MONTANA-DAKOTA
UTILITIES CO.
A Division of MDU Resources Group, Inc.

400 North Fourth Street
Bismarck, ND 58501
(701) 222-7900

February 4, 2009

Executive Secretary
North Dakota Public Service Commission
State Capitol Building
Bismarck, ND 58505-0480

Re: Case No. 11,006 (Therm Billing)
Monthly Report – December 2008

Montana-Dakota Utilities Co., a Division of MDU Resources Group, Inc., herewith submits the following information, pursuant to the Ordering paragraphs one and two of the Order issued in the above-referenced docket, dated October 20, 1987:

1. Attachment A is a schedule showing the thermal billing factors by community that reflect the BTU values shown on Attachment B and were used for billing purposes in January 2009.

2. Attachment B consists of copies of the monthly Heating Value Test Reports received from our supplier for the month of December 2008. There is a report for each of the 16 thermal zones for the month.

3. Attachment C is a listing which states the type of measuring device in place at each zone.

4. Attachment D is a monthly list of the heating value data, by zone, for the most recent 12-month period and an average thereof. It is being provided pursuant to a Staff request.

5. Attachment E provides a brief explanation of the thermal variances, where applicable, for the month of December.

Please acknowledge receipt by stamping or initialing the duplicate copy of this letter attached hereto and returning the same in the enclosed self-addressed, stamped envelope. Should the Commission or its Staff have any comments or questions with respect to these reports, please call me.

Sincerely,

Tamie Aberle
Pricing & Tariff Manager

MONTANA-DAKOTA UTILITIES CO.
Therm Billing Factor
JAN 2009

Div Nbr	Off Code	City Name	Heat Zone Nbr	Therm Billng Factor
12	314	APPLE VALLEY	271	1.0431
12	327	BISMARCK	28	.9842
12	343	CARRINGTON	273	1.0421
12	344	CLEVELAND	272	1.0347
12	364	CAVALIER	273	1.0640
12	365	DAWSON	271	1.0357
12	374	FT TOTTEN	273	1.0494
12	375	DEVILS LAKE	273	1.0494
12	379	BARLOW	273	1.0421
12	387	ELDRIDGE	272	1.0421
12	411	GLEN ULLIN	31	.9615
12	417	GRAFTON	273	1.0714
12	439	HANKINSON	600	1.0689
12	449	JAMESTOWN	272	1.0494
12	463	LANGDON	273	1.0421
12	475	LINTON	802	.9813
12	478	LINCOLN	28	.9842
12	494	MEDINA	271	1.0357
12	498	MANDAN	28	.9842
12	524	NEW SALEM	28	.9634
12	532	NEW ROCKFORD	273	1.0421
12	539	PARK RIVER	273	1.0640
12	574	SANBORN	272	1.0494
12	593	STEELE	271	1.0357
12	598	SHEYENNE	273	1.0494
12	610	TAPPEN	271	1.0357
12	625	VALLEY CITY	272	1.0567
12	629	WALHALLA	273	1.0640
12	647	WILTON	262	1.0663
12	717	SPIRITWOOD	272	1.0494
12	718	FAIRMOUNT	600	1.0668
12	732	MSR SITE	273	1.0421
12	733	PAR SITE	273	1.0421
15	303	ALEXANDER	25	1.0645
15	308	ARNEGARD	25	1.0645

MONTANA-DAKOTA UTILITIES CO.
Therm Billing Factor
JAN 2009

Div Nbr	Off Code	City Name	Heat Zone Nbr	Therm Billng Factor
15	318	BEACH	32	.9407
15	319	BELFIELD	32	.9477
15	323	BERTHOLD	262	1.0663
15	330	BOWMAN	34	1.0714
15	337	BURLINGTON	262	1.0894
15	368	DES LACS	262	1.0740
15	369	DICKINSON	31	.9546
15	384	EPPING	264	1.1287
15	407	GLADSTONE	31	.9546
15	413	GOLVA	32	.9270
15	416	GARRISON	262	1.0740
15	429	HEBRON	31	.9615
15	459	KILLDEER	33	1.0900
15	469	LEFOR	31	.9546
15	474	LIGNITE	263	1.0835
15	500	MARMARTH	34	1.0793
15	505	MINOT	262	1.0894
15	510	MOTT	31	.9546
15	512	MAX	262	1.0663
15	522	NEW ENGLAND	31	.9477
15	540	PALERMO	262	1.0663
15	558	RAY	264	1.1287
15	561	REGENT	31	.9546
15	563	RHAME	34	1.0636
15	564	RICHARDTON	31	.9477
15	568	ROSS	261	1.0530
15	572	RUTHVILLE	262	1.0894
15	583	SENTINEL BUTTE	32	.9407
15	588	SOUTH HEART	31	.9477
15	590	SPRINGBROOK	264	1.1287
15	591	STANLEY	261	1.0607
15	605	SURREY	262	1.0894
15	611	TAYLOR	31	.9477
15	616	TIOGA	261	1.0530
15	619	TURTLE LAKE	262	1.0740

MONTANA-DAKOTA UTILITIES CO.
Therm Billing Factor
JAN 2009

Div Nbr	Off Code	City Name	Heat Zone Nbr	Therm Billng Factor
15	620	TRENTON	24	1.1368
15	624	UNDERWOOD	262	1.0740
15	632	WATFORD CITY	25	1.0645
15	636	WHEELOCK	264	1.1206
15	637	WHITE EARTH	261	1.0607
15	642	WILLISTON	24	1.1368
15	646	WASHBURN	262	1.0817
15	664	RIVERDALE	262	1.0740
15	691	FAIRVIEW	24	1.1368
15	712	MINOT AFB	262	1.0894
15	743	BAKER FIELD	35	.8935

* * * E N D O F R E P O R T * * *

Williston Basin Interstate Pipeline Co.

GQ Source Daily Summary

December 2008

Number: 251

Name: SIDNEY BORDER

Pressure Base: 14.730

Temperature Base:

Contract Day: 1 Contract Hour: 9

Day	Relative Density	Heating Value Wet	Heating Value Dry	Heating Value As Del	CO2	N2	C1	C2	C3	IC4	NC4	IC5	NC5	C6	C7	C8	C9	C10	Wobbe	Cri'therm
1	0.6964	1164.4	1185.0		0.016	3.078	73.040	21.558	2.150	0.055	0.090	0.006	0.006	0.002	0.000				1420.07	
2	0.6988	1165.1	1185.7		0.093	3.149	72.706	21.660	2.224	0.061	0.096	0.005	0.005	0.001	0.000				1418.46	
3	0.6931	1159.5	1180.1		0.017	3.070	73.335	21.591	1.874	0.041	0.063	0.004	0.004	0.001	0.000				1417.43	
4	0.6897	1150.4	1170.7		0.026	3.293	74.311	20.125	2.089	0.053	0.090	0.005	0.005	0.001	0.000				1409.50	
5	0.6734	1119.1	1138.9		0.044	3.638	77.469	16.766	1.907	0.058	0.103	0.006	0.007	0.002	0.000				1387.66	
6	0.6879	1146.0	1166.3		0.031	3.376	75.098	18.922	2.332	0.079	0.141	0.009	0.009	0.002	0.000				1406.05	
7	0.6940	1160.6	1181.1		0.015	3.093	73.338	21.407	2.012	0.045	0.078	0.005	0.005	0.001	0.000				1417.76	
8	0.6931	1158.7	1179.2		0.015	3.124	73.373	21.465	1.904	0.042	0.069	0.004	0.004	0.001	0.000				1416.41	
9	0.7004	1159.8	1180.3		0.272	3.357	72.227	21.990	2.021	0.046	0.078	0.004	0.004	0.001	0.000				1410.49	
10	0.6915	1156.0	1176.4		0.017	3.135	73.345	21.766	1.685	0.021	0.027	0.001	0.001	0.000	0.000				1414.76	
11	0.6772	1123.3	1143.2		0.149	3.584	76.257	18.377	1.545	0.031	0.051	0.003	0.003	0.001	0.000				1388.47	
12	0.5805	942.1	958.8		0.140	5.546	94.047	0.244	0.018	0.003	0.001	0.000	0.000	0.000	0.000				1258.40	
13	0.6188	1001.3	1019.0		0.388	5.159	87.506	6.024	0.834	0.033	0.053	0.002	0.002	0.000	0.000				1294.10	
14	0.6039	978.6	995.9		0.291	5.295	90.052	3.787	0.518	0.021	0.033	0.001	0.001	0.000	0.000				1280.57	
15	0.5803	942.4	959.1		0.138	5.514	94.086	0.241	0.017	0.003	0.001	0.000	0.000	0.000	0.000				1259.00	
16	0.5804	942.2	958.9		0.137	5.532	94.071	0.240	0.016	0.003	0.000	0.000	0.000	0.001	0.000				1258.69	
17	0.5810	944.2	960.9		0.178	5.404	94.047	0.326	0.034	0.006	0.003	0.001	0.000	0.001	0.000				1260.68	
18	0.5849	949.3	966.1		0.170	5.477	93.311	0.913	0.113	0.007	0.007	0.000	0.000	0.002	0.000				1263.11	
19	0.5803	942.4	959.1		0.139	5.512	94.096	0.232	0.016	0.003	0.000	0.000	0.000	0.002	0.000				1258.99	
20	0.5819	948.2	965.0		0.296	5.061	94.091	0.464	0.063	0.010	0.008	0.002	0.001	0.002	0.000				1265.11	
21	0.5832	953.0	969.9		0.435	4.688	94.093	0.638	0.102	0.017	0.015	0.005	0.003	0.006	0.000				1269.97	
22	0.5821	951.2	968.0		0.448	4.676	94.333	0.399	0.097	0.017	0.015	0.005	0.003	0.006	0.000				1268.71	
23	0.5796	943.8	960.5		0.263	5.165	94.500	0.000	0.050	0.009	0.007	0.002	0.001	0.004	0.000				1261.70	
24	0.5792	941.6	958.3		0.171	5.408	94.387	0.000	0.026	0.005	0.002	0.000	0.000	0.002	0.000				1259.14	
25	0.6429	1056.2	1074.9		0.095	4.507	84.799	7.641	2.501	0.153	0.281	0.014	0.008	0.002	0.000				1339.38	
26	0.6500	1072.5	1091.5		0.071	4.232	82.799	10.153	2.604	0.054	0.083	0.002	0.001	0.001	0.000				1353.10	
27	0.6462	1070.1	1089.1		0.077	4.005	83.094	10.610	2.088	0.051	0.072	0.002	0.001	0.000	0.000				1353.43	
28	0.6889	1148.0	1168.3		0.048	3.317	75.747	17.389	3.340	0.067	0.089	0.003	0.000	0.000	0.000				1407.61	
29	0.6737	1120.2	1140.0		0.055	3.573	78.388	14.918	2.911	0.061	0.090	0.004	0.000	0.000	0.000				1388.38	
30	0.5925	968.8	985.9		0.112	5.087	92.411	1.639	0.697	0.022	0.031	0.002	0.000	0.000	0.000				1280.62	
31	0.5823	947.8	964.6		0.130	5.378	94.099	0.000	0.355	0.015	0.021	0.001	0.000	0.000	0.000				1264.09	
Avg	0.6351	1046.0	1064.5		0.144	4.337	84.466	9.725	1.230	0.035	0.055	0.003	0.002	0.001	0.000				1333.93	

