PLYMOUTH CITY COUNCIL

Subject:	Procurement of the Council's energy requirements
Committee:	Cabinet
Date:	11 September 2012
Cabinet Member:	Councillor Lowry
CMT Member:	Adam Broome, Director for Corporate Services
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Ref:	
Key Decision:	Yes
Part:	I

Purpose of the report:

- To inform Cabinet about Plymouth City Council's options for energy procurement
- To obtain Cabinet approval for energy hedge buying as part of a public buying organisation's portfolio
- To obtain Cabinet approval for energy procurement, in-advance-of, and within-the usage period
- To rescind delegated authority for energy procurement

Corporate Plan 2012 – 2015:

- The proposals in this cabinet report aim to provide value for communities by risk managing a major area of council expenditure.

Implications for Medium Term Financial Plan and Resource Implications: Including finance, human, IT and land

- In 2011/12, the council spent approx. £1.37 Million on metered electricity and £400,000 on metered Gas services. This excludes schools spend of £836,000 and £406,000 respectively. It also excludes unmetered street lighting (£1.49 Million) which is subject to separate procurement arrangements. As this is existing on-going spend, the implications on the financial plans are around mitigation of the risk of spend in a volatile energy market.

Other Implications: e.g. Child Poverty, Community Safety, Health and Safety, Risk Management and Equality, Diversity and Community Cohesion:

- The report addresses issues of mitigating the risk of a council spend of nearly £1.8 Million per annum through forward buying parcels of energy when wholesale market prices are advantageous

Recommendations & Reasons for recommended action:

1. To procure energy through a Government approved hedge buying scheme (tendered in accordance with public procurement regulations) for energy (Gas and Electricity) thereby spreading the risk of buying energy over time on the wholesale markets.
2. To procure energy both in advance of the period of use (PIA) and within the period of use (PWP) to be able to benefit from energy price fluctuations up to the point of usage.
3. To rescind delegated authority for energy procurement and bring it in line with the council's contract award procedures.

Alternative options considered and reasons for recommended action:

- Extending the current corporate contract for energy - this option was discounted as the financial benefits of hedge buying – especially within period – outweigh the performance of the current energy contracts.
- Fixing energy prices – this option was discounted as the volatility of the energy markets makes a fixed price strategy the most risky approach.
- Hedge buying in advance of supply period only – this option was discounted as it does not perform as well as buying energy within the supply period.
- Retaining delegated authority for energy purchases – this option was discounted as there is no time pressure to agree to market prices under a hedge buying scheme. Contract decisions can therefore follow the council's contract award procedure with authority vesting in Cabinet.

Background papers

Sign off:

Fin	mc1 213. 009	Leg	1536 5/MS	HR		Corp Prop	CJT/ 106/ 0808 12	IT		Strat Proc	
Originating SMT Member											
Have you consulted the Cabinet Member(s) named on the report? Yes											

