EirGrid Group
Customer Conference 2012
25th October 2012
Delivering the Power System of tomorrow

EIRGRID semo Single Electricity Market Operator SONI System Operator for Northern Ireland

Regulatory Update
Market Integration

EirGrid Customer Conference 25 October 2012

Dermot Nolan, Chairperson CER
SEM Committee Member

Agenda

- SEM Overview
- SEM Market Integration Project
- ACER's role
- Conclusions

Commission for Energy Regulation
An Coimisiún um Rialáil Fuinnimh

SEM 2007 -2016

Utility Regulator
ELECTRICITY GAS WATER

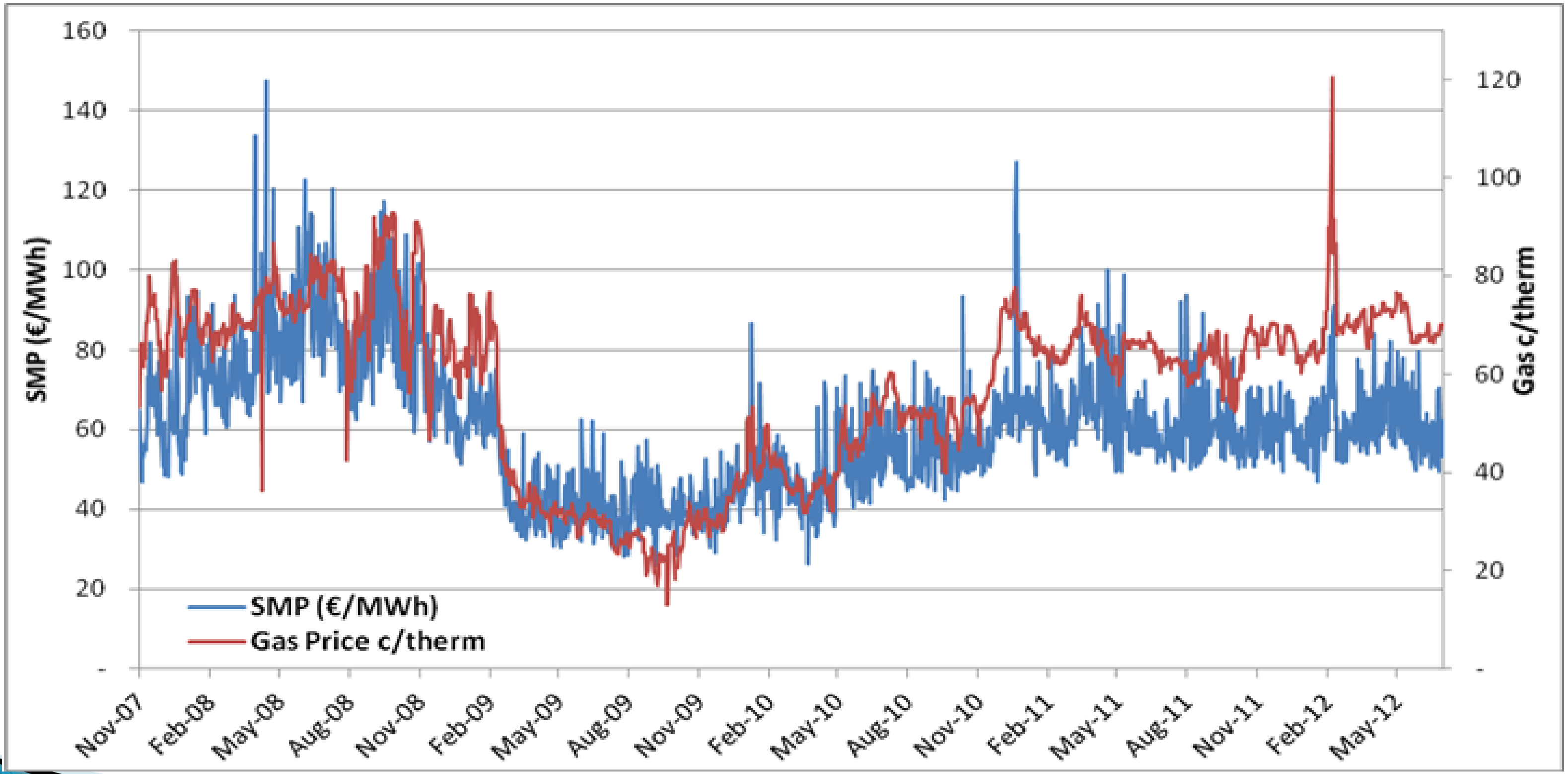
- All Island SEM wholesale market went live in November 2007
- Successful market with cost reflective prices, broadly judged to have met its objectives
- European Internal Market and new interconnection means SEM will change significantly by 2016
- SEM Committee – considering changes with Departments while protecting the long and short term interests of all island consumers
- Third Package and changes in GB mean that cross border cooperation with Ofgem on market issues will increase

SEM So Far

- The SEM's record so far:
  - Cheapest generators being run on island where possible, with SMP efficiently tracking fuel inputs
  - Transparent SEM prices reflects long run marginal costs
  - Significant investment, increased renewables
  - Increased competition, market power mitigation strategy
  - Capacity Payments review, pot less volatile
  - Wind system facilitation – DS3
  - Intra-day trading from July 2012
- Integration into EU Internal Market planned by 2016

SEM Price

- Wholesale price, SMP, is circa 50% of overall electricity price
- SMP generally follows gas price, given gas accounts for c. 60% of generation