Zone 211

Williston Basin Interstate Pipeline Co.

GQ Source Analysis

GQ Source Number:	0602330		
GQ Source Name:	WILLISTON BORDER	**Specific Gravity:**	0.7256
Effective Date:	12/10/2008 9:00:00 AM	**BTU Base:**	Dry
Effective End Date:	1/18/2038 9:14:07 PM	**Dry Heat Value:**	1195.22
Pressure Base:	14.730	**Wet Heat Value:**	1174.42
Viscosity:		**As Deliv. Heat Value:**	1195.22

		Mol %	Imported GPM	Calculated GPM
C1	Methane	69.252		
C2	Ethane	22.147		5.905
C3	Propane	3.442	0.946	0.946
IC4	Iso-Butane	0.136	0.044	0.044
NC4	N-Butane	0.248	0.078	0.078
IC5	Iso-Pentane	0.015	0.005	0.005
NC5	N-Pentane	0.012	0.004	0.004
C6+	Hexanes Plus	0.000	0.000	0.000
CO2	Carbon Dioxide	0.874		
N2	Nitrogen	3.873		
O2	Oxygen	0.000		
HE	Helium			
H2	Hydrogen			
H2S	Hydrogen Sulfide			
	Totals	100.000	1.078	6.983

Sample Date: 11/30/2008 12:00:00 AM
Sample Type: Composite
Sample Tech: sampler
Sample Remarks: Zone 24 - 264

Analysis Remarks:

Williston Basin Interstate Pipeline Co.

GQ Source Analysis

GQ Source Number:	0602230		
GQ Source Name:	WATFORD CITY BORDER	**Specific Gravity:**	0.7286
Effective Date:	12/10/2008 9:00:00 AM	**BTU Base:**	Dry
Effective End Date:	1/18/2038 9:14:07 PM	**Dry Heat Value:**	1127.31
Pressure Base:	14.730	**Wet Heat Value:**	1107.69
Viscosity:		**As Deliv. Heat Value:**	1127.31

		Mol %	Imported GPM	Calculated GPM
C1	Methane	68.481		
C2	Ethane	18.070		4.818
C3	Propane	3.663	1.006	1.006
IC4	Iso-Butane	0.189	0.062	0.062
NC4	N-Butane	0.353	0.111	0.111
IC5	Iso-Pentane	0.029	0.010	0.010
NC5	N-Pentane	0.028	0.010	0.010
C6+	Hexanes Plus	0.007	0.003	0.003
CO2	Carbon Dioxide	0.733		
N2	Nitrogen	8.446		
O2	Oxygen	0.000		
HE	Helium			
H2	Hydrogen			
H2S	Hydrogen Sulfide			
	Totals	99.998	1.203	6.021

Sample Date: 11/30/2008 12:00:00 AM
Sample Type: Composite
Sample Tech: sampler
Sample Remarks: Zone 25

Analysis Remarks:

Williston Basin Interstate Pipeline Co.

GQ Source Daily Summary

December 2008

Number: 163

Name: NORTH TIOGA MINOT

Pressure Base: 14.730

Temperature Base:

Contract Day: 1 Contract Hour: 9

Day	Relative Density	Heating Value Wet	Heating Value Dry	Heating Value As Del	CO2	N2	C1	C2	C3	IC4	NC4	IC5	NC5	C6	C7	C8	C9	C10	Wobbe	Cri'therm
1	0.6837	1128.0	1148.0		0.419	3.495	75.900	18.016	1.930	0.080	0.136	0.009	0.009	0.006					1388.38	
2	0.6817	1126.1	1146.0		0.427	3.412	76.309	17.703	1.908	0.081	0.137	0.009	0.009	0.005					1388.02	
3	0.6821	1127.9	1147.9		0.407	3.371	76.134	17.994	1.869	0.077	0.127	0.008	0.008	0.005					1389.87	
4	0.6821	1128.8	1148.7		0.385	3.351	75.978	18.311	1.773	0.069	0.114	0.007	0.006	0.005					1390.92	
5	0.6826	1125.3	1145.3		0.429	3.539	76.053	17.860	1.901	0.074	0.125	0.007	0.007	0.005					1386.20	
6	0.6829	1127.4	1147.3		0.406	3.476	76.033	17.931	1.921	0.078	0.133	0.008	0.008	0.005					1388.43	
7	0.6811	1125.2	1145.2		0.399	3.452	76.221	17.925	1.791	0.071	0.121	0.007	0.007	0.006					1387.59	
8	0.6855	1129.3	1149.4		0.465	3.515	75.513	18.374	1.911	0.074	0.127	0.008	0.007	0.006					1388.18	
9	0.6783	1121.8	1141.6		0.394	3.405	76.564	17.850	1.601	0.062	0.105	0.006	0.006	0.008					1386.20	
10	0.6793	1123.5	1143.4		0.412	3.364	76.382	18.032	1.642	0.057	0.093	0.006	0.006	0.006					1387.38	
11	0.6825	1124.1	1144.0		0.474	3.539	75.625	18.650	1.576	0.046	0.077	0.004	0.004	0.006					1384.83	
12	0.6769	1113.3	1133.0		0.460	3.690	76.614	17.638	1.469	0.043	0.074	0.004	0.003	0.005					1377.19	
13	0.6632	1092.8	1112.1		0.377	3.785	78.880	15.754	1.107	0.033	0.056	0.003	0.002	0.004					1365.61	
14	0.6658	1092.5	1111.8		0.417	3.983	78.548	15.695	1.233	0.043	0.072	0.003	0.002	0.004					1362.61	
15	0.6557	1073.8	1092.8		0.352	4.274	80.271	13.956	1.033	0.039	0.066	0.003	0.002	0.003					1349.56	
16	0.6564	1074.4	1093.4		0.372	4.273	80.203	13.963	1.071	0.040	0.068	0.003	0.002	0.004					1349.56	
17	0.6558	1075.5	1094.5		0.376	4.148	80.330	13.963	1.067	0.039	0.065	0.003	0.002	0.005					1351.52	
18	0.6593	1083.4	1102.6		0.371	3.999	79.692	14.706	1.117	0.039	0.066	0.003	0.002	0.005					1357.88	
19	0.6578	1079.3	1098.4		0.389	4.075	80.098	14.129	1.179	0.043	0.074	0.004	0.003	0.005					1354.35	
20	0.6566	1077.6	1096.7		0.379	4.085	80.302	13.948	1.162	0.043	0.072	0.003	0.003	0.004					1353.39	
21	0.6559	1077.5	1096.6		0.432	3.947	80.570	13.724	1.181	0.050	0.083	0.005	0.003	0.005					1353.94	
22	0.6583	1081.3	1100.4		0.455	3.902	80.325	13.824	1.317	0.059	0.101	0.006	0.005	0.007					1356.29	
23	0.6572	1079.8	1098.9		0.429	3.929	80.340	13.958	1.196	0.050	0.083	0.005	0.004	0.005					1355.54	
24	0.6586	1081.5	1100.7		0.415	3.980	80.093	14.103	1.257	0.051	0.087	0.005	0.003	0.006					1356.24	
25	0.6591	1083.2	1102.4		0.376	3.988	79.994	14.197	1.284	0.054	0.093	0.005	0.004	0.007					1357.78	
26	0.6734	1108.9	1128.5		0.341	3.806	77.863	15.877	1.839	0.088	0.162	0.010	0.008	0.006					1375.26	
27	0.6734	1111.6	1131.3		0.315	3.680	77.618	16.412	1.799	0.060	0.102	0.005	0.004	0.006					1378.67	
28	0.6692	1106.1	1125.7		0.316	3.629	78.080	16.367	1.456	0.051	0.086	0.004	0.003	0.006					1376.03	
29	0.6822	1126.5	1146.4		0.339	3.574	75.865	18.223	1.823	0.060	0.100	0.005	0.004	0.005					1387.96	
30	0.6748	1114.4	1134.2		0.305	3.665	77.070	17.206	1.589	0.055	0.094	0.005	0.004	0.006					1380.63	
31	0.6571	1084.1	1103.3		0.284	3.880	80.116	14.472	1.109	0.045	0.079	0.004	0.003	0.007					1361.05	
Avg	0.6699	1103.0	1122.9		0.391	3.749	78.051	16.154	1.488	0.057	0.096	0.005	0.005	0.005					1371.84	

Zone 261

Williston Basin Interstate Pipeline Co.