1.0. **Introduction**

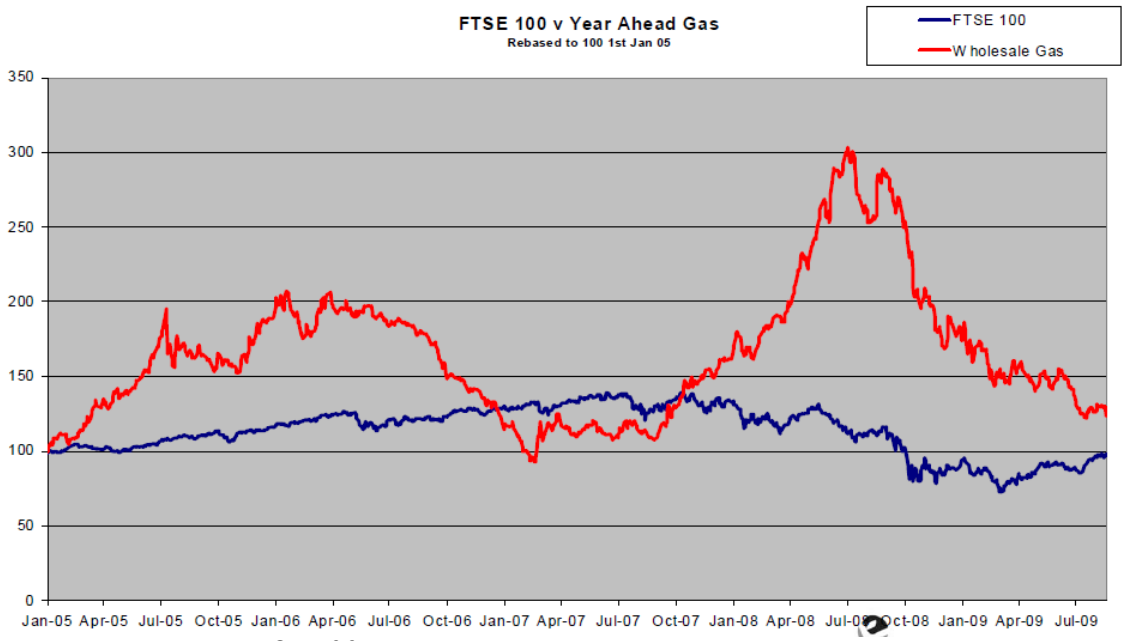
This report deals exclusively with the procurement of energy for Plymouth City Council and its schools Other initiatives regarding energy and carbon reduction, micro-generation, community energy, centralised utility management etc. are at various stages of design and completion and will – where required – be subject to separate requests for Cabinet approval.

Plymouth City Council procures the vast majority of its metered energy (corporate and schools) through a corporate contract with British Gas which is due to end on 31st March 2013. The Council now has the option of continuing to procure under the Corporate Energy Contract through a contract extension (up to three years) or to change to a different type of energy procurement. This report advocates a different route to market for electricity and gas that takes into account the need to manage the financial risk of energy buying in a volatile supply market.

1.1. Background

Energy Markets

Energy procurement is primarily concerned with the management of risk. Generators, Wholesalers and Buying Organisations aggregate demand for electricity and gas thus gaining access to the world's wholesale markets for energy. Unlike other markets, once wholesale access is obtained, the size of procurement has only a marginal influence on the commodity cost. Prices are affected by political, economic and structural components such as national and international generating and storage capacity, world energy demand, world political situations, availability of oil supplies, the price of crude oil etc. The market for energy is extremely volatile, responding not only to those factors but also providing opportunities for commodities traders. The graph below compares the Wholesale Gas Market between 2005 and 2009 with the FTSE 100 index, showing that it is significantly more volatile than the FTSE 100 index.



Energy market vs FTSE 100

Market volatility introduces significant risk for the energy buyer. Using the trend graph above, energy purchased on a fixed rate and for a fixed 3 year term during the period January 07 to July 07 would have saved considerable sums for the buyer. Likewise spot purchases made during this stage of the cycle can be advantageous as the market price is low. However, this strategy can also lead to very costly mistakes.

In 2008 Nottingham County Council entered a fixed energy deal for two years at the peak of a rising market which ended up costing the Council £14.8 Million due to the market price reducing to 50% of its previous value. Predicting rising and falling markets is extremely difficult given the nature of the global political and economic cost drivers.

In addition to the political, economic and demand uncertainties, the European Commission predicts that European businesses and consumers face at least 20 years of electricity price rises.

PCC Energy Usage
In 2011/12, Plymouth City Council and its schools spent in excess of £3 Million on energy.

Utility	Corporate Spend £	Corporate Spend £ (unmetered)	Total Corporate £	Schools £	Total £
Electricity	1,371,834	1,494,345	2,866,179	837,933	**3,704,112**
Gas	416,228		416,228	406,314	**822,542**
TOTAL by Business £	**1,788,062**	**1,494,345**	**3,282,407**	**1,244,247**	**4,526,654**

For Electricity and Gas procurement, the Council is part of a Devon wide collaborative procurement network (Devon Procurement Partnership), which has a corporate contract for metered electricity with British Gas. The vast majority of PCC users and schools are procuring through this contract. This contract allows for access to wholesale markets and allows the council to segment its procurement into parcels of energy. The contract was let in 2009, initially for a period of four years with the option to extend for a further three years. Day to day energy buying decisions are made by Devon County Council (under delegated authority) on behalf of all other participating authorities.

