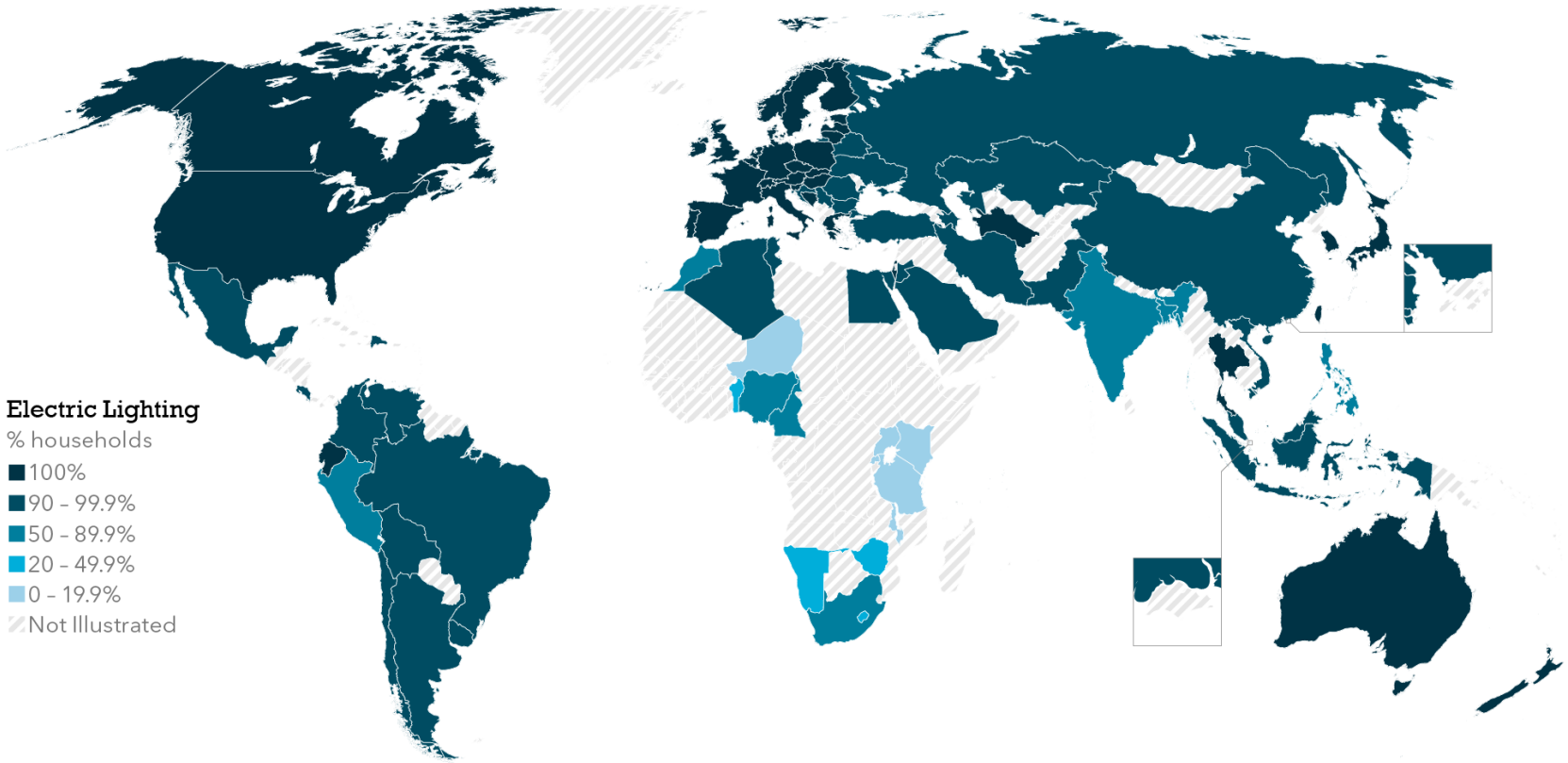
Passport

LIGHT SOURCES OVERVIEW: LED LIGHTS THE WAY

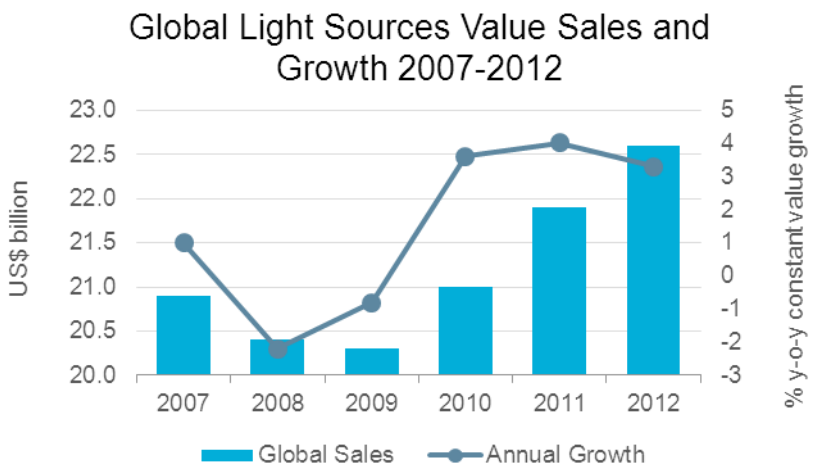
December 2013