GQ Source Daily Summary

December 2008

Number: 091

Name: MINOT

Pressure Base: 14.730

Temperature Base:

Contract Day: 1 Contract Hour: 9

Day	Relative Density	Heating Value Wet	Heating Value Dry	Heating Value As Del	CO2	N2	C1	C2	C3	IC4	NC4	IC5	NC5	C6	C7	C8	C9	C10	Wobbe	Cri'therm
1	0.6947	1129.1	1149.1		0.476	4.370	74.087	18.423	2.368	0.095	0.162	0.007	0.006	0.007	0.000				1378.76	
2	0.6914	1128.8	1148.8		0.451	4.121	74.727	18.096	2.320	0.097	0.165	0.009	0.008	0.004	0.000				1381.58	
3	0.6928	1129.2	1149.2		0.481	4.185	74.515	18.165	2.364	0.100	0.171	0.009	0.008	0.003	0.000				1380.66	
4	0.6903	1130.1	1150.1		0.423	3.981	74.735	18.451	2.153	0.088	0.149	0.008	0.006	0.006	0.000				1384.31	
5	0.6933	1134.5	1154.6		0.441	3.973	74.278	18.763	2.275	0.091	0.159	0.007	0.006	0.007	0.000				1386.61	
6	0.6926	1128.9	1148.9		0.460	4.218	74.556	18.085	2.390	0.099	0.172	0.009	0.008	0.005	0.000				1380.46	
7	0.6963	1135.3	1155.4		0.440	4.202	73.940	18.617	2.487	0.107	0.186	0.009	0.008	0.004	0.000				1384.61	
8	0.6943	1130.4	1150.5		0.481	4.250	74.134	18.536	2.323	0.095	0.163	0.008	0.006	0.005	0.000				1380.69	
9	0.6916	1128.7	1148.7		0.435	4.175	74.480	18.465	2.187	0.088	0.148	0.006	0.005	0.009	0.000				1381.20	
10	0.6934	1129.5	1149.5		0.484	4.217	74.191	18.631	2.220	0.088	0.148	0.007	0.005	0.009	0.000				1380.48	
11	0.6909	1124.2	1144.1		0.486	4.302	74.364	18.637	2.018	0.068	0.111	0.003	0.002	0.010	0.000				1376.49	
12	0.6913	1126.3	1146.2		0.504	4.192	74.031	19.291	1.833	0.053	0.088	0.000	0.000	0.009	0.000				1378.61	
13	0.6760	1097.3	1116.7		0.501	4.530	76.769	16.527	1.542	0.047	0.077	0.000	0.000	0.008	0.000				1358.14	
14	0.6679	1090.0	1109.3		0.387	4.381	77.964	15.948	1.213	0.038	0.062	0.000	0.000	0.008	0.000				1357.38	
15	0.6659	1082.4	1101.6		0.411	4.620	78.570	14.902	1.354	0.050	0.086	0.000	0.000	0.007	0.000				1349.89	
16	0.6672	1082.6	1101.8		0.403	4.735	78.388	14.887	1.440	0.052	0.088	0.000	0.000	0.008	0.000				1348.92	
17	0.6639	1076.3	1095.3		0.402	4.820	78.950	14.316	1.372	0.049	0.081	0.000	0.000	0.009	0.000				1344.28	
18	0.6701	1086.2	1105.4		0.409	4.785	77.901	15.215	1.529	0.057	0.095	0.001	0.000	0.008	0.000				1350.40	
19	0.6764	1094.8	1114.2		0.448	4.783	77.071	15.641	1.854	0.070	0.120	0.003	0.000	0.009	0.000				1354.82	
20	0.6722	1089.4	1108.7		0.423	4.765	77.821	14.989	1.809	0.066	0.117	0.002	0.000	0.007	0.000				1352.23	
21	0.6665	1084.0	1103.2		0.447	4.522	78.727	14.602	1.530	0.061	0.104	0.002	0.000	0.006	0.000				1351.33	
22	0.6693	1087.0	1106.2		0.481	4.554	78.437	14.625	1.687	0.074	0.126	0.005	0.002	0.009	0.000				1352.12	
23	0.6706	1085.9	1105.1		0.484	4.737	78.178	14.641	1.766	0.068	0.114	0.003	0.001	0.008	0.000				1349.45	
24	0.6788	1097.7	1117.2		0.460	4.814	77.046	15.212	2.215	0.087	0.146	0.006	0.003	0.010	0.000				1355.99	
25	0.6765	1094.1	1113.5		0.438	4.853	77.275	15.142	2.073	0.076	0.131	0.003	0.000	0.009	0.000				1353.83	
26	0.6896	1115.8	1135.5		0.411	4.803	75.475	16.257	2.704	0.126	0.202	0.008	0.005	0.009	0.000				1367.37	
27	0.6883	1114.6	1134.3		0.388	4.794	75.427	16.603	2.466	0.099	0.194	0.011	0.010	0.007	0.000				1367.16	
28	0.6894	1117.2	1137.0		0.394	4.726	74.995	17.279	2.334	0.091	0.161	0.005	0.004	0.011	0.000				1369.32	
29	0.6867	1120.6	1140.4		0.363	4.314	75.049	18.101	1.989	0.065	0.109	0.001	0.000	0.009	0.000				1376.25	
30	0.6895	1124.0	1143.9		0.371	4.354	74.612	18.369	2.096	0.069	0.117	0.003	0.001	0.008	0.000				1377.67	
31	0.6753	1095.2	1114.5		0.343	4.830	76.836	16.240	1.582	0.057	0.099	0.001	0.000	0.012	0.000				1356.24	
Avg	0.6824	1109.0	1129.0		0.436	4.481	76.049	16.828	1.984	0.077	0.131	0.004	0.003	0.008	0.000				1366.69	

Zone 262

Williston Basin Interstate Pipeline Co.

GQ Source Analysis

GQ Source Number:	2501030		
GQ Source Name:	LIGNITE PLANT	**Specific Gravity:**	0.6671
Effective Date:	12/10/2008 9:00:00 AM	**BTU Base:**	Dry
Effective End Date:	1/18/2038 9:14:07 PM	**Dry Heat Value:**	1138.97
Pressure Base:	14.730	**Wet Heat Value:**	1119.15
Viscosity:		**As Deliv. Heat Value:**	1138.97

		Mol %	Imported GPM	Calculated GPM
C1	Methane	77.750		
C2	Ethane	18.081	0.000	4.821
C3	Propane	1.090	0.300	0.300
IC4	Iso-Butane	0.001	0.000	0.000
NC4	N-Butane	0.001	0.000	0.000
IC5	Iso-Pentane	0.002	0.001	0.001
NC5	N-Pentane	0.002	0.001	0.001
C6+	Hexanes Plus	0.039	0.018	0.016
CO2	Carbon Dioxide	0.113		
N2	Nitrogen	2.911		
O2	Oxygen	0.000		
HE	Helium			
H2	Hydrogen			
H2S	Hydrogen Sulfide			
	Totals	99.991	0.320	5.139

Sample Date: 11/30/2008 12:00:00 AM
Sample Type: Composite
Sample Tech: sampler
Sample Remarks: Zone 263

Analysis Remarks:

Williston Basin Interstate Pipeline Co.

