Bord Gáis Energy Index

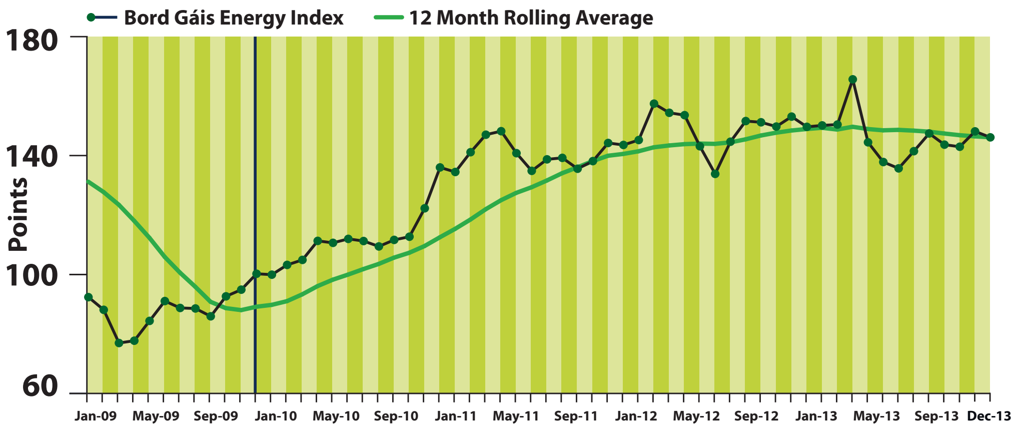
UNDERSTANDING ENERGY

December 2013

Bord Gáis Energy

Record wind levels contribute to a fall in the wholesale electricity price for December as Bord Gáis Energy Index falls 1%

Bord Gáis Energy Index (Dec 31st 2009 = 100)



1 Mth -1% **3 Mth** 2% **12 Mth** -2%

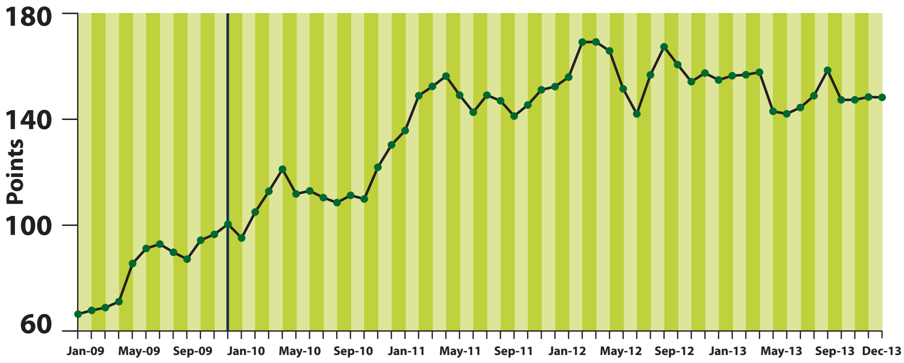
Summary:

The Bord Gáis Energy Index fell 1% in December due to a month-on-month fall in Irish wholesale electricity prices as a result of higher wind volumes.

Brent crude oil prices remained steady in December, albeit at relatively high levels. The outlook for 2014 is uncertain as growing non-OPEC supplies compete with geopolitical uncertainty to be the key price driver. OPEC will once again attempt to stabilise supplies and prices as they have done for the last couple of years. The monthly average UK Day-ahead gas price continued to rise in December but a continuation of mild weather, strong Norwegian supplies and a storage overhang could apply some downward pressure in the months ahead. In December 2013 the Index stood at 146.

As reported previously, despite a modest softening in the annual average price of Brent crude oil in 2013, prices remained at near record highs throughout the year. From Cairo to Baghdad commentary on 2013 has been described as "uniformly bleak". There is a growing view in the NAME region that the Arab spring has "split (Arab) nations into clashing sects and tribes…and the central struggle for (the Arab world) now is the one between Sunnis and Shias…and that we should admit that we Arabs no longer want to live together". These tensions have been evident from Iraq to Syria and beyond in 2013 and this has maintained oil prices at record highs in 2013. As concerns grow that Iraq is once again on the brink of sectarian war it is reasonable to assume that there will be further oil supply concerns in the year ahead. Oil prices may also be supported by an expanding global economy in 2014. Led by the US, growth prospects for the rich world are looking better and in this context the IMF is expected to raise its forecast for global growth. US President Barack Obama has said 2014 will be a "breakthrough year" for the US economy which is the world's largest consumer of oil. However, as America's economy gains strength it could aggressively adjust its bond-buying programme which in turn could impact negatively on major emerging market economies that are the driving force behind global oil demand growth. In addition, according to some analysts, ample oil supply, boosted by the US shale revolution, will exert pressure on crude oil prices in 2014.

