



October 9, 2008

CQI Report to Stakeholders

Subject: August 2008 Condensate Results

As of January 1, 2008, the Crude Quality Monitoring Project has modified its condensate testing program. We acknowledge that industry requirements and specifications are different for condensates than for other types of crude. As such, we have updated our condensate testing program in an effort to provide the industry with reliable, accurate, and usable information specifically relevant to condensates. We believe that this information will be valuable for numerous industry purposes, such as better blending data and formulating condensate specifications and guidelines. Should you have any questions regarding this report, or the modified condensate testing program, please contact Crude Quality Inc. at (780) 991-9900 or at lywood@crudequality.com.

Observations:

Attached are detailed C30+ compositional and trace sulphur analyses, as well as historical data from crudemonitor.ca pertaining to typical light ends and bulk properties for Condensate Blend (CRW).

In addition to the attached, we note the following testing results:

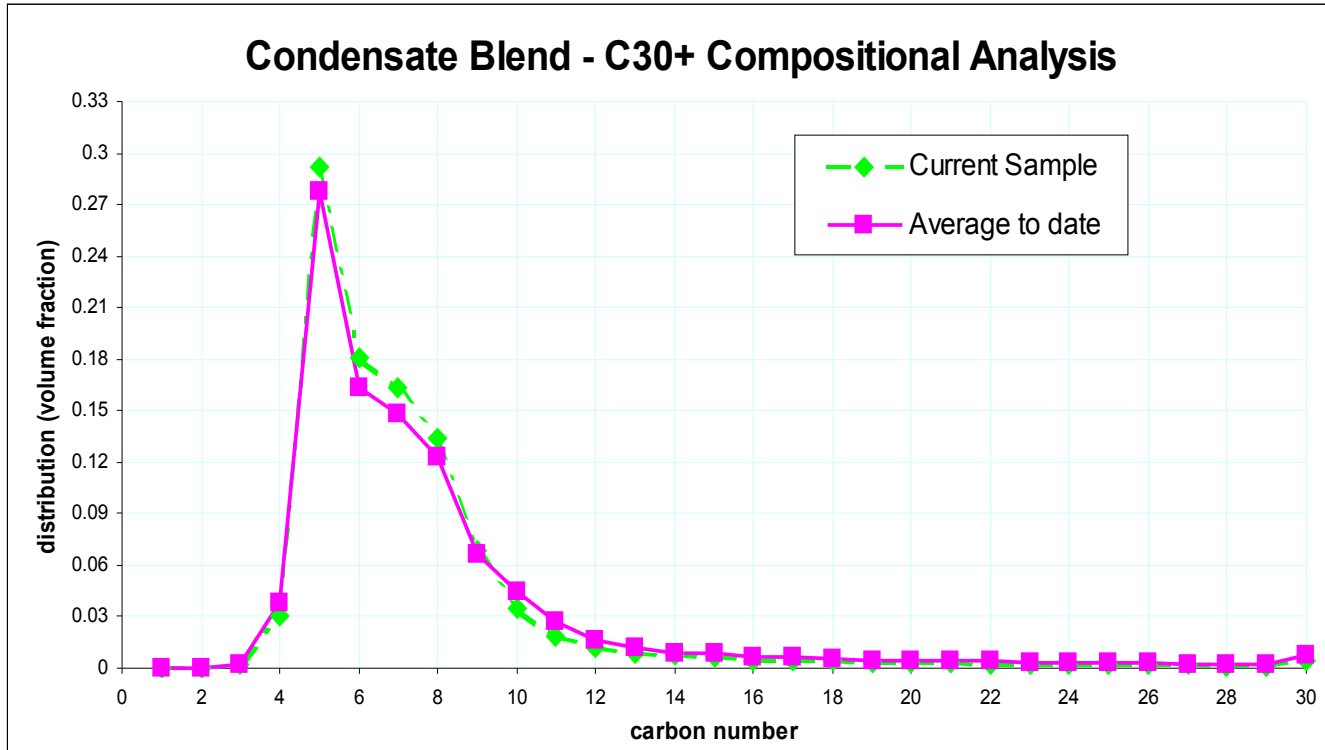
	Sample Date	Batch #	Sulphur (wt%)	API Gravity (degree)	Absolute Density (kg/m ³)	MCR (wt%)	Viscosity @ 7.5°C (cSt)	RVP (kPa)	Organo-Phosphates (ppmw)	Total Mercaptans (ppm)	Olefins (wt%)
Current Data	8/17/2008	CRW-792	0.17	67.7	709.8	0.10	0.80	-	0.5	65	-
Average To Date			0.19	64.8	720.4	0.24	0.83	74.5	.75	100	5xND
Std Dev.			0.09	2.0	7.4	0.14	0.05	0.8	.35	17	-
Avg+StdDev			0.28	66.8	727.9	0.38	0.88	75.3	1.1	117	-
Avg-StdDev			0.10	62.8	713.0	0.10	0.78	73.7	0.4	82	-