GQ Source Daily Summary

December 2008

Number: 043

Name: BISMARCK PLANT CLEVELAND PLANT

Pressure Base: 14.730

Temperature Base:

Contract Day: 1 Contract Hour: 9

Day	Relative Density	Heating Value Wet	Heating Value Dry	Heating Value As Del	CO2	N2	C1	C2	C3	IC4	NC4	IC5	NC5	C6	C7	C8	C9	C10	Wobbe	Cri'therm
1	0.6945	1128.0	1148.0		0.501	4.385	74.025	18.537	2.287	0.089	0.151	0.009	0.008	0.009	0.000				1377.47	
2	0.6930	1127.5	1147.4		0.479	4.308	74.387	18.122	2.359	0.098	0.167	0.010	0.009	0.071	0.000				1378.33	
3	0.6878	1121.8	1141.7		0.495	4.133	75.456	17.362	2.265	0.097	0.164	0.010	0.010	0.009	0.000				1376.64	
4	0.6722	1100.3	1119.8		0.535	3.912	78.283	15.127	1.887	0.087	0.138	0.011	0.009	0.011	0.000				1365.89	
5	0.6670	1092.5	1111.8		0.539	3.904	79.159	14.392	1.763	0.083	0.128	0.011	0.009	0.011	0.000				1361.33	
6	0.6618	1085.7	1105.0		0.581	3.757	80.258	13.476	1.690	0.082	0.125	0.012	0.009	0.010	0.000				1358.24	
7	0.6604	1081.0	1100.2		0.571	3.927	80.591	12.908	1.750	0.086	0.134	0.012	0.010	0.011	0.000				1353.80	
8	0.6636	1086.2	1105.4		0.555	3.935	80.028	13.384	1.828	0.092	0.144	0.013	0.011	0.010	0.000				1357.01	
9	0.6593	1078.6	1097.7		0.545	4.018	80.656	12.880	1.661	0.082	0.125	0.012	0.009	0.011	0.000				1351.80	
10	0.6621	1084.1	1103.3		0.507	4.000	80.027	13.582	1.655	0.079	0.119	0.010	0.008	0.012	0.000				1355.88	
11	0.6669	1091.0	1110.3		0.517	4.012	79.157	14.326	1.750	0.084	0.124	0.011	0.008	0.010	0.000				1359.67	
12	0.6709	1094.9	1114.3		0.548	4.112	78.193	15.261	1.691	0.068	0.101	0.009	0.007	0.011	0.000				1360.38	
13	0.6624	1085.5	1104.8		0.574	3.840	79.717	14.253	1.444	0.063	0.084	0.009	0.007	0.010	0.000				1357.36	
14	0.6263	1032.4	1050.6		0.723	3.452	86.889	7.791	0.951	0.071	0.080	0.017	0.011	0.014	0.000				1327.56	
15	0.6194	1020.5	1038.6		0.803	3.400	88.286	6.478	0.848	0.066	0.076	0.016	0.011	0.015	0.000				1319.69	
16	0.6187	1017.6	1035.6		0.845	3.453	88.311	6.477	0.757	0.053	0.066	0.013	0.010	0.015	0.000				1316.61	
17	0.6213	1021.1	1039.2		0.797	3.562	87.736	6.949	0.797	0.053	0.069	0.012	0.009	0.014	0.000				1318.33	
18	0.6197	1018.3	1036.3		0.848	3.500	88.158	6.522	0.811	0.055	0.069	0.013	0.009	0.014	0.000				1316.43	
19	0.6238	1024.3	1042.4		0.814	3.575	87.312	7.280	0.856	0.056	0.072	0.012	0.009	0.014	0.000				1319.82	
20	0.6331	1037.1	1055.4		0.740	3.782	85.529	8.724	1.048	0.060	0.084	0.012	0.009	0.013	0.000				1326.46	
21	0.6248	1025.3	1043.5		0.782	3.649	87.256	7.122	1.008	0.062	0.084	0.013	0.010	0.014	0.000				1320.17	
22	0.6251	1027.0	1045.2		0.762	3.604	87.090	7.455	0.916	0.059	0.077	0.013	0.010	0.015	0.000				1322.02	
23	0.6272	1030.7	1049.0		0.796	3.526	86.753	7.786	0.956	0.063	0.084	0.013	0.010	0.014	0.000				1324.55	
24	0.6310	1034.4	1052.7		0.785	3.682	86.113	8.120	1.104	0.066	0.093	0.013	0.010	0.015	0.000				1325.19	
25	0.6405	1047.3	1065.8		0.715	3.890	84.268	9.635	1.293	0.068	0.098	0.012	0.009	0.014	0.000				1331.79	
26	0.6439	1051.7	1070.3		0.717	3.942	83.701	10.012	1.420	0.071	0.105	0.012	0.009	0.013	0.000				1333.80	
27	0.6450	1054.1	1072.8		0.713	3.901	83.686	9.897	1.558	0.086	0.123	0.013	0.010	0.013	0.000				1335.78	
28	0.6448	1056.0	1074.7		0.705	3.780	83.780	9.911	1.563	0.086	0.136	0.014	0.011	0.014	0.000				1338.33	
29	0.6409	1048.7	1067.2		0.659	3.931	84.220	9.602	1.374	0.070	0.107	0.013	0.010	0.013	0.000				1333.10	
30	0.6368	1047.5	1066.0		0.728	3.512	84.994	9.398	1.176	0.065	0.090	0.013	0.009	0.017	0.000				1335.93	
31	0.6473	1062.8	1081.6		0.665	3.664	82.924	11.220	1.335	0.064	0.092	0.011	0.008	0.017	0.000				1344.42	
Avg	0.6481	1062.0	1080.5		0.663	3.808	82.805	11.096	1.413	0.073	0.107	0.012	0.009	0.015	0.000				1342.06	

Zone 271

Williston Basin Interstate Pipeline Co.

GQ Source Daily Summary

December 2008

Number: 063

Name: CLEVELAND PLANT MAPLETON

Pressure Base: 14.730

Temperature Base:

Contract Day: 1 Contract Hour: 9

Day	Relative Density	Heating Value Wet	Heating Value Dry	Heating Value As Del	CO2	N2	C1	C2	C3	IC4	NC4	IC5	NC5	C6	C7	C8	C9	C10	Wobbe	Cri'therm
1	0.6944	1127.7	1147.7		0.499	4.394	74.037	18.518	2.287	0.088	0.151	0.009	0.008	0.009	0.000				1377.25	
2	0.6928	1127.0	1147.0		0.480	4.312	74.477	18.091	2.350	0.097	0.166	0.010	0.009	0.008	0.000				1378.01	
3	0.6878	1121.7	1141.6		0.495	4.140	75.466	17.342	2.268	0.097	0.163	0.010	0.009	0.009	0.000				1376.51	
4	0.6722	1100.1	1119.6		0.534	3.931	78.282	15.116	1.883	0.087	0.137	0.011	0.009	0.010	0.000				1365.58	
5	0.6669	1092.1	1111.5		0.537	3.910	79.220	14.337	1.753	0.083	0.128	0.011	0.009	0.011	0.000				1361.08	
6	0.6616	1085.4	1104.6		0.580	3.762	80.289	13.448	1.683	0.082	0.125	0.012	0.009	0.010	0.000				1357.98	
7	0.6603	1080.9	1100.0		0.570	3.933	80.612	12.887	1.746	0.085	0.133	0.012	0.010	0.011	0.000				1353.64	
8	0.6635	1085.9	1105.2		0.554	3.943	80.053	13.360	1.821	0.091	0.144	0.013	0.010	0.010	0.000				1356.77	
9	0.6591	1078.1	1097.2		0.544	4.025	80.693	12.847	1.653	0.082	0.124	0.012	0.009	0.011	0.000				1351.47	
10	0.6617	1083.5	1102.7		0.506	4.002	80.083	13.545	1.639	0.078	0.117	0.010	0.008	0.012	0.000				1355.52	
11	0.6669	1091.0	1110.3		0.517	4.016	79.120	14.310	1.752	0.084	0.125	0.011	0.008	0.069	0.000				1359.58	
12	0.6711	1095.1	1114.5		0.549	4.116	78.167	15.285	1.688	0.068	0.100	0.009	0.007	0.010	0.000				1360.39	
13	0.6615	1084.3	1103.5		0.576	3.830	79.893	14.103	1.426	0.063	0.083	0.009	0.007	0.010	0.000				1356.74	
14	0.6259	1031.8	1050.0		0.724	3.454	86.962	7.723	0.944	0.071	0.080	0.017	0.011	0.014	0.000				1327.17	
15	0.6192	1020.2	1038.3		0.802	3.407	88.304	6.460	0.843	0.065	0.075	0.016	0.011	0.015	0.000				1319.46	
16	0.6186	1017.4	1035.4		0.844	3.457	88.323	6.466	0.754	0.053	0.066	0.013	0.010	0.015	0.000				1316.47	
17	0.6212	1020.9	1038.9		0.796	3.562	87.761	6.931	0.793	0.053	0.069	0.012	0.009	0.014	0.000				1318.20	
18	0.6195	1018.0	1036.1		0.849	3.498	88.186	6.500	0.808	0.055	0.069	0.013	0.009	0.014	0.000				1316.31	
19	0.6238	1024.3	1042.4		0.813	3.579	87.310	7.282	0.854	0.055	0.072	0.012	0.009	0.014	0.000				1319.78	
20	0.6329	1036.8	1055.2		0.738	3.783	85.553	8.705	1.044	0.060	0.083	0.012	0.009	0.013	0.000				1326.32	
21	0.6248	1025.3	1043.4		0.781	3.653	87.265	7.113	1.007	0.062	0.083	0.013	0.010	0.014	0.000				1320.08	
22	0.6249	1026.7	1044.9		0.762	3.609	87.110	7.434	0.913	0.058	0.077	0.013	0.010	0.014	0.000				1321.79	
23	0.6272	1030.7	1048.9		0.796	3.527	86.756	7.785	0.953	0.062	0.084	0.013	0.010	0.014	0.000				1324.52	
24	0.6310	1034.3	1052.6		0.783	3.688	86.108	8.121	1.104	0.066	0.092	0.013	0.010	0.015	0.000				1325.08	
25	0.6404	1047.1	1065.6		0.714	3.892	84.285	9.618	1.291	0.068	0.098	0.012	0.009	0.013	0.000				1331.68	
26	0.6439	1051.6	1070.2		0.716	3.946	83.704	10.008	1.417	0.071	0.105	0.012	0.009	0.013	0.000				1333.72	
27	0.6451	1054.3	1072.9		0.713	3.905	83.669	9.904	1.563	0.086	0.124	0.013	0.010	0.013	0.000				1335.80	
28	0.6445	1055.5	1074.2		0.705	3.782	83.824	9.873	1.556	0.086	0.136	0.014	0.011	0.014	0.000				1338.05	
29	0.6408	1048.5	1067.1		0.659	3.932	84.238	9.587	1.372	0.070	0.107	0.013	0.010	0.012	0.000				1333.02	
30	0.6359	1044.2	1062.7		0.734	3.619	85.099	9.211	1.150	0.064	0.089	0.012	0.009	0.013	0.000				1332.62	
31	0.6453	1059.6	1078.3		0.681	3.648	83.273	10.903	1.306	0.064	0.090	0.012	0.009	0.014	0.000				1342.34	
Avg	0.6479	1061.0	1080.1		0.663	3.815	82.843	11.058	1.407	0.073	0.106	0.012	0.009	0.014	0.000				1341.71	