Oil Index



1 Mth 0% **3 Mth** 1% **12 Mth** -4%

*Index adjusted for currency movements.
Data Source: ICE

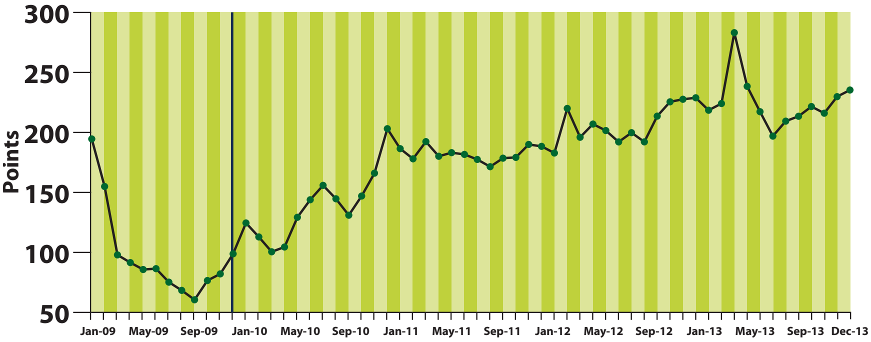
Oil

Month-on-month the front month Brent crude price was little changed as events in Libya continued to dominate price behaviour in December and support prices.

In the short-term Libya remains one of the key OPEC suppliers to watch in 2014. Protests and sit-ins at key Libyan oil infrastructure (particularly in the east of the country) have caused production to slump to lows of around 200,000 barrels a day and have cut exports to a trickle. Before the protests and strikes began in earnest in May, Libya was producing close to capacity, at around 1.4 million barrels a day. Rebels demanding more autonomy for the Cyrenaica region have ordered blockades of key Eastern ports with a combined export capacity of 740,000 barrels a day. In the west of the country it has been reported that some exports have been made out of the port of Mellitah during December. Brent crude oil prices softened in early January from US$111 to US$108 following news that the major Sharara field in the west of Libya restarted. The recovery of Libya's oil production seems to be taking place in the west and production in 2014 is expected to average about 650,000 barrels a day. However, eastern production could remain 'shut-in'.

Global oil supply concerns were not limited to Libya during the month as violence and militant conflicts on the back of ethnic divides have re-emerged in South Sudan and have pushed the country close to civil war. It has been reported that rebels have taken control of oil production in the Unity state but the majority of South Sudan's production in the Upper Nile state remains under government control. According to Goldman Sachs, a full-blown civil war involving Sudan would put at risk 360,000 barrels of oil. Violence has again erupted in Iraq following the taking of two key cities in Iraq's Anbar province by Al-Qaeda-linked fighters and Sunni tribes. Sunni Arabs have long complained of discrimination by the Shia-led government. The concern is that the loss of two cities would embolden militants and disgruntled Sunni communities and threaten the unity of Iraq. News from the US is somewhat counter-balancing these supply concerns as it emerged that US oil production reached its highest level in 25 years in November, hitting an average of 8 million barrels a day. The EIA expects oil production to reach 8.5 million barrels a day this year as output from the Bakken, Eagle Ford and Permian grows. According to one analyst "forget the Fed and the politicians in Washington..the real hero of the US economy in 2013 was the US energy industry that single handily helped inspire an economic comeback". Cheap energy, years of wage restraints and a relatively weak Dollar has made the US competitive again. In December the US Federal Reserve took the first step toward the exit from its stimulus programme as it reduced the monthly pace of asset purchases to US$75 billion. This could temper oil prices if geopolitical tensions were to ease. However, this could be offset by better-than-expected global economic growth powered by the US in 2014. If this growth materialises it will support prices as oil demand and equity prices are stimulated.

