

NDM Accuracy of Forecasting Report

Gas Year 15/16

10 December 2019



Report Description

This report is an ongoing requirement of the <u>Balancing Network</u> <u>Code</u> (Commission Regulation (EU) No 312/2014). The requirement is outlined in Article 42, "Information obligations of the forecasting party towards the transmission system operator", Paragraph 3 "A report on the accuracy of the forecast of a network user's non daily metered off-takes shall be published by the forecasting party at least every two years."

The forecasting party in this instance is the Meter Data Services group, Gas Networks Ireland who will publish the report on an annual basis for the Transporter, after the end of the gas year. The report will be published on the Gas Networks Ireland website.

The data contained in this report is defined as follows:

Data Element	Description
Date	Gas day
Daily Delivered Energy, kWh	Aggregate NDM delivered energy for Gas Day D. This information is available in the <u>Transportation Monthly</u> <u>Reports</u> published by Gas Networks Ireland.
Forecast Energy Demand, kWh	Aggregate of the final NDM energy forecasts issued to shippers on Gas Day D.
Accuracy, %	The difference between the forecasted and delivered energy at all NDM offtakes for the relevant gas day, in proportion to the delivered energy.

Under the CRU approved Forecasting, Allocation, Reconciliation Procedures (<u>FAR Procedures</u>) the Transporter is required to issue NDM Nominations Advices to each shipper registered as holding NDM Exit Capacity in accordance with Part D, Section 1.7 of the Gas Networks Ireland <u>Code of Operations</u> on a daily basis. The Forecasted Energy Demand in the report is an aggregation of the individual forecasts issued by Gas Networks Ireland to each NDM shipper on a given gas day.

There will always be variances between the level of NDM forecasts issued to shippers each day and the actual level of NDM demand on the day. The accuracy of the forecast on any given day will be subject to variations caused by a number of reasons including, but not limited to:

- · Changes in weather forecasts;
- Changes in actual weather (and degree to which end user demand responds); and
- Changes in end user demand (e.g. change of occupancy).

Gas Year 15/16

Date	Daily Delivered Energy, kWh	Forecast Energy Demand, kWh	Accuracy, %
01/10/15	19,515,192	20,163,852	3%
02/10/15	21,723,885	22,096,206	2%
03/10/15	22,877,468	23,187,084	1%
04/10/15	21,554,682	21,910,624	2%
05/10/15	21,111,442	21,830,259	3%
06/10/15	19,769,008	19,671,974	0%
07/10/15	22,231,750	22,553,369	1%
08/10/15	22,377,094	22,845,624	2%
09/10/15	20,762,156	20,917,640	1%
10/10/15	20,134,540	20,457,713	2%
11/10/15	20,117,769	20,298,630	1%
12/10/15	25,468,813	25,525,690	0%
13/10/15	29,519,901	30,360,496	3%
14/10/15	33,305,330	33,475,126	1%
15/10/15	32,601,664	33,289,860	2%
16/10/15	32,609,896	32,981,261	1%
17/10/15	28,296,312	28,168,161	0%
18/10/15	27,947,466	28,330,658	1%
19/10/15	30,312,131	30,608,407	1%
20/10/15	33,103,421	33,573,081	1%
21/10/15	28,081,598	27,967,686	0%
22/10/15	28,409,835	28,774,076	1%
23/10/15	28,444,905	28,539,057	0%
24/10/15	28,839,740	24,735,831	-14%
25/10/15	30,231,140	29,618,543	-2%
26/10/15	30,230,752	29,799,888	-1%
27/10/15	29,849,443	30,731,311	3%
28/10/15	30,258,222	30,982,729	2%
29/10/15	30,397,433	30,933,282	2%
30/10/15	29,706,352	30,361,280	2%
31/10/15	22,417,249	23,394,533	4%
01/11/15	24,638,379	25,429,229	3%
02/11/15	27,052,244	28,064,100	4%
03/11/15	29,339,517	28,548,773	-3%
04/11/15	31,353,707	31,545,561	1%
05/11/15	29,845,891	31,585,296	6%
06/11/15	27,638,514	27,853,617	1%
07/11/15	27,791,421	28,244,854	2%
08/11/15	30,445,775	30,596,271	0%
09/11/15	32,376,361	33,229,430	3%
10/11/15	25,190,357	24,904,963	-1%
11/11/15	28,305,562	28,242,424	0%

