

Energy Price Risk Management

Managing budget risk and cost competitiveness

Ger Fullam: Energy Ireland Conference: 7 October 2010

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Who we are and what we do



Market leaders in Ireland in energy procurement and risk management

Delivered client savings > €50 million in 2009

Service providers to 5 of Irelands top 10 energy users

Service providers to global leaders in I.T. and Pharma sectors

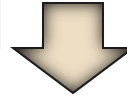
Working with industrial, commercial and public sector clients

The purchasing dilemma



Budget risk

Market risk: Cost competitiveness



Relative priority of budget risk versus cost competitiveness

Contract options: Fixed price, indexed or flexible contract

Easy to fix prices and set budget at same time: But what if prices fall?

An indexed contract will link you to the market: But what if prices rise?

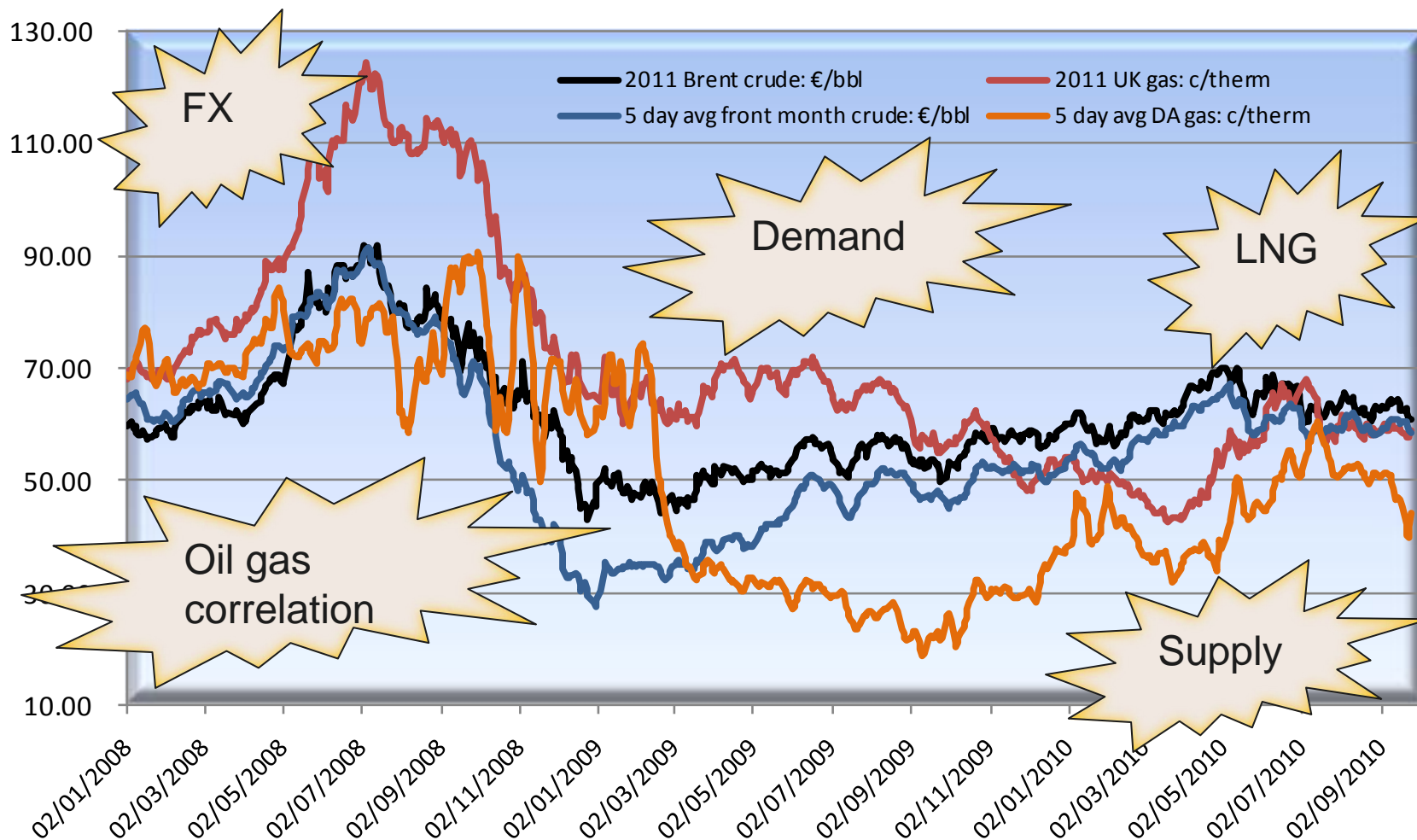


A flexible contract: Protection in a rising market and opportunity in a falling market through fixing and unfixing of forward positions