For the streetlighting (unmetered) requirements, Plymouth uses a Hedge buying contract with NPOWER via a Public Buying Organisation (Laser Energy Buying Group - Kent County Council). The street lighting contract (currently worth around £1.5m) is awarded until 2016 and does not form part of this cabinet paper.

1.2. Energy Procurement Options

There are three options for the procurement of PCC energy:

- Maintain the status quo – extend the corporate contract
- Fix energy prices for a given period (i.e. spot buy)
- Spread the buying risk over varying amounts and timeframes (i.e. hedge buy)

1.2.1. Option 1: Status Quo
Retaining the contract would mean that there is no cost of change as all sites will be serviced by existing suppliers. Current energy buying services are also carried out free of charge.

Drawbacks include the performance of the buying service which is not based on professional energy trading and has in the last financial year performed less well than Public Buying Organisations (PBOs).

The corporate contract has historically provided Plymouth City Council with the benefit of direct access to the wholesale markets. However, contract performance is unlikely to match that generated by hedging strategies and provides inferior risk management.

1.2.2. Option 2: Fixed Term Fixed Price
The second option is for the Authority to commission buy all its requirements in advance for one, two or three years based on a fixed 'spot rate' (price on the day of purchase). This option uses broker knowledge to determine the best day to fix the rate.

Timing the purchase is a very high risk strategy as the Council could be fixing its energy cost at a market high. In addition the broker service will incur a consultancy/tendering fee to the authority.

The size of the Council's energy requirements pose a further risk to this approach as access to wholesale markets depends on the size of the council's energy portfolio. In order to reach the necessary requirement the Council has to aggregate its core demand with its major schools. Should too many schools decide to procure individually, this would increase the council's energy costs considerably.

1.2.3. Option 3: Hedging
Hedging applies the benefits of risk management to the procurement of energy. Purchases are made when market conditions appear favourable; options are sold when they are not.

There are two hedging strategies: (a) Purchase In Advance (PIA) and (b) Purchase within Period (PWP).

(a) Purchase in Advance
This refers to purchasing all requirements prior to the start of the supply period. This approach ensures that PCC would have a fixed price at the beginning of the supply period with no reconciliations. The PIA approach has been used on PCC's last street lighting contract and allows for budget setting accuracy.

(b) Purchase Within Period
This refers to purchasing a percentage of the supply very close to the actual date of use, sometimes just a day ahead. PWP gives energy buyers more flexibility to monitor market developments. This can lead to lower prices and increased efficiency. However as the energy is not priced for the whole supply period, there will be fluctuations in energy cost throughout the financial year. Frequent reconciliations and re-pricing will make budget accuracy difficult to achieve and to mitigate uncertainly a financial tolerance needs to be held as a reserve in year 1. Should a saving be achieved, this can be drawn in to the reserve to meet future uncertainty. PWP is used on the current streetlighting contract.

Using a PBO framework contract not only ensures full compliance with UK Procurement Regulations but also complies with the council's Financial Regulations and Contract Standing Orders.

1.3. Risks and Benefits

Best Practice

The Pan-Government Energy Project was initiated in 2007 as part of the HM Treasury transforming Government Procurement (TGP) initiative to introduce contracting strategies for electricity and gas that adopt best practice in energy purchasing. Energy hedging strategies were

selected to apply risk management principles to the procurement of energy, thus spreading the financial and risk exposure for participating organisations.

By 2010, the collaborating organisations collectively represented over 70 per cent of total public sector spend, which totalled £2.8bn on gas and electricity in 09/10. As a result, the project achieved aggregation into accredited delivery channels for over 90 per cent of central government. By August 2010 90% (393) of local authorities were using the recommended central buying solutions with documented savings in excess of £100 Million.