Date	Daily Delivered Energy, kWh	Forecast Energy Demand, kWh	Accuracy, %
12/11/15	34,681,239	34,698,293	0%
13/11/15	47,206,825	47,805,423	1%
14/11/15	38,709,478	36,700,779	-5%
15/11/15	27,883,330	25,782,043	-8%
16/11/15	40,705,993	39,117,399	-4%
17/11/15	40,297,344	42,197,647	5%
18/11/15	39,809,096	40,004,917	0%
19/11/15	43,440,208	43,320,841	0%
20/11/15	51,921,762	51,080,467	-2%
21/11/15	51,671,745	52,321,094	1%
22/11/15	47,215,519	47,538,162	1%
23/11/15	54,082,811	55,533,909	3%
24/11/15	48,294,812	48,768,561	1%
25/11/15	44,119,297	44,268,239	0%
26/11/15	38,650,470	40,889,052	6%
27/11/15	46,829,290	43,875,037	-6%
28/11/15	49,453,233	50,096,519	1%
29/11/15	44,973,293	46,057,004	2%
30/11/15	48,754,791	50,568,452	4%
01/12/15	40,523,374	41,593,348	3%
02/12/15	40,429,513	40,716,457	1%
03/12/15	51,228,049	51,467,132	0%
04/12/15	48,102,531	48,735,490	1%
05/12/15	41,364,249	43,476,780	5%
06/12/15	39,832,374	40,718,284	2%
07/12/15	40,256,099	41,668,987	4%
08/12/15	46,518,321	46,835,590	1%
09/12/15	46,491,515	45,875,922	-1%
10/12/15	49,564,611	49,525,401	0%
11/12/15	53,687,292	53,678,310	0%
12/12/15	50,586,082	50,710,743	0%
13/12/15	45,348,503	45,221,552	0%
14/12/15	45,893,065	47,725,146	4%
15/12/15	42,575,746	42,825,519	1%
16/12/15	35,763,648	36,330,072	2%
17/12/15	34,609,324	34,258,437	-1%
18/12/15	35,425,176	35,952,448	1%
19/12/15	29,573,482	30,936,546	5%
20/12/15	36,277,286	36,397,053	0%
21/12/15	44,142,120	44,493,573	1%
22/12/15	42,998,997	42,710,900	-1%
23/12/15	46,083,766	45,635,924	-1%
24/12/15	48,743,775	47,112,068	-3%
25/12/15	42,351,485	42,884,942	1%

Date	Daily Delivered Energy, kWh	Forecast Energy Demand, kWh	Accuracy, %
26/12/15	37,763,587	37,727,013	0%
27/12/15	41,783,684	42,636,403	2%
28/12/15	38,834,559	38,316,146	-1%
29/12/15	42,963,476	44,379,576	3%
30/12/15	42,571,070	42,558,847	0%
31/12/15	52,345,610	51,026,496	-3%
01/01/16	49,168,775	49,057,336	0%
02/01/16	41,497,526	41,365,044	0%
03/01/16	40,119,623	39,678,708	-1%
04/01/16	46,861,179	48,519,853	4%
05/01/16	50,663,981	50,829,458	0%
06/01/16	52,039,322	53,080,805	2%
07/01/16	55,582,727	56,060,326	1%
08/01/16	55,501,989	55,911,912	1%
09/01/16	52,875,340	51,000,946	-4%
10/01/16	52,527,797	53,583,491	2%
11/01/16	63,011,201	63,736,982	1%
12/01/16	65,749,318	65,819,023	0%
13/01/16	66,826,240	67,447,125	1%
14/01/16	68,558,140	68,614,551	0%
15/01/16	71,453,307	71,641,716	0%
16/01/16	62,095,557	61,469,564	-1%
17/01/16	53,250,150	54,402,453	2%
18/01/16	55,615,339	57,031,022	3%
19/01/16	55,528,331	55,714,783	0%
20/01/16	58,740,425	59,702,548	2%
21/01/16	50,748,058	52,127,233	3%
22/01/16	45,247,057	46,126,281	2%
23/01/16	43,030,787	45,192,352	5%
24/01/16	34,522,028	34,691,868	0%
25/01/16	40,210,586	42,456,945	6%
26/01/16	44,422,216	43,855,335	-1%
27/01/16	49,388,041	48,583,018	-2%
28/01/16	54,610,500	56,428,198	3%
29/01/16	50,906,552	50,283,721	-1%
30/01/16	54,874,750	53,900,952	-2%
31/01/16	45,505,387	44,563,668	-2%
01/02/16	49,531,805	48,196,583	-3%
02/02/16	57,354,547	57,640,366	0%
03/02/16	57,277,365	57,197,443	0%
04/02/16	48,364,512	48,557,511	0%
05/02/16	51,584,366	51,578,846	0%
06/02/16	49,956,856	50,064,376	0%
07/02/16	53,097,449	52,721,783	-1%

