Quarterly Imperfections Costs Report

1st January 2014 - 31st March 2014

Costs [1] (€m)	2013/2014 YTD Outturn €m	2012/2013 YTD Outturn €m	2013/2014 Q2 only €m	2012/2013 Q2 only €m
Dispatch Balancing Costs (DBC)	111.7	67.6	56.1	37.4
Make Whole Payments	1.4	0.0	0.6	0.0
Energy Imbalance	-0.3	-4.6	0.1	-1.3
Other System Charges (OSC) [2]	-3.4	-3.4	-1.7	-1.3
Imperfections Costs Outturn	**109.4**	**59.6**	**55.1**	**34.8**
Imperfections Costs Forecast [3]	73.4	61.7	36.3	30.5
Variance: Forecast Vs. Outturn	**-36.0**	**2.1**	**-18.8**	**-4.3**
Variance % [4]	**-49.0%**	**3.4%**	**-51.8%**	**-14.1%**

Key Points

- The Imperfections Costs Forecast are included in the table above on a flat line basis[3] which assumed zero payments for both OSC and Energy Imbalances.
- The Imperfections Costs Outturn are subject to fluctuation dependent upon power system conditions and will vary significantly within the year relative to this flat line forecast. The differing power system conditions and external conditions (for example system demand) need to be taken into account when comparing quarterly periods and year to date figures.

YTD 2013/2014

- Imperfections Costs Outturn 49.9% over the Imperfections Costs Forecast[5].

Key Factors Affecting Imperfections Costs	Forecast Assumptions for TY1314 [6]	Actual TY1314	Impact [14]
Reserve Policy and TCGs[7]	Primary & Secondary Operating Reserve 75% LSI[8] TCG data as per submission	No Reserve Policy change from forecast. Change to the Dublin TCG was implement in March which resulted in DBC reduction for a short period over the quarter.	→
Reserve Provision	Data as per submission	There have been no significant changes to reserve provision. Static reserve provision from STAR sites decreased for a period during March.	→
Regulatory Policy Changes	Data as per submission	No change from forecast	→
System Demand	Data as per submission	System demand was slightly lower than forecast but did not have a significant impact on DBC over the quarter.	→
Forced Generation Outages	Data as per submission	Average actual rate (Q1): 10.5%[9]	→
Scheduled Generation Outages	Data as per submission	Generator outages had a minimal impact on DBC in the quarter.	→
Forced Transmission Outages	No outages forecast	No significant outages	→
Scheduled Transmission Outages	Data as per submission	No significant outages	→
Commercial Offer data - Fuel Costs & Carbon[10]	Data as per submission	Gas CCGT[11] c.14% Higher Gas OCGT[12] c.19% Higher Coal c.12% Higher Oil c.5% Higher Significant increase in some out-of-merit CCGT units with substancial impact on DBC	↑
Wind Variability	Data as per submission	Installed Capacity at period end: 2460MW[13] Capacity Factor: 42%[13]	↑

Mitigation Measures

The following are a list of mitigation measures undergoing review to seek to manage Imperfection Costs:

1. Daily review of Non-Compliances / Performance Monitoring events e.g. Trips;
2. Weekly review of Imperfections costs and drivers;
3. Ongoing review of Reserve Policy and TCGs [7];
4. Flexibility services as required; and
5. Grid Code review and modifications.

Notes

[1] Costs are actual initial settlement figures. There may be variations in the final figures as a result of resettlement or regulator approved derogations.

[2] Other System Charges amounts as published: http://www.eirgrid.com/operations/ancillaryservicesothersystemcharges

[3] Imperfections Costs Forecast is weighted for TY1314: 44% of total for Q1 and Q2, 56% of total for Q3 and Q4.

[4] Positive value indicates under forecast, Negative value indicates over forecast.

[5] Imperfections Cost Forecast includes forecast for Make Whole Payments. Make Whole Payments are not subject to the incentive process

[6] Forecast is over an annual time horizon. Information and figures are for this period unless otherwise stated. Forecast assumptions are published at: http://www.allislandproject.org/GetAttachment.aspx?id=0fc05d3e-c84e-4de8-8c35-254f681b2b8f

[7] TCGs mean Transmission Constraint Group or Operational Constraints as published at:
http://www.eirgrid.com/media/OperationalConstraintsUpdateVersion_1_12_April2014.pdf

[8] LSI means the Largest Single Infeed which is used in the calculation of the system reserve requirement.

[9] Percentage availability is an average of the Ireland January to March figures. EirGrid Availability Reports are published at:
http://www.eirgrid.com/operations/systemperformancedata/availabilityreports

[10] Fuel and Carbon Costs forecast and actual performance data based on the average first offer Price from the Generator Commercial Offer Data (COD) for all units.

[11] CCGT: Combined Cycle Gas Turbine

[12] OCGT: Open Cycle Gas Turbine

[13] Figures published in All-Island Wind and Fuel Mix Summary Report at:
http://www.eirgrid.com/operations/systemperformancedata/all-islandwindandfuelmixreport/

[14] Increase from Forecast ⬆ Decrease from Forecast ⬇ No Change from Forecast ➡