European Internal Market

- Uneconomic cross border flows have undermined EU energy policy goals of sustainability, competitiveness and security of supply – DG Comp Energy Enquiry ‘07
- In response, the EU adopted 3rd Liberalisation Package(2009):
  - Establishment of ACER and ENSTO-E,
  - Harmonisation of market rules to create European internal electricity market
  - Increase in physical cross border investment – infrastructure package
- The design of internal electricity market, known as the ‘Target Model’, requires:
  - Common forward markets
  - Day ahead European wide market coupling - single algorithm to calculate prices determining volumes and flows
  - Intra day trading up to one hour before real time and cross border balancing between TSOs
- EU Member States committed to delivering internal market in energy by 2014

European Target Model

Set out in the ACER Capacity Allocation and Congestion Management Framework Guideline:

Long-term allocation ← Day-ahead implicit auctions ← Intraday continuous trading ← Cross-border balancing

Zone delineation + Capacity calculation

How it works…

Common cross-border arrangements

The interaction between the two should encourage harmonisation

Diverse national arrangements

SEM and the European Internal Market

- EU Electricity Target Model agreed by ACER is not compatible with SEM in its current form

- In recognition of this, ACER agreement to provide a two year derogation for the island of Ireland to meet the Target Model

- Key differences between SEM and the Target Model are:
  - No firm day ahead prices in SEM
  - Complex bidding structure in SEM
  - No continuous intra day market in SEM
  - Long gate closure in SEM

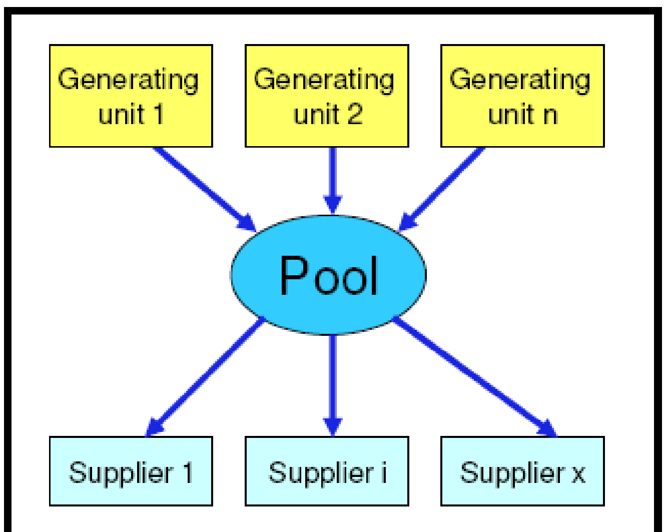
- In recognition of this SEM Committee published a Consultation on implementing the European Target Model in SEM, published January 2012

- SEM Committee Next Steps Paper due to be published by year end

A Fork in the Road
Central or Decentralised Market?

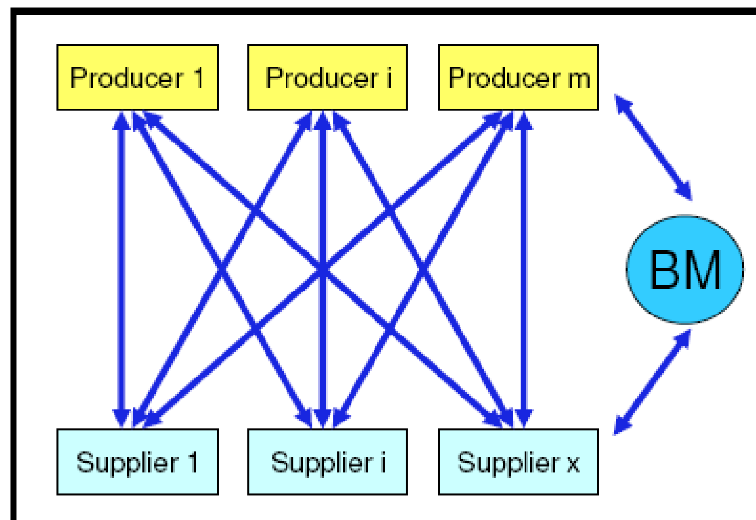
- Pool markets like most US markets, Italy and the SEM are centrally dispatched with TSOs deciding centrally on generator running order
- Decentralised markets like those in Britain, France and Germany are self dispatched with market players contracting bilaterally

SEM



Centralized pool

British Market



Bilateral contracts market

The Internal Market ACER's Role

- ACER is responsible for delivering the Internal Market. CER and UR input into ACER's work programme and review of internal market rules
- Under Third Package ACER has key role in:
  - producing Framework Guidelines in relation to each Network Code
  - reviewing ENTSO-E Network Codes to ensure they are in line with the Framework Guideline
- ACER also have important role in monitoring the Internal Market and progress to reaching 2014
- 2 year derogation from CACM for island of Ireland overseen by ACER

The Internal Market
ACER's Role

- **To date, ACER have adopted Framework Guidelines on:**
  - Grid Connection (20/07/11)
  - Capacity Allocation and Congestion Management (29/07/11)
  - System Operation (02/12/11)
  - Electricity Balancing (20/09/12)
- **ACER are currently reviewing the following Network Codes:**
  - CACM Network Code (Decision by end 2012)
- **ACER have called for improvements to the following Network Codes:**
  - Requirements for Generators Network Code(13/10/12)
- **In 2013, we expect to review:**
  - Forward Network Code, Balancing Network Code and 3 SO Network Codes

Conclusions

- SEM has generally met its objectives and delivered cost reflective prices.
- DS3 is a crucial work stream to delivering RES Targets
- Market Integration by 2016 is major policy driver. SEM Committee are considering Next Steps:
  - Market Integration Next Steps Decision paper including recommendations to DCENR and DETI to be published by year end
  - Reports on Central/Self Dispatch will also be published
- Pending above publications, project phase 2 will commence in November to coincide with sending roadmap to ACER
- Should coincide with start of Ofgem parallel project on integration
- ACER involvement is critical to success of meeting Target Model