Understand and quantify your exposure

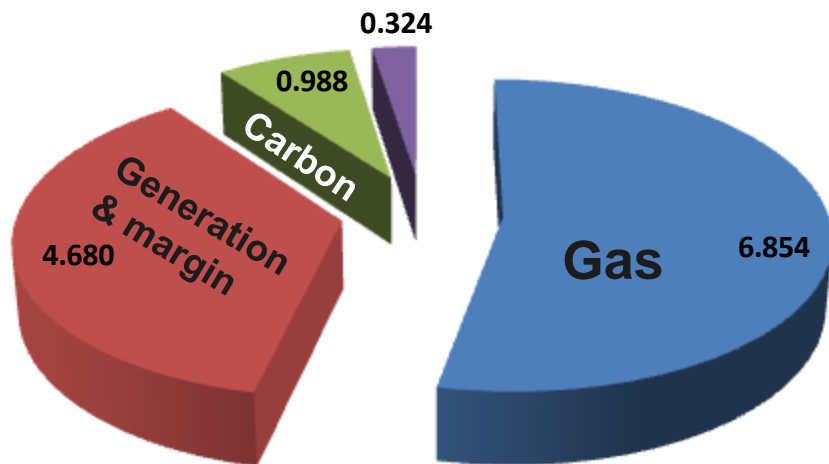
- Wholesale energy markets
- Irish electricity price variability
- Market relativities: Cost competitiveness

Wholesale oil & gas prices: highly volatile



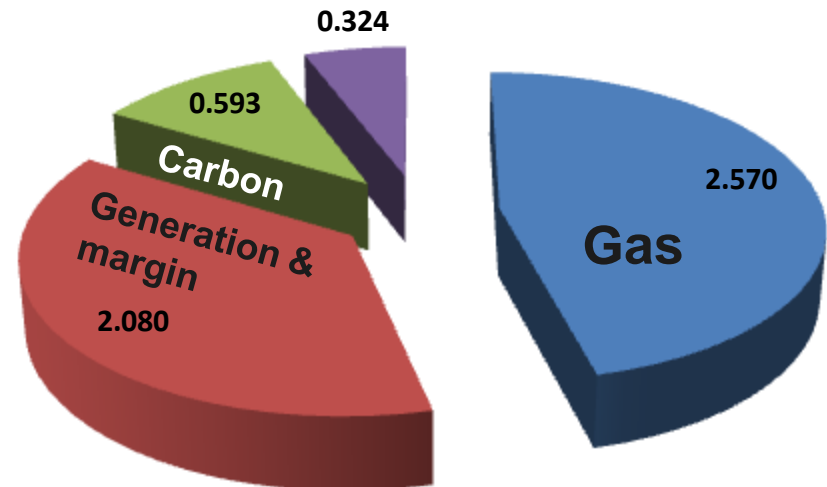
Electricity price variability

High price scenario: 12.85 cent/kWh



- Wholesale gas at **80** pence/therm
- Generation & retail margin @ **€45**/MWh
- Carbon at **€25**/tonne
- UoS charges, levies, rebates at 1/10/10 rates