The August sample of CRW exhibited slightly increased C6s x C8s along with marginally decreased C3s x C4s, C10s x C11s, C15s x C22s, C24s x C25s, and C30+ (see Figure 1). As a result of this overall increase in light components, the sample's density was lower than average. Mercaptans were also observed at levels well below average.

For the first time ever, Condensate Blend (CRW) was tested for oxygenates by PONAOX(U). This is consistent with the condensate quality specifications proposed by the CAPP Crude Quality Committee. This sample contained oxygenates at a level of <0.01 liquid volume %.



Figure 1. C30+ Compositional Analysis for CRW-792





C30+ COMPOSITIONAL ANALYSIS

A847102:L51904

MaxxID

Client ID

Meter Number

Laboratory Number

CRUDE QUALITY INC.

Operator Name

LSD

Well ID

CRUDE QUALITY INC. AUG08 LIGHT CRUDES

ENBRIDGE

Well Name

Initials of Sampler

Sampling Company

COND. BLEND CRW-792

1L CAN

Field or Area

Pool or Zone

Sample Point

Container Identity

Percent Full

Test Recovery

Interval 1 Interval 2 Interval 3

Elevations (m)

Sample Gathering Point

Solution Gas

Test Type No. Multiple Recovery

From: To:

KB GRD

Well Fluid Status

Well Status Mode

Production Rates

Gauge Pressures kPa

Temperature °C

Well Status Type

Well Type

Water m3/d Oil m3/d Gas 1000m3/d

Source As Received

Source As Received

Gas or Condensate Project

Licence No.

2008/08/17

2008/09/11

2008/10/02

GM1

Date Sampled Start

Date Sampled End

Date Received

Date Reported

Date Reissued

Analyst

COMPOSITION

COMPONENT	MOLE FRACTION	MASS FRACTION	VOLUME FRACTION
N2			
CO2			
H2S			
C1	0.0000	0.0000	0.0000
C2	Trace	Trace	Trace
C3	0.0029	0.0014	0.0019
IC4	0.0055	0.0034	0.0042
NC4	0.0355	0.0222	0.0263
IC5	0.1645	0.1277	0.1422
NC5	0.1744	0.1354	0.1492
C6	0.1877	0.1738	0.1807
C7+	0.4295	0.5361	0.4955
TOTAL	1.0000	1.0000	1.0000

PROPERTIES

RESIDUE	RELATIVE DENSITY @ 15 °C		RELATIVE MOLECULAR MASS		DATA SUMMARY		
	OBSERVED	CALCULATED	OBSERVED	CALCULATED	MOLE FRACTION	MASS FRACTION	VOLUME FRACTION
C5+		0.700		95	0.9561	0.9730	0.9676
C6+		0.731		107	0.6172	0.7099	0.6762
C7+	0.753		116	116	0.4295	0.5361	0.4955
C10+					0.0764	0.1509	0.1298
C12+					0.0382	0.0931	0.0765
TOTAL		0.696		93			

Calculated Absolute Density Total Sample: 695.4 kg/m3 @ 15°C
 Gas Equivalent Factor: 176.62 m3 Gas/m3 Liquid

** Information not supplied by client -- data derived from LSD information

Results relate only to items tested

Remarks:



C30+ COMPOSITIONAL ANALYSIS

CRUDE QUALITY INC.