Zone 272

Williston Basin Interstate Pipeline Co.

GQ Source Daily Summary

December 2008

Number: 061

Name: CLEVELAND PLANT GRAFTON

Pressure Base: 14.730

Temperature Base:

Contract Day: 1 Contract Hour: 9

Day	Relative Density	Heating Value Wet	Heating Value Dry	Heating Value As Del	CO2	N2	C1	C2	C3	IC4	NC4	IC5	NC5	C6	C7	C8	C9	C10	Wobbe	Cri'therm
1	0.6945	1128.0	1148.0		0.501	4.385	74.025	18.537	2.287	0.089	0.151	0.009	0.008	0.009	0.000				1377.47	
2	0.6930	1127.5	1147.4		0.479	4.308	74.387	18.122	2.359	0.098	0.167	0.010	0.009	0.071	0.000				1378.33	
3	0.6878	1121.8	1141.7		0.495	4.133	75.456	17.362	2.265	0.097	0.164	0.010	0.010	0.009	0.000				1376.64	
4	0.6722	1100.3	1119.8		0.535	3.912	78.283	15.127	1.887	0.087	0.138	0.011	0.009	0.011	0.000				1365.89	
5	0.6670	1092.5	1111.8		0.539	3.904	79.159	14.392	1.763	0.083	0.128	0.011	0.009	0.011	0.000				1361.33	
6	0.6618	1085.7	1105.0		0.581	3.757	80.258	13.476	1.690	0.082	0.125	0.012	0.009	0.010	0.000				1358.24	
7	0.6604	1081.0	1100.2		0.571	3.927	80.591	12.908	1.750	0.086	0.134	0.012	0.010	0.011	0.000				1353.80	
8	0.6636	1086.2	1105.4		0.555	3.935	80.028	13.384	1.828	0.092	0.144	0.013	0.011	0.010	0.000				1357.01	
9	0.6593	1078.6	1097.7		0.545	4.018	80.656	12.880	1.661	0.082	0.125	0.012	0.009	0.011	0.000				1351.80	
10	0.6621	1084.1	1103.3		0.507	4.000	80.027	13.582	1.655	0.079	0.119	0.010	0.008	0.012	0.000				1355.88	
11	0.6669	1091.0	1110.3		0.517	4.012	79.157	14.326	1.750	0.084	0.124	0.011	0.008	0.010	0.000				1359.67	
12	0.6709	1094.9	1114.3		0.548	4.112	78.193	15.261	1.691	0.068	0.101	0.009	0.007	0.011	0.000				1360.38	
13	0.6624	1085.5	1104.8		0.574	3.840	79.717	14.253	1.444	0.063	0.084	0.009	0.007	0.010	0.000				1357.36	
14	0.6263	1032.4	1050.6		0.723	3.452	86.889	7.791	0.951	0.071	0.080	0.017	0.011	0.014	0.000				1327.56	
15	0.6194	1020.5	1038.6		0.803	3.400	88.286	6.478	0.848	0.066	0.076	0.016	0.011	0.015	0.000				1319.69	
16	0.6187	1017.6	1035.6		0.845	3.453	88.311	6.477	0.757	0.053	0.066	0.013	0.010	0.015	0.000				1316.61	
17	0.6213	1021.1	1039.2		0.797	3.562	87.736	6.949	0.797	0.053	0.069	0.012	0.009	0.014	0.000				1318.33	
18	0.6197	1018.3	1036.3		0.848	3.500	88.158	6.522	0.811	0.055	0.069	0.013	0.009	0.014	0.000				1316.43	
19	0.6238	1024.3	1042.4		0.814	3.575	87.312	7.280	0.856	0.056	0.072	0.012	0.009	0.014	0.000				1319.82	
20	0.6331	1037.1	1055.4		0.740	3.782	85.529	8.724	1.048	0.060	0.084	0.012	0.009	0.013	0.000				1326.46	
21	0.6248	1025.3	1043.5		0.782	3.649	87.256	7.122	1.008	0.062	0.084	0.013	0.010	0.014	0.000				1320.17	
22	0.6251	1027.0	1045.2		0.762	3.604	87.090	7.455	0.916	0.059	0.077	0.013	0.010	0.015	0.000				1322.02	
23	0.6272	1030.7	1049.0		0.796	3.526	86.753	7.786	0.956	0.063	0.084	0.013	0.010	0.014	0.000				1324.55	
24	0.6310	1034.4	1052.7		0.785	3.682	86.113	8.120	1.104	0.066	0.093	0.013	0.010	0.015	0.000				1325.19	
25	0.6405	1047.3	1065.8		0.715	3.890	84.268	9.635	1.293	0.068	0.098	0.012	0.009	0.014	0.000				1331.79	
26	0.6439	1051.7	1070.3		0.717	3.942	83.701	10.012	1.420	0.071	0.105	0.012	0.009	0.013	0.000				1333.80	
27	0.6450	1054.1	1072.8		0.713	3.901	83.686	9.897	1.558	0.086	0.123	0.013	0.010	0.013	0.000				1335.78	
28	0.6448	1056.0	1074.7		0.705	3.780	83.780	9.911	1.563	0.086	0.136	0.014	0.011	0.014	0.000				1338.33	
29	0.6409	1048.7	1067.2		0.659	3.931	84.220	9.602	1.374	0.070	0.107	0.013	0.010	0.013	0.000				1333.10	
30	0.6358	1044.0	1062.5		0.735	3.619	85.109	9.203	1.147	0.064	0.089	0.012	0.009	0.013	0.000				1332.50	
31	0.6453	1059.7	1078.5		0.682	3.636	83.274	10.910	1.308	0.064	0.090	0.012	0.009	0.014	0.000				1342.58	
Avg	0.6480	1062.0	1080.3		0.664	3.811	82.820	11.080	1.411	0.073	0.107	0.012	0.009	0.014	0.000				1341.89	

Zone 273

Williston Basin Interstate Pipeline Co.

GQ Source Daily Summary

December 2008

Number: 041

Name: BISMARCK PLANT DICKINSON PLANT

Pressure Base: 14.730

Temperature Base:

Contract Day: 1 Contract Hour: 9

Day	Relative Density	Heating Value Wet	Heating Value Dry	Heating Value As Del	CO2	N2	C1	C2	C3	IC4	NC4	IC5	NC5	C6	C7	C8	C9	C10	Wobbe	Cri'therm
1	0.5997	991.3	1008.9		0.814	3.321	91.983	3.201	0.527	0.057	0.054	0.014	0.009	0.018	0.000				1302.80	
2	0.6020	994.5	1012.1		0.873	3.252	91.604	3.572	0.551	0.056	0.052	0.013	0.011	0.017	0.000				1304.51	
3	0.6026	996.7	1014.4		0.812	3.272	91.496	3.651	0.600	0.065	0.063	0.015	0.009	0.017	0.000				1306.69	
4	0.6038	1000.1	1017.8		0.775	3.229	91.297	3.884	0.632	0.069	0.067	0.017	0.010	0.020	0.000				1309.91	
5	0.6037	998.6	1016.3		0.816	3.255	91.290	3.862	0.603	0.064	0.065	0.016	0.010	0.019	0.000				1307.95	
6	0.6023	996.7	1014.4		0.747	3.335	91.473	3.696	0.580	0.062	0.062	0.016	0.010	0.018	0.000				1307.11	
7	0.6021	995.5	1013.1		0.772	3.362	91.504	3.622	0.578	0.060	0.062	0.015	0.010	0.016	0.000				1305.60	
8	0.6044	999.9	1017.6		0.652	3.489	90.993	4.052	0.637	0.066	0.067	0.017	0.011	0.017	0.000				1308.94	
9	0.6052	1000.3	1018.0		0.606	3.610	90.760	4.198	0.659	0.063	0.064	0.015	0.009	0.015	0.000				1308.56	
10	0.6085	1006.0	1023.8		0.644	3.506	90.258	4.682	0.722	0.070	0.073	0.017	0.011	0.016	0.000				1312.48	
11	0.6068	1005.7	1023.5		0.597	3.438	90.550	4.529	0.693	0.076	0.073	0.018	0.012	0.015	0.000				1313.92	
12	0.6109	1010.3	1028.2		0.720	3.360	89.909	5.062	0.747	0.073	0.078	0.019	0.013	0.019	0.000				1315.46	
13	0.6091	1012.8	1030.7		0.736	3.008	90.426	4.845	0.762	0.087	0.083	0.021	0.014	0.019	0.000				1320.68	
14	0.6087	1008.4	1026.3		0.833	3.094	90.510	4.630	0.722	0.077	0.080	0.020	0.014	0.019	0.000				1315.40	
15	0.6081	1004.3	1022.1		0.885	3.204	90.574	4.479	0.675	0.063	0.072	0.017	0.012	0.019	0.000				1310.76	
16	0.6067	1001.3	1019.0		0.943	3.171	90.838	4.257	0.623	0.056	0.066	0.016	0.012	0.018	0.000				1308.26	
17	0.6058	1000.7	1018.4		0.961	3.098	91.016	4.154	0.606	0.055	0.065	0.015	0.011	0.018	0.000				1308.45	
18	0.6058	1001.2	1018.9		0.989	3.022	91.081	4.133	0.605	0.057	0.067	0.016	0.012	0.019	0.000				1309.15	
19	0.6063	1001.9	1019.7		0.967	3.057	90.961	4.227	0.615	0.057	0.067	0.016	0.012	0.019	0.000				1309.57	
20	0.6066	1002.0	1019.7		0.921	3.154	90.854	4.266	0.632	0.058	0.068	0.016	0.012	0.019	0.000				1309.27	
21	0.6070	1002.9	1020.7		0.908	3.157	90.762	4.362	0.637	0.058	0.068	0.016	0.012	0.020	0.000				1310.05	
22	0.6069	1003.3	1021.1		0.916	3.107	90.806	4.362	0.634	0.059	0.068	0.016	0.012	0.019	0.000				1310.71	
23	0.6065	1003.3	1021.1		0.970	2.985	90.972	4.265	0.628	0.060	0.069	0.017	0.013	0.021	0.000				1311.19	
24	0.6069	1004.4	1022.2		0.960	2.976	90.874	4.384	0.626	0.060	0.069	0.017	0.013	0.021	0.000				1312.09	
25	0.6065	1004.0	1021.7		0.975	2.944	90.972	4.301	0.626	0.061	0.069	0.018	0.013	0.021	0.000				1311.95	
26	0.6053	1002.9	1020.6		1.029	2.811	91.296	4.071	0.607	0.062	0.070	0.018	0.013	0.023	0.000				1311.88	
27	0.6053	1001.9	1019.7		0.978	2.951	91.191	4.095	0.605	0.061	0.068	0.018	0.013	0.021	0.000				1310.60	
28	0.6034	997.8	1015.5		0.929	3.097	91.447	3.795	0.561	0.057	0.064	0.017	0.012	0.020	0.000				1307.26	
29	0.6030	997.0	1014.6		0.904	3.148	91.474	3.756	0.559	0.055	0.060	0.016	0.011	0.018	0.000				1306.59	
30	0.6069	1004.7	1022.5		0.953	2.968	90.863	4.406	0.632	0.060	0.067	0.017	0.012	0.020	0.000				1312.50	
31	0.6070	1004.4	1022.2		0.937	3.015	90.841	4.387	0.638	0.062	0.070	0.018	0.013	0.020	0.000				1312.09	
Avg	0.6056	1002.0	1019.5		0.856	3.174	90.993	4.171	0.630	0.063	0.068	0.017	0.012	0.019	0.000				1310.10	

Zone 28

Williston Basin Interstate Pipeline Co.

GQ Source Daily Summary

December 2008

Number: 271

Name: DICKINSON BORDER

Pressure Base: 14.730

Temperature Base:

Contract Day: 1 Contract Hour: 9

Day	Relative Density	Heating Value Wet	Heating Value Dry	Heating Value As Del	CO2	N2	C1	C2	C3	IC4	NC4	IC5	NC5	C6	C7	C8	C9	C10	Wobbe	Cri'therm
1	0.5997	990.1	1007.6		0.867	3.308	91.955	3.207	0.531	0.056	0.053	0.000	0.000	0.024	0.000				1301.17	
2	0.6020	994.0	1011.6		0.898	3.242	91.544	3.629	0.555	0.056	0.053	0.000	0.000	0.023	0.000				1303.75	
3	0.6025	995.9	1013.5		0.845	3.254	91.482	3.663	0.605	0.064	0.062	0.000	0.000	0.025	0.000				1305.69	
4	0.6036	998.8	1016.5		0.813	3.223	91.283	3.895	0.628	0.067	0.065	0.000	0.000	0.027	0.000				1308.38	
5	0.6032	996.9	1014.5		0.851	3.247	91.335	3.821	0.596	0.063	0.063	0.000	0.000	0.024	0.000				1306.27	
6	0.6018	995.4	1013.0		0.768	3.327	91.510	3.674	0.577	0.060	0.061	0.000	0.000	0.023	0.000				1305.91	
7	0.6016	994.4	1012.0		0.778	3.357	91.534	3.613	0.576	0.059	0.061	0.000	0.000	0.021	0.000				1304.78	
8	0.6041	999.0	1016.7		0.651	3.510	90.955	4.093	0.639	0.064	0.065	0.000	0.000	0.023	0.000				1308.05	
9	0.6046	999.6	1017.3		0.613	3.570	90.827	4.185	0.658	0.062	0.063	0.000	0.000	0.022	0.000				1308.40	
10	0.6054	1003.7	1021.4		0.590	3.435	90.709	4.423	0.680	0.072	0.068	0.000	0.000	0.022	0.000				1312.79	
11	0.6071	1004.9	1022.7		0.694	3.366	90.510	4.552	0.705	0.073	0.075	0.000	0.000	0.024	0.000				1312.50	
12	0.6067	1007.6	1025.4		0.700	3.154	90.673	4.573	0.722	0.077	0.076	0.000	0.000	0.026	0.000				1316.45	
13	0.6091	1012.1	1030.0		0.797	2.956	90.406	4.868	0.773	0.085	0.084	0.004	0.000	0.026	0.000				1319.73	
14	0.6077	1005.4	1023.2		0.859	3.138	90.596	4.531	0.706	0.070	0.075	0.000	0.000	0.025	0.000				1312.55	
15	0.6072	1001.4	1019.2		0.952	3.189	90.686	4.375	0.651	0.057	0.067	0.000	0.000	0.024	0.000				1307.94	
16	0.6061	1000.2	1017.9		0.972	3.135	90.886	4.246	0.620	0.053	0.063	0.000	0.000	0.023	0.000				1307.44	
17	0.6054	999.7	1017.4		1.004	3.056	91.053	4.139	0.607	0.053	0.063	0.000	0.000	0.024	0.000				1307.50	
18	0.6054	1000.1	1017.8		1.021	3.004	91.090	4.130	0.609	0.055	0.065	0.000	0.000	0.026	0.000				1308.06	
19	0.6060	1000.9	1018.6		0.985	3.061	90.948	4.239	0.623	0.055	0.065	0.000	0.000	0.025	0.000				1308.52	
20	0.6063	1000.8	1018.6		0.943	3.153	90.853	4.265	0.638	0.056	0.066	0.000	0.000	0.025	0.000				1308.15	
21	0.6066	1001.7	1019.5		0.943	3.132	90.787	4.352	0.638	0.056	0.066	0.000	0.000	0.025	0.000				1308.94	
22	0.6063	1002.3	1020.0		0.967	3.033	90.895	4.321	0.633	0.057	0.067	0.000	0.000	0.027	0.000				1309.98	
23	0.6063	1002.4	1020.2		0.991	2.984	90.932	4.310	0.632	0.058	0.067	0.000	0.000	0.026	0.000				1310.23	
24	0.6063	1003.3	1021.0		0.985	2.945	90.924	4.368	0.626	0.058	0.067	0.000	0.000	0.027	0.000				1311.28	
25	0.6054	1002.0	1019.8		1.005	2.905	91.127	4.193	0.618	0.059	0.067	0.000	0.000	0.027	0.000				1310.64	
26	0.6048	1001.8	1019.6		1.058	2.779	91.321	4.078	0.608	0.060	0.068	0.000	0.000	0.027	0.000				1311.03	
27	0.6046	1000.1	1017.8		0.969	3.002	91.215	4.060	0.605	0.058	0.066	0.000	0.000	0.025	0.000				1308.99	
28	0.5998	990.9	1008.4		0.913	3.204	91.954	3.304	0.496	0.050	0.055	0.000	0.000	0.024	0.000				1302.02	
29	0.6053	1001.9	1019.6		0.952	2.984	91.071	4.227	0.623	0.056	0.062	0.000	0.000	0.025	0.000				1310.54	
30	0.6065	1003.5	1021.2		0.971	2.974	90.869	4.397	0.639	0.058	0.066	0.000	0.000	0.026	0.000				1311.32	
31	0.6063	1003.3	1021.0		0.953	2.996	90.889	4.372	0.638	0.059	0.067	0.000	0.000	0.026	0.000				1311.27	
Avg	0.6050	1000.0	1018.2		0.881	3.149	91.059	4.132	0.628	0.061	0.065	0.000	0.000	0.025	0.000				1309.04	

Zone 31

Williston Basin Interstate Pipeline Co.

