

Appendix F: Indicative Results of Generator Output Reductions for 2012 & 2016



System Operator for Northern Ireland

INDICATIVE Generator Output Reductions 2012 and 2016

OCTOBER 2011



1 EXISTING 110KV NODES

1.1 GENERATOR OUTPUT REDUCTIONS AT EXISTING NODES.

Aghyoule Generation Node					
Results	2012	2013	2014	2015	2016
Potential Energy (Mwh)	202044	-	-	-	202044
Constrained Energy (Mwh)	245	-	-	-	3665
	7808	-	-	-	27344
	7817	-	-	-	27605
	3.86%	-	-	-	13.53%
	0.12%	-	-	-	1.81%
	3.87%	-	-	-	13.66%

Ballymena Generation Node*					
Results	2012	2013	2014	2015	2016
Potential Energy (Mwh)	14858	-	-	-	32688
Constrained Energy (Mwh)	0	-	-	-	0
	578	-	-	-	4456
	578	-	-	-	4456
	3.85%	-	-	-	13.63%
	0.00%	-	-	-	0.00%
	3.85%	-	-	-	13.63%

Carnmoney Generation Node*					
Results	2012	2013	2014	2015	2016
Potential Energy (Mwh)	3404	-	-	-	41319
Constrained Energy (Mwh)	0.00	-	-	-	0
	18	-	-	-	5590
	18	-	-	-	5590
	0.54%	-	-	-	13.53%
	0%	-	-	-	0.00%
	0.54%	-	-	-	13.53%

*Generation at this node does not contribute to system constraints contained in this analysis

Coleraine Generation Node					
Results	2012	2013	2014	2015	2016
Potential Energy (Mwh)	134696	-	-	-	89797
Constrained Energy (Mwh)	163	-	-	-	1629
	5206	-	-	-	12153
	5212	-	-	-	12269
	3.85%	-	-	-	13.53%
	0.12%	-	-	-	1.81%
	3.86%	-	-	-	13.66%

Drumnakelly Generation Node*					
Results	2012	2013	2014	2015	2016
Potential Energy (Mwh)	-	-	-	-	13769
Constrained Energy (Mwh)	-	-	-	-	0
	-	-	-	-	1863
	-	-	-	-	1863
	-	-	-	-	13.53%
	-	-	-	-	0.00%
	-	-	-	-	13.53%

Dungannon Generation Node*					
Results	2012	2013	2014	2015	2016
Potential Energy (Mwh)	44899	-	-	-	53878
Constrained Energy (Mwh)	0	-	-	-	0
	1735	-	-	-	7292
	1735	-	-	-	7292
	3.86%	-	-	-	13.53%
	0.00%	-	-	-	0.00%
	3.86%	-	-	-	13.53%

Enniskillen Generation Node					
Results	2012	2013	2014	2015	2016
Potential Energy (Mwh)	50586	-	-	-	95485
Constrained Energy (Mwh)	61	-	-	-	1732
	1955	-	-	-	12922
	1957	-	-	-	13046
	3.86%	-	-	-	13.53%
	0.12%	-	-	-	1.81%
	3.87%	-	-	-	13.66%

*Generation at this node does not contribute to system constraints contained in this analysis

Killymallight Generation Node					
Results	2012	2013	2014	2015	2016
Potential Energy (Mwh)	88155	-	-	-	254738
Constrained Energy (Mwh)	100	-	-	-	4621
Curtailed Energy (Mwh)	3221	-	-	-	34473
Constrained & curtailed Energy (Mwh)	3225	-	-	-	34802
Curtailment (%)	3.65%	-	-	-	13.53%
Constrained (%)	0.11%	-	-	-	1.81%
Constraint & Curtailment (%)	3.66%	-	-	-	13.66%

Larne Generation Node*					
Results	2012	2013	2014	2015	2016
Potential Energy (Mwh)	44899	-	-	-	44899
Constrained Energy (Mwh)	0	-	-	-	0
Curtailed Energy (Mwh)	1735	-	-	-	6076
Constrained & curtailed Energy (Mwh)	1735	-	-	-	6076
Curtailment (%)	3.86%	-	-	-	13.53%
Constrained (%)	0.00%	-	-	-	0.00%
Constraint & Curtailment (%)	3.86%	-	-	-	13.53%

Limavady Generation Node					
Results	2012	2013	2014	2015	2016
Potential Energy (Mwh)	112845	-	-	-	0
Constrained Energy (Mwh)	137	-	-	-	0
Curtailed Energy (Mwh)	4361	-	-	-	0
Constrained & curtailed Energy (Mwh)	4366	-	-	-	0
Curtailment (%)	3.86%	-	-	-	0
Constrained (%)	0.12%	-	-	-	0.00%
Constraint & Curtailment (%)	3.87%	-	-	-	0

Lisaghmore Generation Node					
Results	2012	2013	2014	2015	2016
Potential Energy (Mwh)	44899	-	-	-	0
Constrained Energy (Mwh)	54	-	-	-	0
Curtailed Energy (Mwh)	1735	-	-	-	0
Constrained & curtailed Energy (Mwh)	1737	-	-	-	0
Curtailment (%)	3.86%	-	-	-	0%
Constrained (%)	0.12%	-	-	-	0%
Constraint & Curtailment (%)	3.87%	-	-	-	0