A847102:L51904

Operator Name

Laboratory Number

CRUDE QUALITY INC. AUG08 LIGHT CRUDES

COND. BLEND CRW-792

Well Name

Sample Point

ENBRIDGE

Sampling Company

Maxx/D

Client ID

2008/08/17

2008/09/11

2008/10/02

GM1

Date Sampled Start

Date Sampled End

Date Received

Date Reported

Date Reissued

Analyst

COMPONENT	BOILING POINT (°C)	MOLE FRACTION	MASS FRACTION	VOLUME FRACTION
Nitrogen	-196			
Carbon Dioxide	-79			
Hydrogen Sulphide	-60			
Methane	-162	0.0000	0.0000	0.0000
Ethane	-89	Trace	Trace	Trace
Propane	-42	0.0029	0.0014	0.0019
Iso-Butane	-12	0.0055	0.0034	0.0042
n-Butane	0	0.0355	0.0222	0.0263
Iso-Pentane	28	0.1645	0.1277	0.1422
n-Pentane	36	0.1744	0.1354	0.1492
Hexanes	37-69	0.1877	0.1738	0.1807
Heptanes	70-98	0.1718	0.1700	0.1633
Octanes	99-126	0.1254	0.1420	0.1338
Nonanes	127-151	0.0559	0.0732	0.0686
Decanes	152-174	0.0248	0.0367	0.0347
Undecanes	175-196	0.0134	0.0211	0.0186
Dodecanes	197-216	0.0078	0.0135	0.0117
Triadecanes	217-236	0.0055	0.0103	0.0088
Tetradecanes	237-253	0.0041	0.0084	0.0071
Pentadecanes	254-271	0.0036	0.0081	0.0067
Hexadecanes	272-287	0.0023	0.0056	0.0046
Heptadecanes	288-302	0.0023	0.0059	0.0048
Octadecanes	303-317	0.0018	0.0047	0.0039
NonaDecanes	318-331	0.0015	0.0041	0.0033
Eicosanes	332-343	0.0012	0.0037	0.0029
Heneicosanes	344-357	0.0012	0.0036	0.0029
Docosanes	358-369	0.0011	0.0035	0.0027
Triacosanes	370-380	0.0009	0.0032	0.0026
Tetracosanes	381-391	0.0007	0.0025	0.0020
Pentacosanes	392-402	0.0007	0.0024	0.0019
Hexacosanes	403-412	0.0007	0.0024	0.0019
Heptacosanes	413-422	0.0006	0.0022	0.0018
Octacosanes	423-432	0.0005	0.0020	0.0015
Nonacosanes	433-441	0.0005	0.0018	0.0014
triacontanes+	442-449+	0.0012	0.0052	0.0040
Totals		1.0000	1.0000	1.0000
neoHexane	50	0.0000	0.0000	0.0000
Methylcyclopentane	70	0.0416	0.0377	0.0349
Benzene	80	0.0139	0.0117	0.0093
Cyclohexane	81	0.0318	0.0288	0.0256
Methylcyclohexane	101	0.0407	0.0430	0.0389
Toluene	111	0.0178	0.0176	0.0142
Ethylbenzene	136	0.0024	0.0028	0.0022
m&p-Xylene	139	0.0069	0.0079	0.0063
o-Xylene	144	0.0028	0.0032	0.0025
1,2,4-Trimethylbenzene	169	0.0013	0.0018	0.0014

** Information not supplied by client -- data derived from LSD information

Results relate only to items tested

Remarks:



TRACE SULPHUR ANALYSIS

A847102:L51905

CRUDE QUALITY INC.	<i>MaxID</i>	<i>Client ID</i>	<i>Meter Number</i>	<i>Laboratory Number</i>
<i>Operator Name</i>				<i>Well ID</i>
CRUDE QUALITY INC. AUG08 LIGHT CRUDES				ENBRIDGE
<i>Well Name</i>	<i>Initials of Sampler</i>			<i>Sampling Company</i>
	COND. BLEND CRW-787			1L CAN
<i>Field or Area</i>	<i>Pool or Zone</i>	<i>Sample Point</i>	<i>Container Identity</i>	<i>Percent Full</i>
<i>Test Recovery</i>	<i>Interval 1</i> <i>Interval 2</i> <i>Interval 3</i> From: _____ To: _____		<i>Elevations (m)</i> KB _____ GRD _____	<i>Sample Gathering Point</i> _____ <i>Solution Gas</i> _____
<i>Test Type</i> <i>No.</i> <i>Multiple Recovery</i>			<i>Well Fluid Status</i>	<i>Well Status Mode</i>
<i>Production Rates</i> Water m3/d _____ Oil m3/d _____ Gas 1000m3/d _____		<i>Gauge Pressures kPa</i> Source _____ As Received _____	<i>Temperature °C</i> 23.0 Source _____ As Received _____	<i>Well Status Type</i> _____ <i>Well Type</i> _____ <i>Gas or Condensate Project</i> _____ <i>Licence No.</i> _____
2008/08/17	2008/09/11	2008/10/02	AG	
<i>Date Sampled Start</i>	<i>Date Sampled End</i>	<i>Date Received</i>	<i>Date Reported</i>	<i>Date Reissued</i> <i>Analyst</i>