GQ Source Daily Summary

December 2008

Number: 051

Name: CABIN CREEK DICKINSON PLANT

Pressure Base: 14.730

Temperature Base:

Contract Day: 1 Contract Hour: 9

Day	Relative Density	Heating Value Wet	Heating Value Dry	Heating Value As Del	CO2	N2	C1	C2	C3	IC4	NC4	IC5	NC5	C6	C7	C8	C9	C10	Wobbe	Cri'therm
1	0.5991	989.2	1006.7		0.857	3.327	92.136	3.006	0.520	0.058	0.055	0.014	0.009	0.018	0.000				1300.65	
2	0.6026	995.3	1012.9		0.890	3.234	91.535	3.610	0.575	0.060	0.058	0.014	0.009	0.016	0.000				1304.83	
3	0.6025	996.6	1014.2		0.813	3.262	91.559	3.576	0.612	0.067	0.065	0.017	0.011	0.018	0.000				1306.65	
4	0.6035	999.0	1016.7		0.781	3.261	91.352	3.788	0.631	0.070	0.069	0.017	0.011	0.020	0.000				1308.68	
5	0.6024	995.6	1013.2		0.833	3.286	91.555	3.567	0.584	0.065	0.066	0.017	0.011	0.017	0.000				1305.42	
6	0.6012	994.4	1012.0		0.760	3.360	91.675	3.472	0.568	0.060	0.062	0.015	0.010	0.017	0.000				1305.10	
7	0.6020	995.3	1012.9		0.751	3.385	91.552	3.547	0.592	0.065	0.065	0.017	0.011	0.015	0.000				1305.54	
8	0.6045	998.2	1015.8		0.637	3.624	90.928	3.998	0.643	0.063	0.066	0.016	0.011	0.015	0.000				1306.53	
9	0.6048	999.9	1017.6		0.631	3.557	90.888	4.087	0.661	0.066	0.067	0.016	0.011	0.015	0.000				1308.45	
10	0.6053	1003.4	1021.1		0.584	3.456	90.830	4.254	0.684	0.076	0.072	0.018	0.011	0.015	0.000				1312.53	
11	0.6068	1003.2	1021.0		0.730	3.389	90.713	4.265	0.703	0.073	0.077	0.019	0.014	0.018	0.000				1310.68	
12	0.6069	1008.8	1026.6		0.711	3.083	90.803	4.447	0.741	0.084	0.080	0.020	0.013	0.019	0.000				1317.86	
13	0.6082	1009.2	1027.1		0.819	3.022	90.661	4.525	0.751	0.083	0.084	0.021	0.014	0.020	0.000				1316.94	
14	0.6080	1005.8	1023.6		0.851	3.161	90.625	4.455	0.710	0.071	0.076	0.018	0.013	0.019	0.000				1312.72	
15	0.6061	999.7	1017.4		0.948	3.209	90.956	4.085	0.632	0.057	0.067	0.016	0.012	0.018	0.000				1306.80	
16	0.6054	999.5	1017.2		0.948	3.150	91.101	4.020	0.616	0.056	0.066	0.015	0.011	0.018	0.000				1307.34	
17	0.6049	999.4	1017.1		0.982	3.061	91.243	3.938	0.607	0.057	0.066	0.016	0.011	0.019	0.000				1307.72	
18	0.6048	999.6	1017.3		0.993	3.024	91.285	3.917	0.608	0.058	0.067	0.016	0.012	0.020	0.000				1308.06	
19	0.6054	1000.3	1018.0		0.946	3.109	91.107	4.044	0.622	0.058	0.068	0.016	0.012	0.019	0.000				1308.36	
20	0.6060	1001.0	1018.7		0.906	3.183	90.957	4.145	0.634	0.058	0.069	0.016	0.012	0.019	0.000				1308.59	
21	0.6060	1001.4	1019.1		0.912	3.147	90.973	4.158	0.635	0.059	0.069	0.016	0.012	0.019	0.000				1309.16	
22	0.6055	1001.6	1019.3		0.965	3.008	91.159	4.063	0.625	0.060	0.069	0.017	0.012	0.021	0.000				1309.93	
23	0.6059	1002.2	1019.9		0.955	3.023	91.070	4.140	0.632	0.061	0.070	0.017	0.012	0.021	0.000				1310.33	
24	0.6056	1002.3	1020.0		0.977	2.954	91.168	4.095	0.624	0.061	0.069	0.017	0.012	0.022	0.000				1310.77	
25	0.6047	1001.6	1019.3		1.011	2.858	91.391	3.947	0.609	0.062	0.069	0.018	0.013	0.022	0.000				1310.87	
26	0.6044	1000.8	1018.5		1.007	2.885	91.431	3.894	0.601	0.061	0.069	0.018	0.013	0.022	0.000				1310.17	
27	0.6038	998.7	1016.4		0.949	3.045	91.445	3.796	0.590	0.059	0.067	0.017	0.012	0.020	0.000				1308.05	
28	0.6000	991.3	1008.9		0.890	3.236	91.990	3.223	0.507	0.053	0.058	0.015	0.010	0.019	0.000				1302.40	
29	0.6058	1003.1	1020.9		0.960	2.954	91.100	4.168	0.642	0.060	0.067	0.017	0.012	0.020	0.000				1311.56	
30	0.6060	1002.8	1020.6		0.946	3.011	91.044	4.179	0.638	0.062	0.070	0.017	0.012	0.020	0.000				1311.00	
31	0.6059	1002.7	1020.5		0.946	3.003	91.076	4.161	0.633	0.062	0.070	0.017	0.012	0.020	0.000				1311.02	
Avg	0.6046	1000.0	1017.8		0.867	3.170	91.203	3.954	0.627	0.063	0.068	0.017	0.012	0.019	0.000				1308.86	

Zone 32

Williston Basin Interstate Pipeline Co.

GQ Source Daily Summary

December 2008

Number: 111

Name: LITTLE KNIFE PLANT

Pressure Base: 14.730

Temperature Base:

Contract Day: 1 Contract Hour: 9

Day	Relative Density	Heating Value Wet	Heating Value Dry	Heating Value As Del	CO2	N2	C1	C2	C3	IC4	NC4	IC5	NC5	C6	C7	C8	C9	C10	Wobbe	Cri'therm
1	0.6669	1134.7	1154.8		0.000	2.158	77.240	20.069	0.513	0.008	0.010	0.000	0.000	0.001	0.000				1414.07	
2	0.6664	1133.9	1154.0		0.000	2.158	77.315	20.028	0.479	0.008	0.010	0.000	0.000	0.001	0.000				1413.59	
3	0.6658	1134.0	1154.0		0.000	2.096	77.447	19.969	0.469	0.008	0.011	0.000	0.000	0.001	0.000				1414.34	
4	0.6661	1134.3	1154.4		0.000	2.106	77.379	20.012	0.483	0.008	0.010	0.000	0.000	0.001	0.000				1414.43	
5	0.6672	1135.3	1155.4		0.000	2.147	77.183	20.140	0.511	0.008	0.011	0.000	0.000	0.001	0.000				1414.54	
6	0.6674	1135.7	1155.8		0.000	2.140	77.138	20.199	0.503	0.008	0.010	0.000	0.000	0.001	0.000				1414.82	
7	0.6677	1136.1	1156.3		0.000	2.146	77.091	20.223	0.521	0.008	0.011	0.000	0.000	0.001	0.000				1415.00	
8	0.6677	1136.2	1156.4		0.000	2.138	77.067	20.283	0.492	0.008	0.011	0.000	0.000	0.001	0.000				1415.13	
9	0.6674	1136.2	1156.3		0.000	2.110	77.141	20.228	0.501	0.008	0.011	0.000	0.000	0.001	0.000				1415.44	
10	0.6670	1135.2	1155.3		0.000	2.138	77.229	20.100	0.514	0.009	0.011	0.000	0.000	0.001	0.000				1414.54	
11	0.6664	1134.0	1154.0		0.000	2.154	77.343	19.978	0.505	0.008	0.011	0.000	0.000	0.001	0.000				1413.69	
12	0.6667	1134.6	1154.7		0.000	2.143	77.274	20.068	0.496	0.008	0.010	0.000	0.000	0.001	0.000				1414.16	
13	0.6663	1134.4	1154.4		0.000	2.116	77.348	20.046	0.468	0.009	0.012	0.000	0.000	0.001	0.000				1414.33	
14	0.6639	1130.6	1150.6		0.000	2.120	77.769	19.681	0.413	0.008	0.010	0.000	0.000	0.000	0.000				1412.20	
15	0.6646	1131.9	1152.0		0.000	2.109	77.584	19.912	0.379	0.007	0.008	0.000	0.000	0.000	0.000				1413.07	
16	0.6696	1139.5	1159.7		0.000	2.115	76.815	20.428	0.624	0.008	0.010	0.000	0.000	0.000	0.000				1417.22	
17	0.6696	1138.7	1158.9		0.000	2.163	76.943	20.111	0.761	0.009	0.013	0.000	0.000	0.000	0.000				1416.23	
18	0.6653	1131.8	1151.8		0.000	2.186	77.569	19.710	0.513	0.009	0.014	0.000	0.000	0.000	0.000				1412.08	
19	0.6695	1138.7	1158.9		0.000	2.157	76.914	20.195	0.711	0.009	0.014	0.000	0.000	0.000	0.000				1416.29	
20	0.6673	1135.3	1155.4		0.000	2.157	77.221	20.035	0.567	0.008	0.012	0.000	0.000	0.000	0.000				1414.39	
21	0.6636	1129.2	1149.2		0.000	2.179	77.887	19.436	0.475	0.008	0.013	0.000	0.000	0.000	0.000				1410.72	
22	0.6639	1130.2	1150.2		0.000	2.149	77.740	19.701	0.394	0.007	0.009	0.000	0.000	0.000	0.000				1411.62	
23	0.6616	1127.2	1147.2		0.000	2.109	78.223	19.260	0.392	0.007	0.009	0.000	0.000	0.000	0.000				1410.41	
24	0.6646	1131.7	1151.7		0.000	2.127	77.619	19.812	0.425	0.007	0.009	0.000	0.000	0.000	0.000				1412.71	
25	0.6651	1131.5	1151.6		0.000	2.176	77.526	19.854	0.428	0.007	0.009	0.000	0.000	0.000	0.000				1412.09	
26	0.6647	1130.9	1150.9		0.000	2.179	77.575	19.830	0.399	0.007	0.009	0.000	0.000	0.000	0.000				1411.70	
27	0.6655	1132.5	1152.6		0.000	2.154	77.467	19.918	0.443	0.007	0.009	0.000	0.000	0.000	0.000				1412.86	
28	0.6670	1134.7	1154.8		0.000	2.163	77.189	20.158	0.472	0.008	0.010	0.000	0.000	0.000	0.000				1413.98	
29	0.6661	1133.5	1153.6		0.000	2.155	77.320	20.079	0.429	0.007	0.010	0.000	0.000	0.000	0.000				1413.41	
30	0.6665	1133.8	1153.9		0.000	2.175	77.238	20.137	0.433	0.007	0.009	0.000	0.000	0.000	0.000				1413.35	
31	0.6665	1134.0	1154.1		0.000	2.162	77.258	20.117	0.446	0.007	0.009	0.000	0.000	0.000	0.000				1413.60	
Avg	0.6663	1134.0	1154.0		0.000	2.145	77.357	19.991	0.489	0.008	0.011	0.000	0.000	0.000	0.000				1413.74	