Electrification a key driver of volume demand for light sources



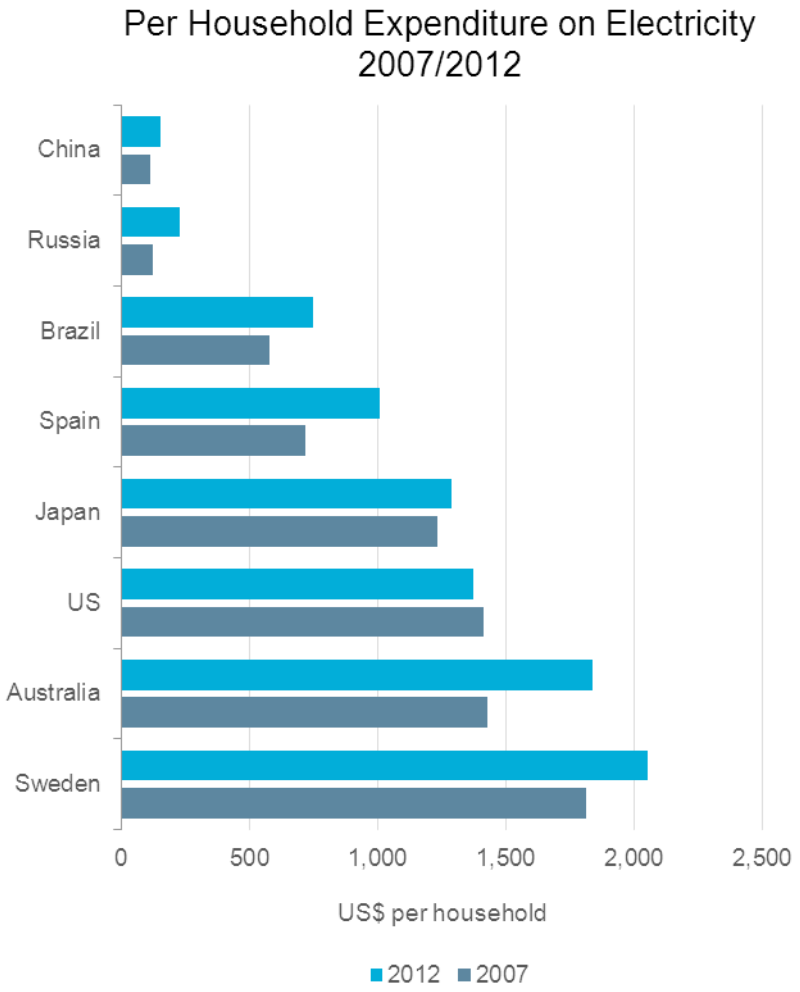
As developed economies falter, China drives global growth