Natural Gas Index



1 Mth	2%	3 Mth	6%	12 Mth	3%

*Index adjusted for currency movements.
Data Source: Spectron Group

Natural Gas

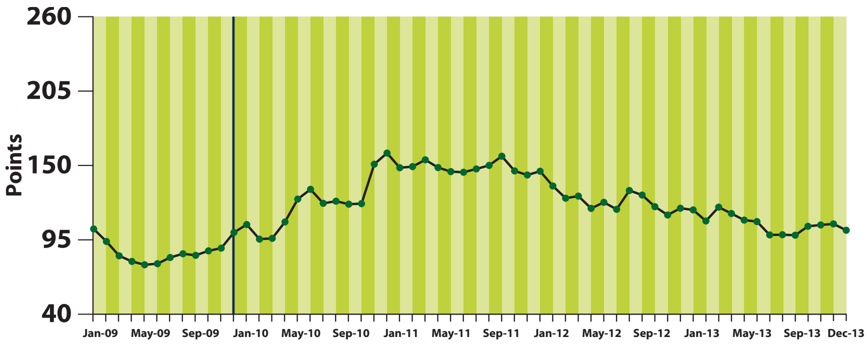
In euro terms, the average Day-ahead gas price for November was 2% higher month-on-month with a short period of colder weather in early December driving up demand and the average monthly price.

The average Day-ahead gas price for December was 69.26p a therm. As discussed last month, for relatively normal conditions (there were no significant issues with supply and temperatures over the month of December were not extreme) an average of close to 70p a therm is high. Indeed, the December 2013 price was the third highest average monthly price recorded by the Bord Gáis Energy Index. Last month we questioned whether the recent upward trend is a temporary phenomenon or whether 70p a therm is the new normal. From the evidence of December it suggests that a Day-ahead price close to 70p a therm can be expected in the short-term.

A bonus of elevated wholesale prices in November and December has been strong Norwegian flows to the UK at the expense of neighbouring hubs. Norway has provided much of the UK's flexibility so far this winter. Strong Norwegian supplies and very mild and windy weather in recent weeks has meant that UK storage levels are now healthy heading into the final three months of winter 13/14. Robust supplies, a storage overhang and continued mild weather could combine to put significant downward pressure on prices in the weeks and months ahead if demand were to remain below seasonal norms. This combination would seriously challenge what could turn out to be the fragile new norm of 70p a therm. LNG supplies to the UK remain anaemic but given that the system is adequately balanced, this has not been an issue so far this winter. On this front, milder weather in Japan and the return of South Korean nuclear capacity could result in an increase in the number of cargoes arriving into the UK.

UK Gas prices for summer 14, next winter and beyond also rose in December as movements in the prompt prices pushed prices higher. Looking ahead, if storage is not fully utilised this winter or if those levels are relatively strong or are forecast to be relatively strong at the end of March, the summer 14 price could weaken.

Coal Index



1 Mth	-4%	3 Mth	-3%	12 Mth	-13%

*Index adjusted for currency movements.
Data Source: ICE

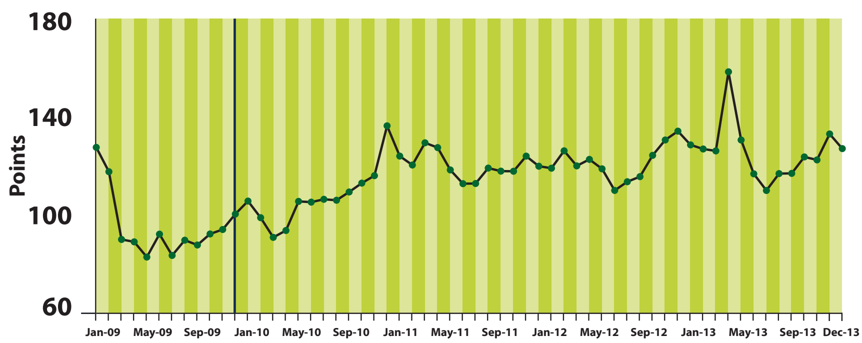
Coal

In euro terms the ICE Rotterdam Monthly Coal Futures contract was 4% lower month-on-month.

European prices were steady around $85/mt for most of December due to fears that exports from US-based Drummond's Colombian operations would be stalled as the producer was not able to complete its terminal's conversion to direct loading by a stipulated January 1 deadline. Drummond is Colombia's second largest thermal coal producer. During the month it was not certain whether the Colombian government would grant an extension and European prices were supported on fear of a disruption to supplies. Reports of tighter Russian coal supply also supported prices due to a combination of the winter season possibly hindering loadings at ports, Russians covering domestic power production and a diversion of coal exports away from the European market to focus on the Pacific.