Zone 33

Williston Basin Interstate Pipeline Co.

GQ Source Analysis

GQ Source Number:	1202160		
GQ Source Name:	BOWMAN BORDER	**Specific Gravity:**	0.8057
Effective Date:	12/31/2008 9:00:00 AM	**BTU Base:**	Dry
Effective End Date:	1/18/2038 9:14:07 PM	**Dry Heat Value:**	1167.91
Pressure Base:	14.730	**Wet Heat Value:**	1147.59
Viscosity:		**As Deliv. Heat Value:**	1167.91

		Mol %	Imported GPM	Calculated GPM
C1	Methane	54.199		
C2	Ethane	27.642		7.371
C3	Propane	4.486	1.232	1.232
IC4	Iso-Butane	0.100	0.032	0.032
NC4	N-Butane	0.297	0.093	0.093
IC5	Iso-Pentane	0.013	0.005	0.005
NC5	N-Pentane	0.034	0.012	0.012
C6+	Hexanes Plus	0.004	0.002	0.002
CO2	Carbon Dioxide	2.272		
N2	Nitrogen	10.951		
O2	Oxygen	0.000		
HE	Helium			
H2	Hydrogen			
H2S	Hydrogen Sulfide			
	Totals	99.998	1.377	8.748

Sample Date: 12/18/2008 12:00:00 AM
Sample Type: Composite
Sample Tech: sampler
Sample Remarks: Zone 34

Analysis Remarks:

Williston Basin Interstate Pipeline Co.

GQ Source Analysis

GQ Source Number:	1201140		
GQ Source Name:	EAGLE 8B ND	**Specific Gravity:**	0.5740
Effective Date:	7/1/2008 9:00:00 AM	**BTU Base:**	Dry
Effective End Date:	1/18/2038 9:14:07 PM	**Dry Heat Value:**	974.02
Pressure Base:	14.730	**Wet Heat Value:**	957.16
Viscosity:		**As Deliv. Heat Value:**	974.02

		Mol %	Imported GPM	Calculated GPM
C1	Methane	95.505		
C2	Ethane	0.281	0.076	0.075
C3	Propane	0.009	0.002	0.002
IC4	Iso-Butane	0.007	0.002	0.002
NC4	N-Butane	0.000	0.000	
IC5	Iso-Pentane	0.000	0.000	
NC5	N-Pentane	0.000	0.000	
C6+	Hexanes Plus	0.000	0.000	0.000
CO2	Carbon Dioxide	0.072		
N2	Nitrogen	4.126		
O2	Oxygen	0.000		
HE	Helium	0.000		
H2	Hydrogen	0.000		
H2S	Hydrogen Sulfide	0.000		
	Totals	100.000	0.080	0.080

Sample Date: 6/13/2006 9:00:00 AM
Sample Type: Spot
Sample Tech: MG
Sample Remarks: Zone 35

Analysis Remarks:

NORTH DAKOTA HEATING VALUE ZONES		
ZONES	***MEASURING DEVICE***	***LOCATION***
211	Chromatograph	Sidney Area
24	Monthly Sampler	Williston Area
25	Monthly Sampler	Watford City Area
261	Chromatograph	Williston – Tioga – Minot Line
262	Chromatograph	Minot Area
263	Monthly Sampler	Tioga – Portal
264	Monthly Sampler	Williston – Ray
271	Chromatograph	Bismarck – Cleveland
272	Chromatograph	Cleveland – Mapleton
273	Chromatograph	Cleveland – Grafton
28	Chromatograph	Bismarck
31	Chromatograph	Dickinson
32	Chromatograph	Cabin Creek – Dickinson
33	Chromatograph	Killdeer
34	Monthly Sampler	Bowman Area
35	Monthly Sampler	Baker Field – North Dakota

MONTANA DAKOTA UTILITIES CO
NORTH DAKOTA
HEATING VALUE DATA
12 MONTH ACCUMULATIVE AT 14.73 psia, 60 f. DRY

STATE	ZONE	ZONE BOUNDARY	12 MONTH AVERAGE	DEC 08	NOV 08	OCT 08	SEPT 08	AUG 08	JULY 08	JUNE 08	MAY 08	APR 08	MAR 08	FEB 08	JAN 08	ZONE
MT/ND	211	Sidney Area	1149	1065	1184	1195	1198	1194	1192	1195	1190	1180	1095	1028	1075	21
ND	24	Williston Area	1180	1195	1171	1173	1175	1189	1189	1189	1193	1167	1160	1173	1181	24
ND	25	Watford City Area	1127	1127	1126	1130	1129	1131	1132	1130	1130	1120	1119	1125	1126	25
ND	261	Williston - Tioga - Minot Line	1137	1123	1148	1112	1130	1135	1148	1141	1147	1155	1140	1126	1136	261
ND	262	Minot Area	1139	1129	1147	1116	1133	1141	1147	1144	1152	1156	1141	1127	1136	262
ND	263	Tioga - Portal	1133	1139	1125	1129	1142	1145	1141	1132	1136	1127	1125	1130	1129	263
ND	264	Williston - Ray	1182	1195	1171	1173	1175	1189	1189	1189	1193	1167	0	0	0	264
ND	271	Bismarck - Cleveland	1110	1081	1129	1068	1127	1140	1146	1142	1151	1138	1086	1053	1059	271
ND	272	Cleveland - Mapleton	1110	1080	1129	1068	1126	1140	1146	1142	1151	1137	1086	1052	1059	272
ND	273	Cleveland - Grafton	1110	1080	1129	1068	1127	1140	1146	1142	1151	1137	1086	1052	1059	273
ND	28	Bismarck - Cabin Creek	1066	1020	1013	1038	1088	1116	1147	1143	1135	1035	1023	1022	1017	28
ND	31	Dickinson Area	1028	1018	1008	1037	1038	1044	1040	1032	1037	1023	1022	1021	1016	31
ND/MT	32	Cabin Creek - Dickinson	1025	1018	1007	1037	1032	1036	1036	1027	1031	1019	1020	1019	1014	32
ND	33	Killdeer	1144	1154	1160	1158	1158	1161	1158	1149	1146	1126	1122	1118	1114	33
ND	34	Bowman Area	1168	1168	1160	1176	1176	1179	1170	1165	1167	1158	1161	1165	1174	34
ND	35	Baker Field - North Dakota	975	974	974	974	974	974	974	976	976	976	976	976	976	35

Attachment D
Page 1 of 1

THERMAL ZONE VARIANCE DOCUMENTATION December 2008		
ZONE	***BTU VARIANCE***	***REASON***
211	-119	Receipt from Morgan Creek and Sidney Area
24	24	Receipt from Sidney Plant
261	-25	Receipt from Tioga and Williston Area
264	24	Receipt from Sidney Plant
271	-48	Receipt from Dickinson and Minot Area
272	-49	Receipt from Dickinson and Minot Area
273	-49	Receipt from Dickinson and Minot Area