Date	Daily Delivered Energy, kWh	Forecast Energy Demand, kWh	Accuracy, %
08/02/16	60,156,060	59,913,977	0%
09/02/16	65,220,752	65,569,931	1%
10/02/16	58,646,235	58,971,447	1%
11/02/16	59,936,430	60,937,435	2%
12/02/16	59,889,707	59,956,451	0%
13/02/16	53,019,329	53,000,870	0%
14/02/16	53,955,754	54,064,095	0%
15/02/16	60,665,547	60,958,191	0%
16/02/16	58,989,828	59,024,371	0%
17/02/16	58,714,348	57,420,569	-2%
18/02/16	59,193,132	59,159,864	0%
19/02/16	54,510,299	54,870,194	1%
20/02/16	47,927,822	48,777,502	2%
21/02/16	41,400,725	41,509,958	0%
22/02/16	51,153,143	51,851,046	1%
23/02/16	53,609,295	53,764,341	0%
24/02/16	57,279,208	57,461,753	0%
25/02/16	60,400,301	61,698,892	2%
26/02/16	56,982,240	57,939,520	2%
27/02/16	53,696,375	52,920,412	-1%
28/02/16	48,858,622	49,507,479	1%
29/02/16	58,592,780	59,247,860	1%
01/03/16	49,654,484	49,106,066	-1%
02/03/16	59,935,016	60,926,227	2%
03/03/16	57,760,982	57,521,777	0%
04/03/16	66,286,656	66,401,105	0%
05/03/16	54,679,624	53,876,033	-1%
06/03/16	55,610,714	55,249,088	-1%
07/03/16	59,967,643	60,927,528	2%
08/03/16	55,279,978	55,422,888	0%
09/03/16	54,374,067	54,769,744	1%
10/03/16	48,054,136	48,059,733	0%
11/03/16	44,237,985	46,168,692	4%
12/03/16	35,254,371	36,978,250	5%
13/03/16	33,071,999	34,598,705	5%
14/03/16	40,316,335	42,431,075	5%
15/03/16	42,994,087	44,139,246	3%
16/03/16	45,253,336	44,489,626	-2%
17/03/16	43,274,023	42,686,812	-1%
18/03/16	49,076,975	49,921,434	2%
19/03/16	45,607,835	45,257,442	-1%
20/03/16	41,323,249	41,899,159	1%
21/03/16	49,278,529	49,177,339	0%
22/03/16	47,272,524	48,212,575	2%

Date	Daily Delivered Energy, kWh	Forecast Energy Demand, kWh	Accuracy, %
23/03/16	42,953,353	44,705,318	4%
24/03/16	44,374,445	44,722,666	1%
25/03/16	37,845,886	38,301,549	1%
26/03/16	37,159,892	33,340,809	-10%
27/03/16	37,146,278	37,002,623	0%
28/03/16	44,867,091	39,744,025	-11%
29/03/16	45,637,787	46,190,520	1%
30/03/16	45,070,991	45,766,404	2%
31/03/16	41,778,724	42,691,008	2%
01/04/16	46,835,901	48,178,662	3%
02/04/16	42,087,923	41,840,507	-1%
03/04/16	40,547,394	41,008,922	1%
04/04/16	41,385,658	47,854,771	16%
05/04/16	39,611,389	39,515,972	0%
06/04/16	46,580,244	47,203,128	1%
07/04/16	44,224,958	45,412,035	3%
08/04/16	47,519,343	46,792,571	-2%
09/04/16	43,708,718	43,626,374	0%
10/04/16	45,561,377	45,511,190	0%
11/04/16	49,672,978	50,388,501	1%
12/04/16	37,346,711	37,854,554	1%
13/04/16	38,060,700	37,663,349	-1%
14/04/16	37,888,603	38,033,012	0%
15/04/16	43,420,707	43,197,232	-1%
16/04/16	41,698,622	41,904,601	0%
17/04/16	38,519,321	39,598,509	3%
18/04/16	40,336,394	40,999,154	2%
19/04/16	34,241,346	34,342,287	0%
20/04/16	30,768,381	31,431,197	2%
21/04/16	31,280,981	31,819,946	2%
22/04/16	31,878,513	31,570,650	-1%
23/04/16	30,025,058	30,032,843	0%
24/04/16	31,688,212	32,189,911	2%
25/04/16	37,432,522	37,614,216	0%
26/04/16	42,587,259	43,222,252	1%
27/04/16	43,468,034	43,889,826	1%
28/04/16	48,299,170	48,323,019	0%
29/04/16	45,224,559	45,630,750	1%
30/04/16	35,644,781	36,466,429	2%
01/05/16	28,276,218	29,443,262	4%
02/05/16	29,530,049	29,028,583	-2%
03/05/16	30,909,684	33,908,403	10%
04/05/16	29,743,847	31,566,136	6%
05/05/16	24,692,550	24,842,769	1%