*Generation at this node does not contribute to system constraints contained in this analysis

Newry Generation Node*					
Results	2012	2013	2014	2015	2016
Potential Energy (Mwh)	-	-	-	-	37428
Constrained Energy (Mwh)	-	-	-	-	0
Curtailed Energy (Mwh)	-	-	-	-	5064
Constrained & curtailed Energy (Mwh)	-	-	-	-	5112
Curtailment (%)	-	-	-	-	13.53%
Constrained (%)	-	-	-	-	0.00%
Constraint & Curtailment (%)	-	-	-	-	13.66%

Omagh Generation Node					
Results	2012	2013	2014	2015	2016
Potential Energy (Mwh)	376251	-	-	-	201146
Constrained Energy (Mwh)	457	-	-	-	3649
Curtailed Energy (Mwh)	14541	-	-	-	27222
Constrained & curtailed Energy (Mwh)	14558	-	-	-	27482
Curtailment (%)	3.86%	-	-	-	13.53%
Constrained (%)	0.12%	-	-	-	1.81%
Constraint & Curtailment (%)	3.87%	-	-	-	13.66%

Strabane Generation Node					
Results	2012	2013	2014	2015	2016
Potential Energy (Mwh)	82015	-	-	-	31728
Constrained Energy (Mwh)	100	-	-	-	576
Curtailed Energy (Mwh)	3170	-	-	-	4294
Constrained & curtailed Energy (Mwh)	3173	-	-	-	4335
Curtailment (%)	3.86%	-	-	-	13.53%
Constrained (%)	0.12%	-	-	-	1.81%
Constraint & Curtailment (%)	3.87%	-	-	-	13.66%

*Generation at this node does not contribute to system constraints contained in this analysis

2 FUTURE 110KV NODES

2.1 GENERATOR OUTPUT REDUCTIONS AT FUTURE NODES.

Altahullion Generation Node					
Results	2012	2013	2014	2015	2016
Potential Energy (Mwh)	-	-	-	-	202643
Constrained Energy (Mwh)	-	-	-	-	3676
	-	-	-	-	27425
	-	-	-	-	27686
	-	-	-	-	13.53%
	-	-	-	-	1.81%
	-	-	-	-	13.66%
Constrained & curtailed Energy (Mwh)					
Curtailment (%)					

Cam Generation Node					
Results	2012	2013	2014	2015	2016
Potential Energy (Mwh)	-	-	-	-	188575
Constrained Energy (Mwh)	-	-	-	-	3421
	-	-	-	-	25521
	-	-	-	-	25764
	-	-	-	-	13.53%
	-	-	-	-	1.81%
	-	-	-	-	13.66%
Constrained & curtailed Energy (Mwh)					
Curtailment (%)					

Drumquin Generation Node					
Results	2012	2013	2014	2015	2016
Potential Energy (Mwh)	-	-	-	-	380143
Constrained Energy (Mwh)	-	-	-	-	6896
	-	-	-	-	51447
	-	-	-	-	51938
	-	-	-	-	13.53%
	-	-	-	-	1.81%
	-	-	-	-	13.66%
Constrained & curtailed Energy (Mwh)					
Curtailment (%)					

Gort Generation Node					
Results	2012	2013	2014	2015	2016
Potential Energy (Mwh)	-	-	-	-	172112
Constrained Energy (Mwh)	-	-	-	-	3122
	-	-	-	-	23293
	-	-	-	-	23515
	-	-	-	-	13.53%
	-	-	-	-	1.81%
	-	-	-	-	13.66%
Constrained & curtailed Energy (Mwh)	-	-	-	-	
Curtailment (%)	-	-	-	-	

Magherakeel Generation Node					
Results	2012	2013	2014	2015	2016
Potential Energy (Mwh)	122167	-	-	-	347516
Constrained Energy (Mwh)	220	-	-	-	6304
	6687	-	-	-	47031
	6695	-	-	-	47480
	5.47%	-	-	-	13.53%
	0.18%	-	-	-	1.81%
	5.48%	-	-	-	13.66%
Constrained & curtailed Energy (Mwh)	-	-	-	-	
Curtailment (%)	-	-	-	-	

Mid Antrim Generation Node					
Results	2012	2013	2014	2015	2016
Potential Energy (Mwh)	-	-	-	-	157146
Constrained Energy (Mwh)	-	-	-	-	2851
	-	-	-	-	21267
	-	-	-	-	21470
	-	-	-	-	13.53%
	-	-	-	-	1.81%
	-	-	-	-	13.66%
Constrained & curtailed Energy (Mwh)	-	-	-	-	
Curtailment (%)	-	-	-	-	

Tremoge Generation Node					
Results	2012	2013	2014	2015	2016
Potential Energy (Mwh)	-	-	-	-	178098
Constrained Energy (Mwh)	-	-	-	-	3231
	-	-	-	-	24103
	-	-	-	-	24333
	-	-	-	-	13.53%
	-	-	-	-	1.81%
	-	-	-	-	13.66%
Constrained & curtailed Energy (Mwh)	-	-	-	-	
Curtailment (%)	-	-	-	-	