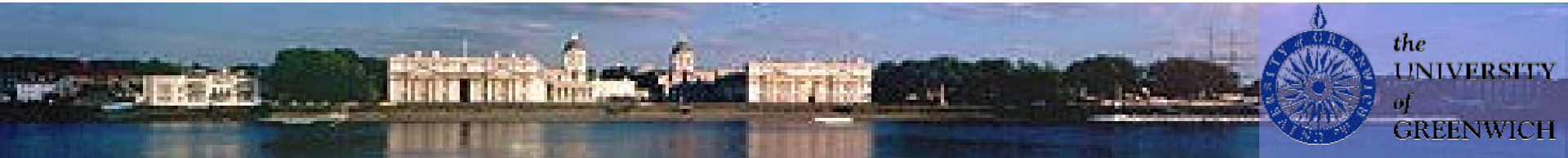
- *Problems with network extension in the areas/countries with a high proportion of customers unable to pay due to poverty*



Liberalisation and labour

- loss of good quality jobs
- little compensatory job creation in green energy
- poor quality of the new jobs created
- erosion of advocacy potential due to casualization

Between 1994 and 2004 in EU-15 246,000 jobs were lost in electricity and 23,000 in gas across 20 member states. In the energy sector overall there was a loss of 197,400 jobs between 2010 and 2016 due to compound effects of liberalisation, decarbonisation, digitalisation and automation.

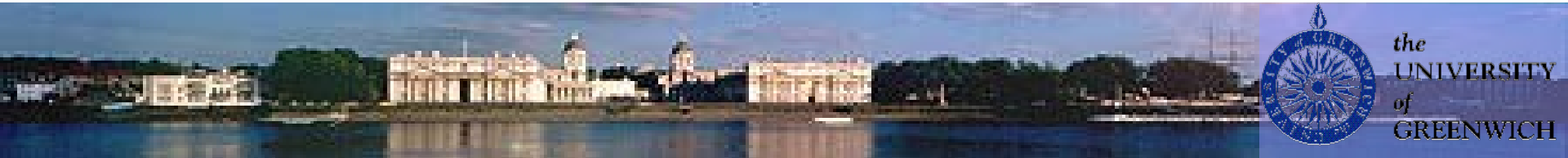


How to guarantee the right to energy? ‘You might as well own it’ (Thomas 2018)

Energy access is a basic human need and must be guaranteed, treated as a right, alongside education, healthcare, water, and other municipal services. Public has aright to decide what, where, and how gets produced and distributed, allocating investment according to need, not potential profit, etc.

We need energy democracy, it must be put at the heart of policy approach – involve communities and workers for just transition with guaranteed sustainable job and energy security

Trade Union association e.g. EPSU, PSI; and platforms such as Trade Unions for Energy Democracy (TUED) help build expertise, solidarity and momentum for change among TUs globally

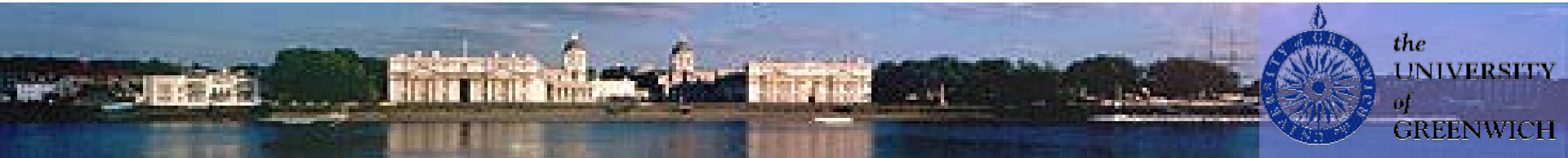


Recommendations for the 4th package etc:

Polycentric approach developed by the Nobel Prize Laureate Elinor Ostrom allows to achieve that by combining large scale centralised elements of energy systems and natural monopolies with decentralised, local generators and consumers, makes space for democratic engagement and worker and community empowerment.

Transformation of the energy market into a system that is socially efficient, sustainable in social, economic and environmental way, needs to be focused on:

- publicly owned and democratically controlled deployment of RE capacity,
- universal coverage of services by grid access and affordability,
- democratisation via meaningful involvement of all stakeholders, with workers and local communities prioritisation and sustainability principles as a basis,
- strengthening of local economies
- creation of secure climate jobs with priority given to workers in decarbonising industries. They are jobs linked to stopping climate change, not just being carbon neutral, and are to be found and founded in clean energy, construction, in industry, in training and education, agriculture and waste, and transport.



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