Date	Daily Delivered Energy, kWh	Forecast Energy Demand, kWh	Accuracy, %
06/05/16	23,570,091	23,836,403	1%
07/05/16	26,777,858	27,173,797	1%
08/05/16	17,618,685	17,991,169	2%
09/05/16	19,232,552	19,604,398	2%
10/05/16	21,362,738	21,506,378	1%
11/05/16	21,571,336	21,926,709	2%
12/05/16	16,914,314	16,366,330	-3%
13/05/16	16,227,027	16,155,979	0%
14/05/16	15,212,659	15,532,324	2%
15/05/16	14,094,704	13,755,019	-2%
16/05/16	16,582,205	17,748,587	7%
17/05/16	16,778,670	17,092,370	2%
18/05/16	17,991,609	18,395,230	2%
19/05/16	18,186,281	19,858,954	9%
20/05/16	20,774,095	21,211,364	2%
21/05/16	16,747,228	17,584,357	5%
22/05/16	16,369,922	17,102,134	4%
23/05/16	18,588,183	18,854,195	1%
24/05/16	16,718,912	16,805,575	1%
25/05/16	20,068,446	19,796,221	-1%
26/05/16	22,713,381	23,331,728	3%
27/05/16	18,873,460	18,154,205	-4%
28/05/16	14,156,745	13,596,248	-4%
29/05/16	10,834,400	10,973,932	1%
30/05/16	11,508,088	12,804,457	11%
31/05/16	10,929,662	11,970,167	10%
01/06/16	10,985,711	11,112,493	1%
02/06/16	10,959,010	11,545,493	5%
03/06/16	10,789,079	10,974,055	2%
04/06/16	8,736,372	8,959,938	3%
05/06/16	7,461,658	7,356,685	-1%
06/06/16	7,630,099	7,254,941	-5%
07/06/16	9,126,992	10,850,967	19%
08/06/16	9,390,352	14,080,627	50%
09/06/16	9,269,776	13,883,663	50%
10/06/16	10,008,684	14,084,854	41%
11/06/16	9,154,885	12,294,620	34%
12/06/16	8,948,003	12,091,163	35%
13/06/16	10,739,889	14,984,628	40%
14/06/16	11,891,778	16,723,446	41%
15/06/16	11,256,530	13,821,236	23%
16/06/16	15,331,684	12,363,456	-19%
17/06/16	15,305,584	14,373,883	-6%
18/06/16	12,062,765	12,310,977	2%

Date	Daily Delivered Energy, kWh	Forecast Energy Demand, kWh	Accuracy, %
19/06/16	11,270,224	12,040,908	7%
20/06/16	11,330,960	15,580,729	38%
21/06/16	10,406,635	11,888,937	14%
22/06/16	10,729,704	12,358,980	15%
23/06/16	10,404,045	10,620,925	2%
24/06/16	11,742,766	12,157,047	4%
25/06/16	10,476,572	11,191,436	7%
26/06/16	10,681,263	10,656,107	0%
27/06/16	11,076,118	12,011,987	8%
28/06/16	13,274,832	12,531,852	-6%
29/06/16	12,633,204	13,596,952	8%
30/06/16	14,113,245	14,506,455	3%
01/07/16	14,939,316	14,849,478	-1%
02/07/16	12,556,761	10,540,560	-16%
03/07/16	10,140,984	9,914,157	-2%
04/07/16	11,652,142	12,912,633	11%
05/07/16	11,273,306	11,670,595	4%
06/07/16	12,022,284	11,916,100	-1%
07/07/16	10,592,972	11,906,755	12%
08/07/16	10,211,734	10,943,114	7%
09/07/16	8,987,372	9,670,180	8%
10/07/16	9,141,960	9,599,609	5%
11/07/16	10,735,601	10,415,443	-3%
12/07/16	11,616,989	11,958,052	3%
13/07/16	12,345,451	12,966,410	5%
14/07/16	11,952,702	12,903,310	8%
15/07/16	10,220,105	10,421,044	2%
16/07/16	8,160,634	8,704,646	7%
17/07/16	7,439,274	7,419,647	0%
18/07/16	7,970,690	8,775,547	10%
19/07/16	7,040,132	6,356,844	-10%
20/07/16	7,913,259	8,284,301	5%
21/07/16	8,553,515	7,798,515	-9%
22/07/16	9,163,633	9,574,965	4%
23/07/16	8,416,872	8,319,274	-1%
24/07/16	8,347,376	8,229,350	-1%
25/07/16	10,043,124	10,355,165	3%
26/07/16	9,851,662	10,218,522	4%
27/07/16	9,756,202	10,121,920	4%
28/07/16	9,202,093	9,565,688	4%
29/07/16	9,593,306	9,993,149	4%
30/07/16	8,782,392	8,878,236	1%
31/07/16	8,546,557	8,336,192	-2%
01/08/16	10,596,879	10,395,103	-2%