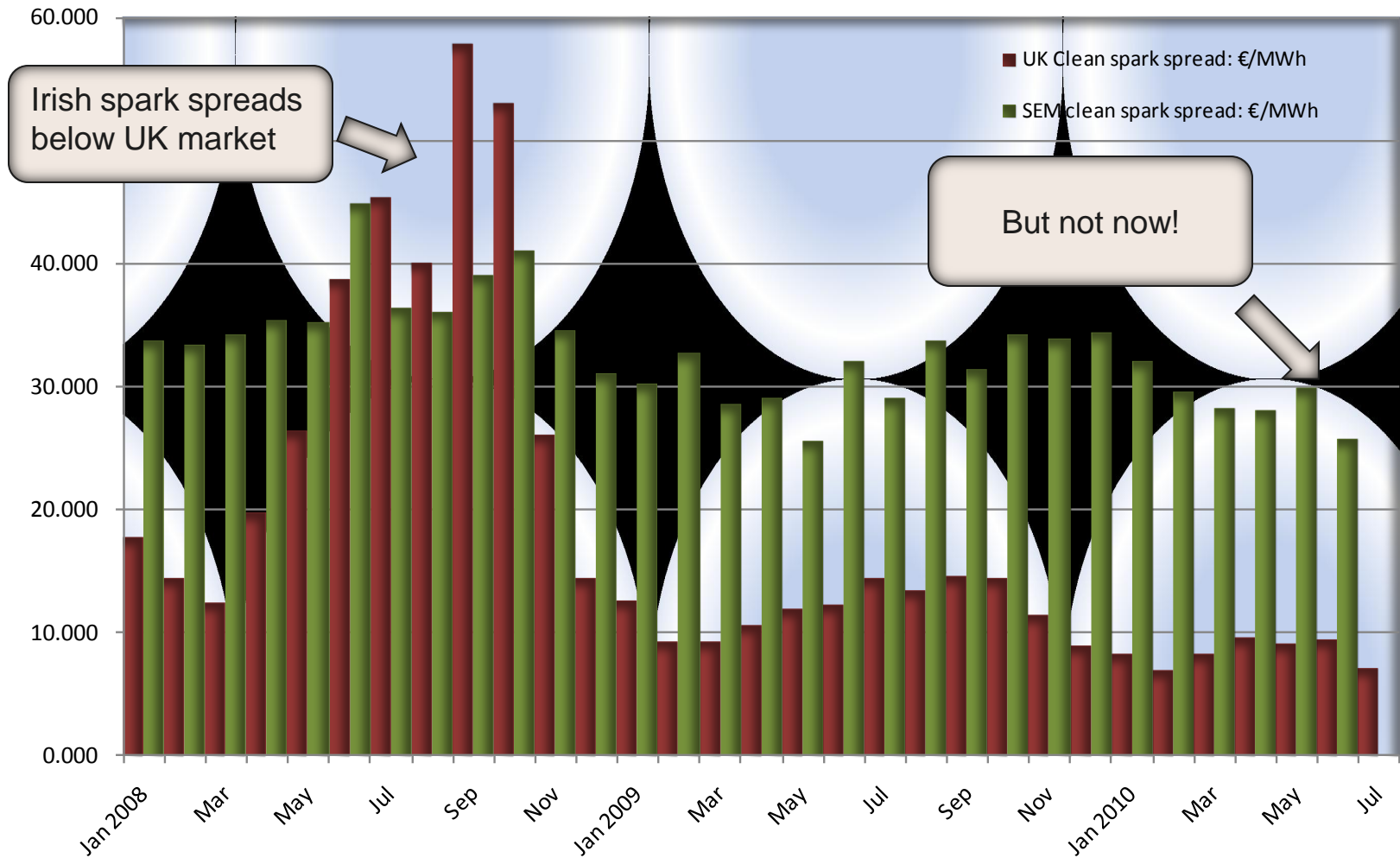
Low price scenario: 5.57 cent/kWh



- Wholesale gas at **30** pence/therm
- Generation & retail margin @ **€20**/MWh
- Carbon at **€15**/tonne
- UoS charges, levies, rebates at 1/10/10 rates

Basis: Medium Voltage site: Annual load factor > 80%

Market relativities change too



Your risk management strategy

- Strategy objectives
- Fixing and unfixing: A brief summary
 - Risk controls
- Purchase decision matrix
 - Strategy simulation

Risk management strategy objectives



- ❑ Balance management of budget risk and cost competitiveness
- ❑ Protection in a rising market (budget protection and protection of cost competitiveness)
- ❑ Enable achievement of lower prices in a declining market (cost competitiveness)
- ❑ Enable risk management over a longer contract duration
- ❑ Respond to ongoing changes in energy market dynamics

Why fix and unfix?



- ❑ Because energy markets rise and fall over time
- ❑ To achieve protection in a rising market without the need to commit to final prices (potentially at well above out-turn prices)
- ❑ Gas futures market tends to follow oil futures but gas at the point of delivery influenced by a wider range of factors
- ❑ Although buying short (month ahead / day ahead) delivers good results over time, the exceptions need to be managed... Nov and Dec 2005, Mar 2006, Summer 2008, Summer 2010....