The Efficiency and Reform Group (ERG) within the Cabinet Office has verified the savings achieved by public buying organisations (PBO) using purchase in advance (PIA) and purchase within supply period (PWP) hedging strategies. PIA products outperformed the average energy market price by 7% and its PWP products by 20%.

PCC internal benchmarking between its corporate contract and its hedged streetlighting procurement showed a cost avoidance of 5% on hedged contracts compared with its corporate contract performance.

External benchmarking of the corporate contracts also showed a significant potential for further savings.

The utility markets are volatile and any savings / cost avoidance projections of this proposal carry a large degree of inherent uncertainty. However, the initiatives proposed form part of a coordinated and best practice approach to the procurement and management of utilities. This approach has generated savings and cost avoidances in other local authorities (e.g. Birmingham £4.7 Million, Cannock Chase DC £185,000, Worcester CC £125,000 and Gloucestershire CC £1 Million - all per annum).

In addition, joining a PBO's hedging portfolio removes the need for individual energy procurement decision from the authority. It is therefore no longer necessary for PCC to be able to speedily respond to market conditions, thus removing the need for the decision on energy buying to be delegated. Award decisions remain in accordance with the council's constitution.

Energy Mutual

The council is currently investigating plans to reduce Plymouth residents' energy bills through a local buying arrangement (buying clubs) led by an Energy Mutual.

No adverse effects on these buying clubs can be foreseen from adopting a hedging strategy for the council's corporate energy procurement for the following reasons:

1. The Energy demand profile and size of supply required for individual sites for PCC and households are fundamentally different. The council's energy demand occurs primarily during working hours with lesser demand in the standard "peak times" of early morning and early evening (when electricity prices are highest). This shape of the "demand curve" has a strong bearing on the overall price of electricity. Private demand occurs primarily at times when householders are at home, i.e. early/mid-morning and evening. It would be unlikely that both demand curves can be combined into one basket therefore making aggregation improbable. Therefore these two very different types of energy supplies would have to be tendered as two separate 'baskets'; thus no bulk purchase benefits would be achieved.

2. There are concerns around risk and liability should the authority chose to procure on behalf of householders. If the Authority did buy on behalf of households it could become ultimately responsible for household energy outstanding bills, additions and changes to the contract. This would incur a substantial financial and legal risk and administrative workload. It would be difficult to predict and indeed control demand of households, which enter into and leave energy supplies much more frequently than the Council. There would also be concerns about the commitments households would have to make to stay on the contract which might deter residents from joining scheme.

3. There are further concerns around combining public and private spend on energy as this would impose much tighter (European procurement rules) constraints on the private spend leading to significant reduction in flexibility and ability to negotiate.

4. In addition there are existing contracts and frameworks (incl. hedging) available to the council which are not available to the domestic sector. On the other hand domestic clients can benefit from special regional or national offers (e.g. Together Cornwall, U-switch etc.), which are not available to corporate organisations. Aggregating demand would therefore preclude both the residents and the council from benefitting from any of these offers.

In summary, aggregation between Plymouth households and the council is not beneficial to either party. As a result, to date, no known buying arrangement has been set up where a local authority has combined their demand with the local residents

However, the Council can play a role in facilitating a local energy buying club under the Energy Mutual banner. Models whereby Councils facilitate negotiations on behalf of householders without themselves entering into a contract are used throughout the country, and abroad. Here are some examples:

- Tower Hamlets Council www.towerhamlets.gov.uk/energy
- Brighton CC http://www.brightonenergy.org.uk/buying-club/
- Going Dutch' http://www.nlgn.org.uk/public/wp-content/uploads/Going-Dutch.pdf

1.4. Recommendations

It is recommended:

- not to extend the current corporate contract beyond March 2013 as the contract has shown its limitations in terms of risk management and ability to generate savings
- to procure the council's energy through a public buying organisation's hedged portfolio for the duration of the PBO's current framework contracts (not to exceed 4 years).
- to procure the council's energy requirements both within and in advance of supply period(PWP and PIA)
- to rescind delegated authority for energy procurement decisions to comply with the council's contract award process.