- Value sales in the global light sources market grew by 8% between 2007 and 2012, to US$22.6 billion.
- The main driver of this growth was China, where a combination of strong economic growth and urbanisation helped to drive a 51% increase in value sales over this period, to just under US$6 billion, ie more than one dollar out of every four spent globally in this segment.
- Brazil has overtaken the US to become the third-largest light sources market, with value sales of US$1.7 billion in 2012.
- In the aftermath of the global economic downturn arising from the 2008 credit crunch, most developed markets have seen very low or negative growth in sales of light sources over recent years.
- Fewer homeowners took on home remodelling projects, hitting discretionary purchases of light sources hard.
- Just three developed economies (Sweden, France and Switzerland) saw CAGRs of 0.5% or more during the period 2007-2012, with just two others (Canada and Spain) enjoying positive growth.



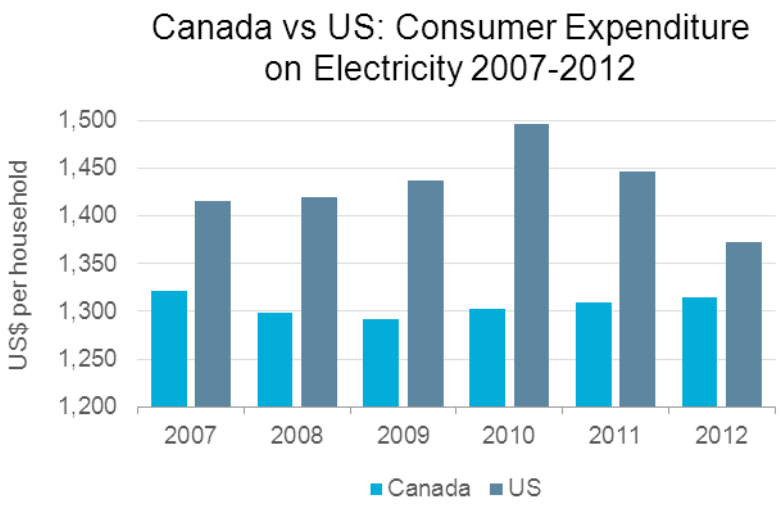
Increased cost of electricity could spur LED sales

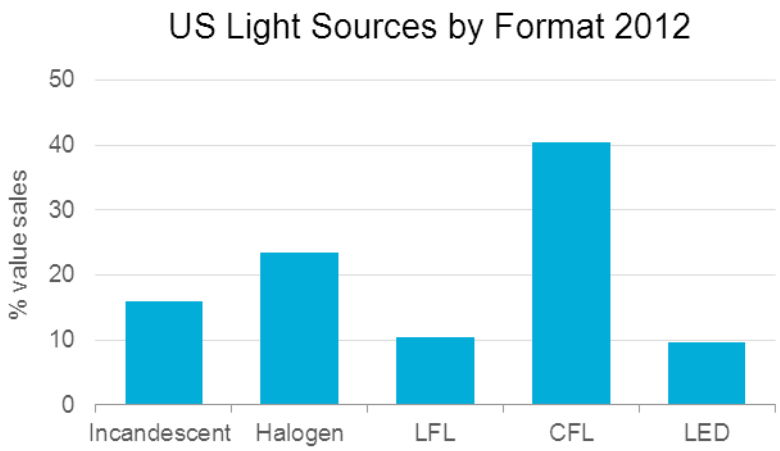
- Over 2007-2012, real per household expenditure on electricity has increased significantly in many countries, further shifting the economics of the light sources market towards energy-efficient products such as CFL and LED lamps.
- A switch to greener, but more expensive, energy (such as wind power) has driven up the price of electricity in Spain, with per household expenditure rising by 40% between 2007 and 2012.
- In Australia, a carbon tax has helped to push up prices, with per household expenditure on electricity rising by 29% over 2007-2012.
- In some markets, such as Indonesia, governments are attempting to reduce or even phase out consumer subsidies, which are expensive, ineffective (they benefit the rich disproportionately) and inefficient (they encourage overconsumption).
- In the US and Canada, per household expenditure on electricity has declined slightly over recent years (by 3% between 2007 and 2012 in the former), due in part to increased production of oil and gas in North America.