Risk controls



- ☐ Written strategy
- ☐ Establish clear responsibilities
- ☐ Transacted volumes = forecast volumes
- ☐ Agree trade protocol
- ☐ Position reporting: MTM costs V budget & market
- ☐ Daily market analysis and reporting
- ☐ Strategy reviewed quarterly (minimum): Agreed procedure for amendments
- ☐ Bill validation

Plan in advance – sample purchase decision matrix

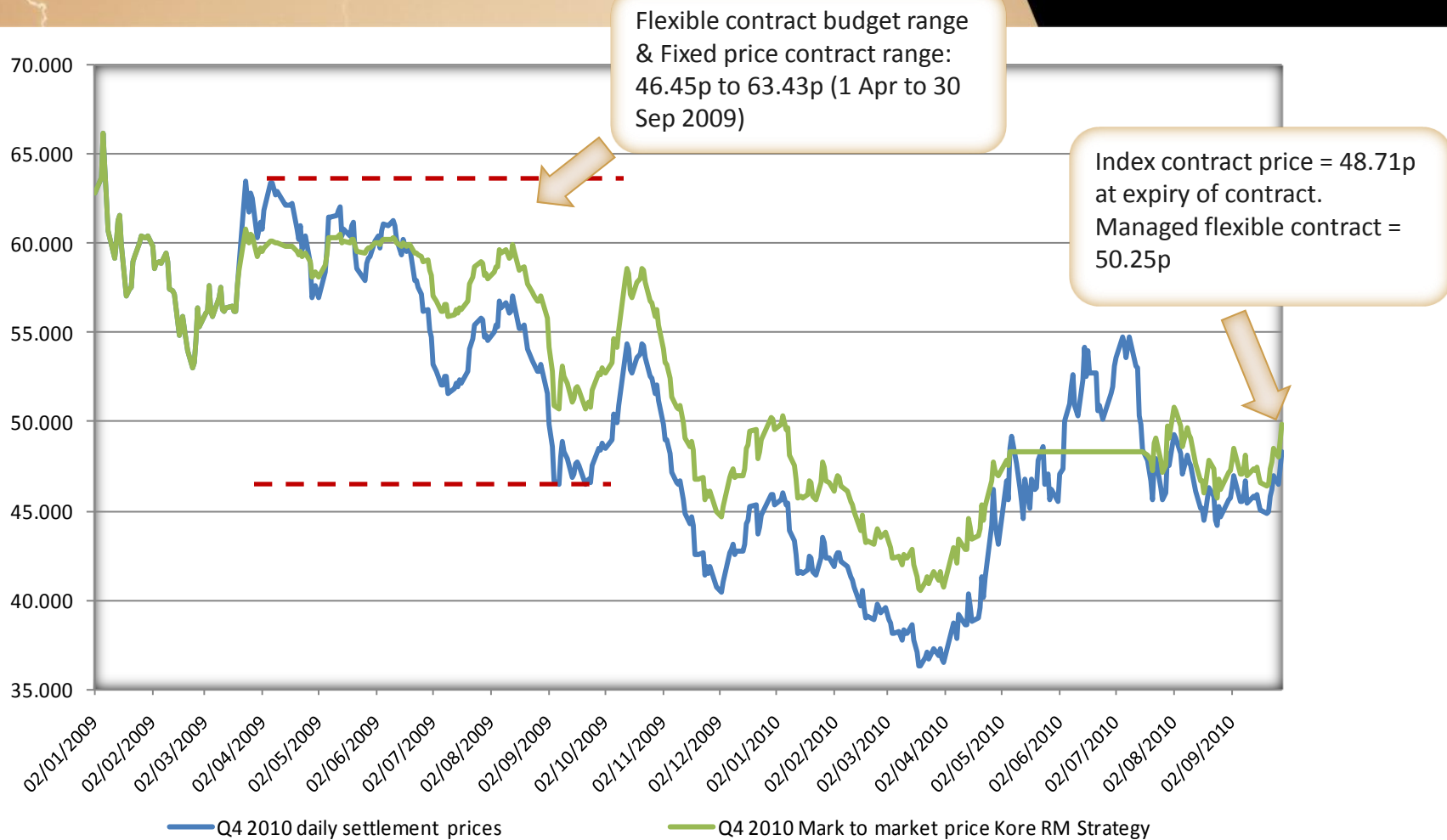


	Transaction trigger	Front 4 quarters	Next 4 quarters
1	Initial fixed position	XX% Winter, XX% Summer	XX% Winter, XX% Summer
2	Defined market trend 1, 2, 3 etc.	Fix XX% of period X	Fix XX% of period X