Date	Daily Delivered Energy, kWh	Forecast Energy Demand, kWh	Accuracy, %
02/08/16	9,465,330	10,574,106	12%
03/08/16	10,748,841	11,222,860	4%
04/08/16	10,427,236	10,794,837	4%
05/08/16	9,873,307	10,463,834	6%
06/08/16	8,664,283	9,031,607	4%
07/08/16	9,026,197	9,375,268	4%
08/08/16	10,719,536	11,262,980	5%
09/08/16	12,160,194	12,358,477	2%
10/08/16	13,104,003	13,125,993	0%
11/08/16	11,481,889	12,088,832	5%
12/08/16	11,100,151	11,280,678	2%
13/08/16	9,643,027	9,959,121	3%
14/08/16	9,928,858	10,014,470	1%
15/08/16	10,116,404	10,605,557	5%
16/08/16	9,464,054	9,722,286	3%
17/08/16	11,153,178	11,121,097	0%
18/08/16	10,929,343	11,324,418	4%
19/08/16	11,827,571	12,550,226	6%
20/08/16	11,403,344	11,784,829	3%
21/08/16	10,390,446	10,915,587	5%
22/08/16	9,996,874	10,299,978	3%
23/08/16	11,244,922	11,774,657	5%
24/08/16	10,393,917	11,878,071	14%
25/08/16	10,360,011	10,719,570	3%
26/08/16	10,716,201	11,033,060	3%
27/08/16	9,667,781	9,870,684	2%
28/08/16	9,214,211	9,175,279	0%
29/08/16	10,313,001	10,164,501	-1%
30/08/16	10,405,213	10,827,444	4%
31/08/16	11,128,655	11,396,841	2%
01/09/16	12,620,736	12,934,586	2%
02/09/16	11,342,014	11,257,275	-1%
03/09/16	12,004,506	12,070,298	1%
04/09/16	10,499,393	10,578,626	1%
05/09/16	9,761,684	10,587,580	8%
06/09/16	8,991,271	9,327,878	4%
07/09/16	9,906,170	10,461,415	6%
08/09/16	11,225,857	12,201,867	9%
09/09/16	13,128,790	13,735,728	5%
10/09/16	12,015,528	12,037,110	0%
11/09/16	11,735,818	12,149,203	4%
12/09/16	11,917,513	12,298,389	3%
13/09/16	12,782,626	13,052,069	2%
14/09/16	11,961,981	12,677,781	6%

Date	Daily Delivered Energy, kWh	Forecast Energy Demand, kWh	Accuracy, %
15/09/16	11,356,218	11,634,229	2%
16/09/16	12,529,771	13,303,474	6%
17/09/16	11,446,772	12,797,317	12%
18/09/16	12,554,484	12,529,576	0%
19/09/16	16,210,994	17,042,249	5%
20/09/16	15,979,283	16,230,426	2%
21/09/16	19,115,223	19,081,183	0%
22/09/16	18,960,708	19,765,655	4%
23/09/16	19,704,130	20,128,520	2%
24/09/16	16,670,226	16,361,686	-2%
25/09/16	16,995,786	17,276,354	2%
26/09/16	18,063,283	18,689,553	3%
27/09/16	16,175,686	16,366,564	1%
28/09/16	14,435,386	14,821,810	3%
29/09/16	16,633,025	17,605,815	6%
30/09/16	20,850,912	21,468,759	3%