Toward the end of the month it became clear that the Colombian environmental ministry would allow the producer to continue exporting coal by loading ships temporarily using barges and prices softened and closed at $81.55/mt. European prices have been "plagued" by supply issues from Colombia throughout 2013 due to a couple of prolonged mine workers' strikes at the country's two largest thermal coal producers. Drummond also faced a temporary ban on its Colombian exports in February after it dumped coal into the Caribbean Sea to stop a coal barge from sinking in high swells in January 2013.

Electricity Index



1 Mth	-5%	3 Mth	3%	12 Mth	-1%

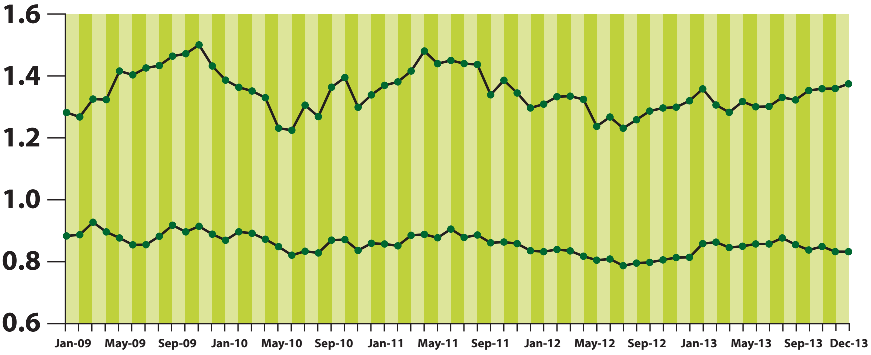
Data Source: SEMO

Electricity

In December the monthly average Irish wholesale electricity price fell by 5% month-on-month despite a 2% increase in the wholesale cost of Day-ahead gas. The reason for the fall was attributed to lower 'clean sparks' in December (the 'clean spark' is the theoretical gross margin of a gas-fired power plant from selling a unit of electricity, having bought the fuel required to produce this unit of electricity and the cost of abating the carbon emitted). Month-on-month the average 'clean spark' fell dramatically by 50%.

The December monthly average 'clean spark' fell with a decrease in the number of thermal plant starts and a reduction in demand due to milder weather and the Christmas period. A decrease in the number of thermal plant starts applied downward pressure on wholesale prices as fewer starts of large power plants fed through to lower overall wholesale costs. Another related and significant factor were higher and sustained wind volumes which forced expensive gas powered plants off the system and this provided additional downward pressure on wholesale prices. In December wind produced electricity met 24% of demand which was the highest monthly figure on record.

FX Rates



1 Mth	1%	3 Mth	2%	12 Mth	4%	EURUSD
1 Mth	0%	3 Mth	-1%	12 Mth	2%	EURGBP

FX Rates

Month-on-month the euro held steady against both the US Dollar and the British Pound. Global exchange rates in 2014 are likely to be heavily influenced by pressures to raise interest rates if global economic growth materialises as forecast.

During December there were further signs that the US economy is recovering strongly. Data showed that the economy had expanded at an annualised rate of 3.6% in the third quarter of 2013, to overtake the UK as the fastest growing advanced economy. The manufacturing sector grew at its fastest pace in more than two years in November and the service sector also expanded month-on-month. Major automakers reported their best US sales month in six and a half years (due in part to aggressive discounting). The US created 203,000 new jobs in November and the unemployment rate has fallen from 7.3% to 7%, the lowest since December 2008 just after the collapse of Lehman's. Retail sales expanded by an impressive 4.7% month-on-month in November and sales of new single-family houses recorded significant gains in October. Industrial production also grew in November at the fastest pace in a year. The achieved two-year agreement on a budget deal in December will also cut the fiscal squeeze to 0.5% of GDP this year (it was 1.75% in 2013) . Based on these and previous economic numbers, the US Federal Reserve has decided to reduce its monthly bond buying programme by US$10 billion to $75 billion in January 2014. Looking ahead, US household and corporate balance-sheets are in good shape and America is competitive (due in part to cheap energy and the shale boom) and these factors will support continued growth in 2014. As American businesses and consumers spend, demand for goods and services from Europe and Asia will be supported.