		Maximum XX% all quarters	Maximum XX%, all quarters
3	Defined market trend 1, 2, 3 etc.	Un-fix XX% of period X	Un-fix XX% of period X
		Unless condition 4 exists	Unless condition 4 and 6 exist
		Unless condition 5 exists	
4	Defined market trend 4 and price reference exists for front quarter	Minimum XX% fixed Winter, XX% Summer	
5	Defined market trend 5 and price reference exists for front month	Minimum XX% fixed Winter, XX% Summer	

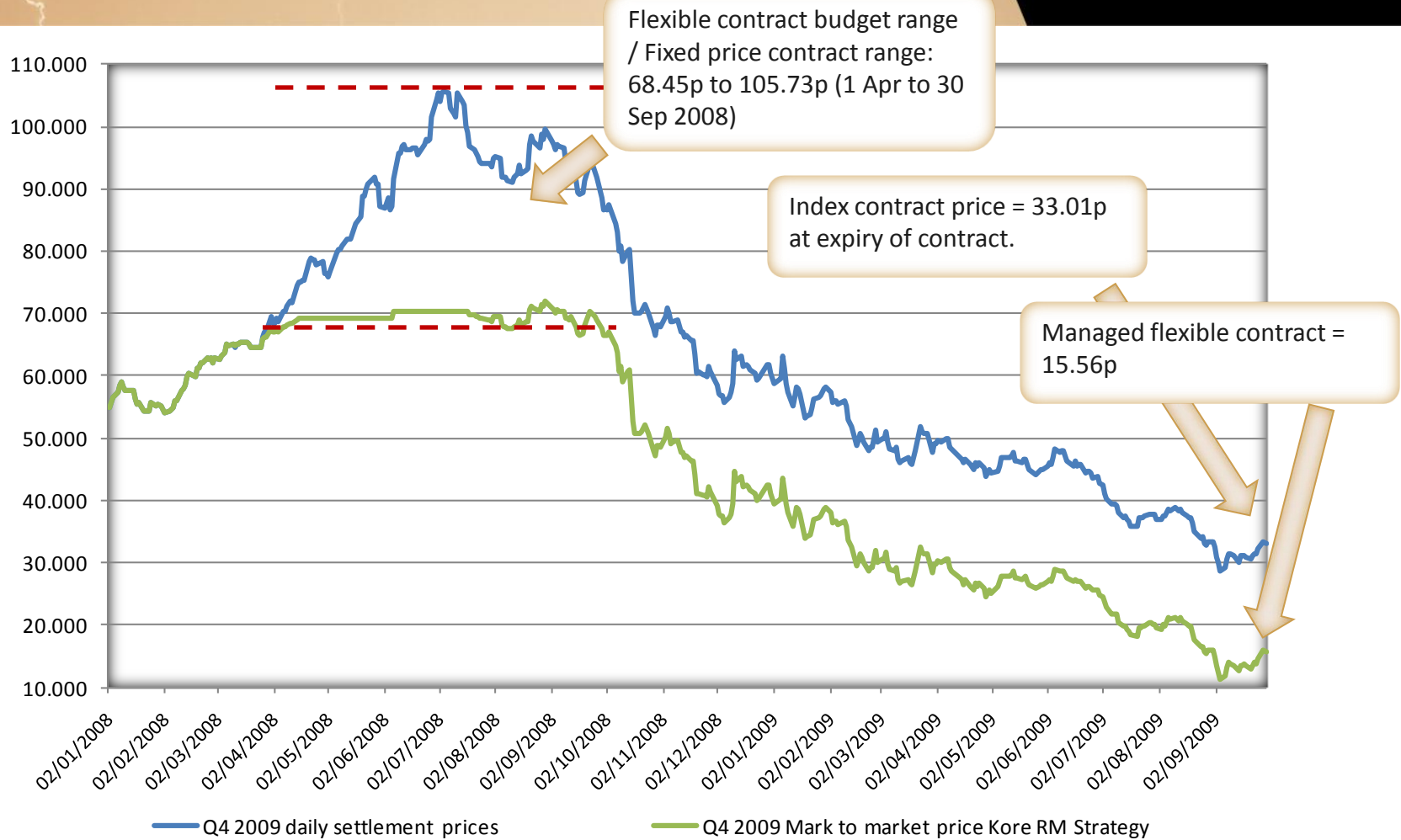
Strategy in practice

(Note: Base strategy, excluding initial fixed positions, positions taken in directionless market, target price triggers, etc.)