Shale gas boom makes energy efficiency less of a priority in the US

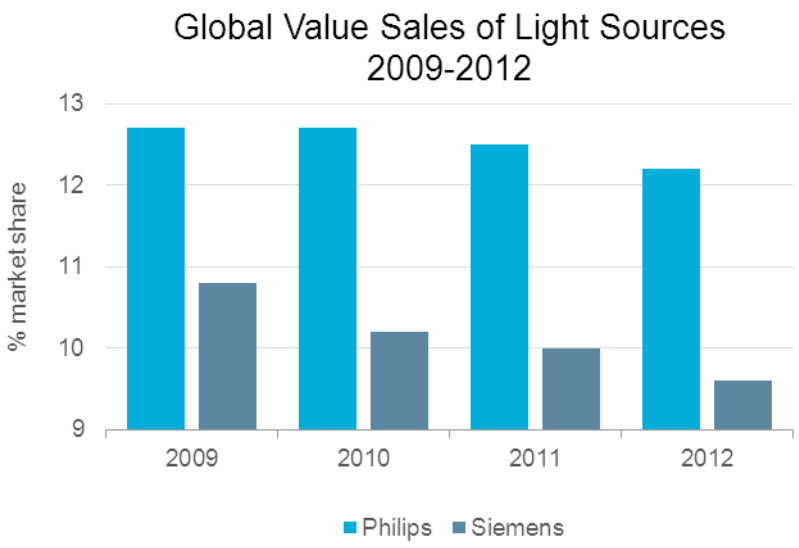
- The emergence of shale gas as a source of energy has had a significant impact on electricity markets in the US, reducing the cost of electricity to consumers and thus the payoff for being more energy efficient.
- This has helped to make US consumers (particularly those more sensitive to price) less inclined towards switching from halogen lamps to more energy-efficient (but also more expensive) light sources.
- According to the US Department of Energy's Energy Information Administration, shale gas accounted for 39% of all natural gas produced in the US during 2012, compared with 15% in Canada and less than 1% in China.
- Between 2010 and 2012, per household expenditure on electricity in the US fell by 8.3%, from just under US$1,500 to US$1,372.
- Over the same period, it rose by 0.9% in neighbouring Canada, to US$1,314.
- In Europe, consumer resistance to fracking (the method used to extract shale gas) is stronger than in the US, due to worries about its potential for water and air pollution in densely populated regions.





With Osram spin-off, Siemens bets on small being beautiful

- The shift to LED lamps has led to the entry of new competitors into the previously strongly consolidated lighting market, particularly in the rapidly expanding Chinese market.
- Structural shifts in the light sources market (which saw Siemens's global market share in light sources shrink from just under 11% in 2009 to 9.6% during 2012, widening the gap between it and market leader Philips) prompted the German company to spin off its Osram lighting unit during mid-2013.
- Siemens is betting that an independent Osram (in which it retains a significant stake) will be better able to adapt to fast-changing market conditions than if it were still part of a larger group and subject to a greater degree of managerial oversight/bureaucracy.
- According to Siemens, "In order to react quickly and flexibly to the changing conditions in the market and be able to use the related strategic and operational opportunities, an organisation marked by short decision-making processes and a clear focus on the global lighting market is needed… technological change in the lighting market requires increased flexibility".



- Osram has initiated a worldwide programme called "Push" to trim costs and employment in order to boost productivity.
- Between the spin-off in July 2013 and mid-November, Osram's stock market valuation almost doubled.
- According to Osram CEO Wolfgang Dehen, "A greater degree of entrepreneurial freedom has been added".