The UK also saw a number of positive economic releases with the Office for Budget Responsibility increasing its 2014 growth forecast from 1.8% to 2.4%. According to the PMI surveys of the manufacturing, construction and services sectors, the UK economy remains on track for a strong final quarter of 2013. The Bank of England has described the housing market as moving from "stall speed to warp speed" and manufacturing output rose 2.6% in October, the fastest in two and a half years. However, with the deficit remaining stable and exports drifting lower, there are concerns that the recovery is consumer driven.

As the Fed and the Bank of England grapple with expectations of higher interest rates, the ECB is concerned about deflation but stressed that it is ready to act to preserve price stability and stimulate growth.

Market Outlook

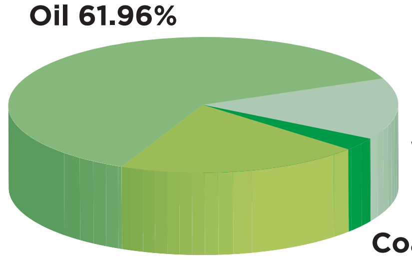
For OPEC producing countries, $110 a barrel has been described as 'the right price' and prices should stay around this level for the first six months of 2014 if there are no fresh restrictions or threats to global oil supplies in the months ahead. However, the potential return of Iranian and Libyan supplies and advances in non-OPEC supplies due to the ongoing shale boom in the US, could result in an oversupply in the oil market which could apply some downward pressure in the second half of 2014. However, OPEC has indicated that $100 a barrel is their 'base price' so consumers are unlikely to see a significant drop in the US Dollar price of oil in 2014. If oil prices do trade in a stable range of between $100 - $110 a barrel, a key factor for euro-zone buyers of oil will be the performance of the euro versus the US Dollar.

As global oil supplies could receive a substantial boost in 2014, OPEC has stated that they will continue to monitor the oil market very closely and that they will protect oil prices in 2014. OPEC has committed to provide the world with enough oil to satisfy its needs but only at a reasonable price. We can expect OPEC producing countries to produce 30million b/d in the first half of 2014 but if price stability is threatened, it is reasonable to expect a co-ordinated reduction in supplies. In 2014 we could see the first co-ordinated actions, albeit limited, by OPEC to tackle the potential threat posed by North American shale oil. According to Exxon Mobil, the world's biggest energy company by market share, oil production from North American shale fields will outpace every member of OPEC except Saudi Arabia within two years. Exxon Mobile forecast that increasing US supply will soon overwhelm the capacity of domestic refineries and this will prompt the federal government to rethink its restrictions on crude exports. Shale, deep-water and oil-sands output together will be more than enough to replace declining supplies from older, onshore fields that were drilled decades ago.

Oil demand in 2014 is expected to grow by 1 million b/d with the growth being attributed to rising demand in Asia. According to OPEC, the biggest challenge facing global oil markets in 2014 is global economic uncertainty, with the fragility of the euro-zone remaining a cause of concern. Without GDP growth, oil demand in 2014 could suffer. Despite these concerns, OPEC expects global economic growth to increase to 3.5% from 2.9% in 2013 and that oil demand growth will mirror the economic improvement.

Re-weighting of Bord Gáis Energy index

Following the SEAI's 2011 review of energy consumption in Ireland, there was a 6.4% drop in overall energy consumption. Oil continues to be the dominant energy source with most of the oil used in transport and the remainder being used for thermal energy. For the purposes of the Bord Gáis Energy Index, the total final energy consumption in Ireland fell 1,089 ktoe (toe: a tonne of oil equivalent is a unit of energy, roughly equivalent to the energy content of one tonne of crude oil) between 2009 and 2011. This fall was made up of a 1,022 ktoe drop in oil consumption (down 13.5%), a 20 ktoe drop in natural gas (down 12.6%), a 7 ktoe drop in electricity (down 0.3%) and a 40 ktoe drop in coal (down 10.98%). The Bord Gáis Energy Index has been re-weighted in January 2013 to reflect the latest consumption data. The impact has been minimal and has resulted in slight reductions in the share of oil and gas and a slight increase in the weighting of electricity in the overall Index.



For more information please contact:
Fleishman-Hillard — James Dunny — 086 388 3903
Bord Gáis Energy — Aoife Donohoe — 087 773 3344