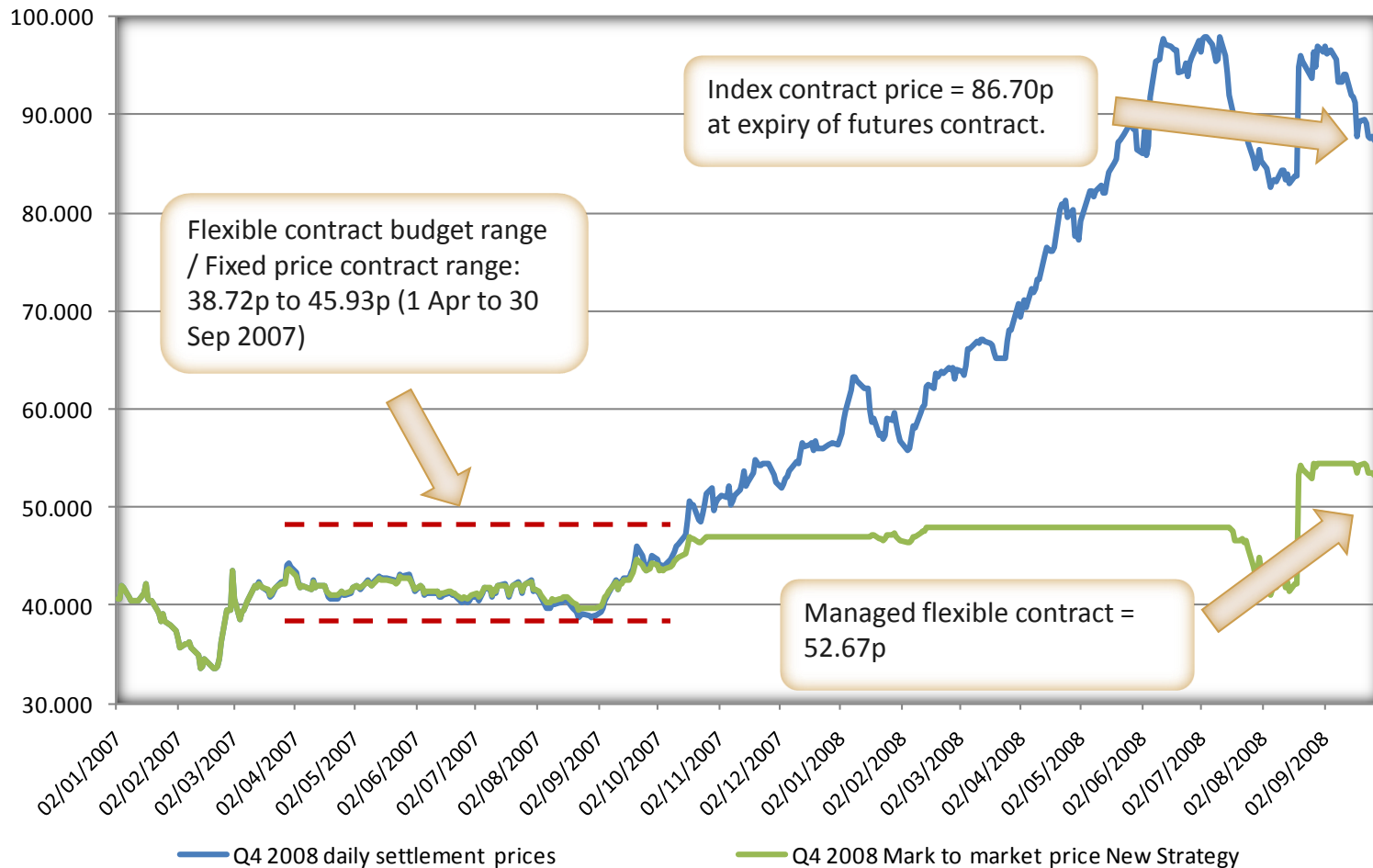
Q4 2010 gas: Sterling pence per therm



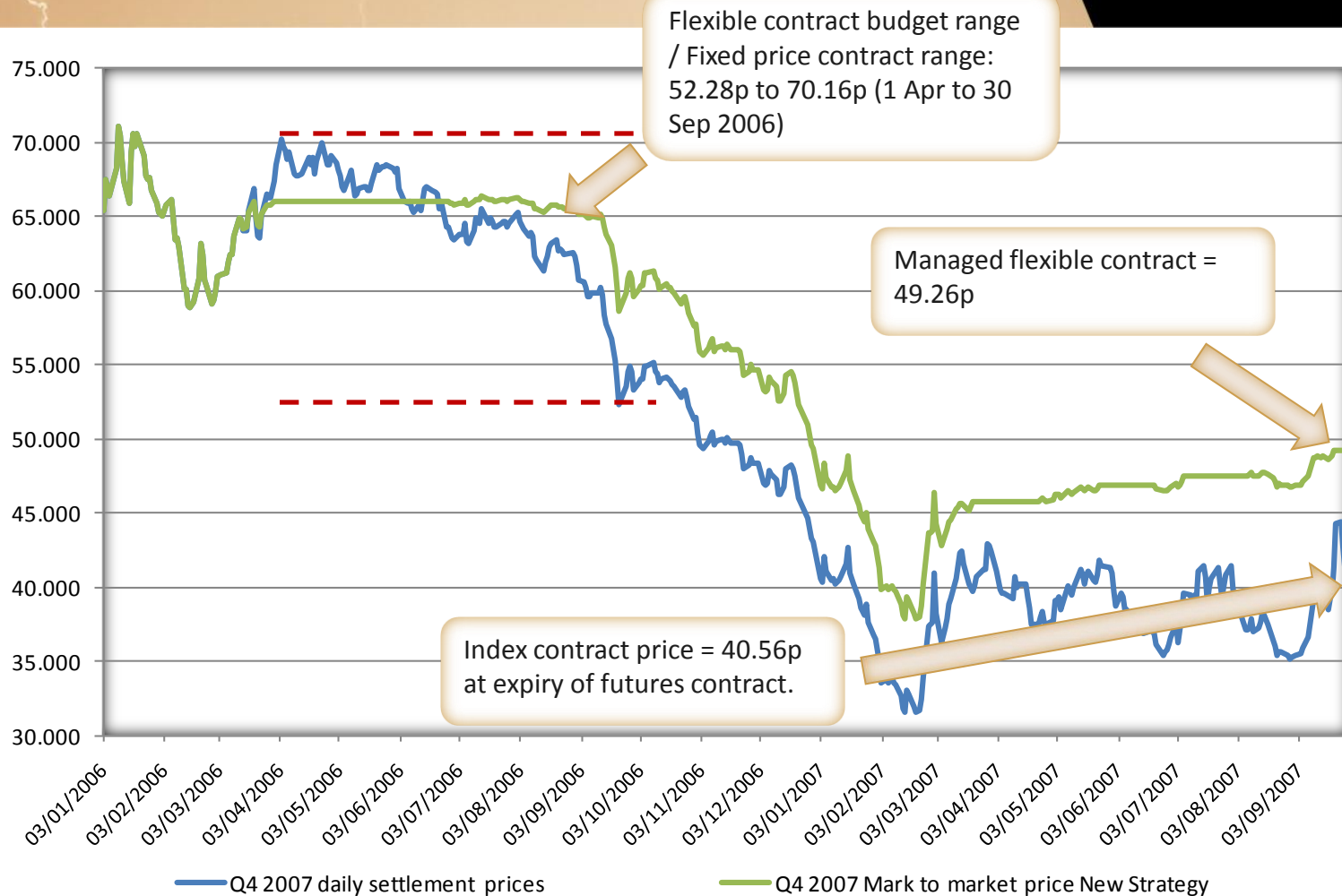
Q4 2009 gas: Sterling pence per therm



Q4 2008 gas: Sterling pence per therm



Q4 2007 gas: Sterling pence per therm



In summary



Essential to know the cost and benefit of alternative contract options

Understanding wholesale market price variability a key ingredient

Establish a clearly defined risk management strategy

Execute and review the strategy, adapting to market changes

Achieve competitive energy costs without forsaking budget certainty

Thank You!



Contact Us

Phone: +353 1 808 5555

Fax: +353 1 808 5554

energy@kore.ie

www.kore.ie