COMPOSITION			Boiling Pt. (°C)	Sulphur mole ppm	Sulphur mass ppm	PROPERTIES
Component	Common Name					
Hydrogen Sulphide	H2S		-60.4	<0.5	<0.5	<i>Molecular Wt. (g/mole)</i> Measured
Carbonyl Sulphide	COS		-50	<0.5	<0.5	
Methanethiol	Methyl mercaptan		6.2	1.7	0.5	
Ethanethiol	Ethyl mercaptan		35	45.9	14.7	<i>Molecular Wt. (g/mole)</i> Calculated
Dimethyl Sulphide	DMS		38	19.1	6.1	
Carbon Disulphide	CS2		46.5	4.7	1.5	
Iso-Propanethiol	Iso-propyl mercaptan		58	68.3	21.9	<div style="border: 1px solid black; padding: 5px; margin: 0 auto; width: 80%;"> <i>Onsite H2S</i> _____ ppm(mole) mole% </div>
t-Butanethiol	tert-butyl mercaptan		64	10.1	3.2	
Methyl Ethyl Sulphide	MES		67	11.8	3.8	
n-Propanethiol	Propyl mercaptan		70	11.1	3.6	
Unknown			36-69	<0.5	<0.5	
Thiophene/sec-Butanethiol	Thiophene/sec-Butyl mercaptan		84/90	39.4	12.6	
Diethyl Sulphide	DES		92.1	6.4	2.1	
Iso-Butanethiol	Iso-butyl mercaptan		99	1.9	0.6	
n-Butanethiol	Butyl mercaptan		98	4.3	1.4	
Unknown			71-97	5.3	1.7	
Dimethyl Disulphide	DMDS		110	17.7	5.7	
n-Pentanethiol	Pentyl mercaptan		127	1.3	<0.5	
Unknown			100-126	37.4	12.0	
n-Hexanethiol	Hexyl mercaptan		151	15.2	4.9	
Unknown			127-150	48.2	15.4	
n-Heptanethiol	Heptyl mercaptan		177	5.5	1.7	
Unknown			152-176	58.2	18.6	
Total Sulphur				6016	1925.0	
Mercaptan Sulphur on Naphtha fraction (IBP 204°C) ASTM D3227 (mass%) Naphtha IBP 204°C (volume %) Elemental Sulphur (mass ppm)						

** Information not supplied by client -- data derived from LSD information

Results relate only to items tested

Remarks:

Light Crude Quality Project Analyses Summary (December 2007)

Crude	Sample Date	No. Samples or Batch #	Sulphur (wt%)	API Density (degree)	Absolute Density (kg/m3)	Sediment (ppmw)	MCR (wt%)	Salt (ptb)	TAN (mgKOH/g)	Nickel (mg/L)	Vanadium (mg/L)
CRW Condensate Blend											
	2005 Q2	3	0.17	62.9	727.0		0.2			43.5	4.8
	2005 Q3	3	0.16	63.3	725.8		0.4			17.9	2.4
	2005 Q4	3	0.17	63.6	724.6		0.3				3.6
	2006 Q1	4	0.16	64.8	720.2		0.3				6.8
	2006 Q2	3	0.21	63.3	725.9		0.3				1.4
	2006 Q3	2	0.17	62.1	730.2		0.2				1.2
	2006 Q4	2	0.13	67.0	712.2		0.1				
	2007 Q1	3	0.13	65.4	718.1		0.2				
	2007 Q2	3	0.10	67.6	710.3		0.1				
	2007 Q3	3	0.13	65.7	717.0		0.2				
	2007 Q4	3	0.22	64.8	720.3		0.2				1.6
	2008 Q1	1	0.39	65.1	719.2		0.4				
	12/1/2007	CRW-753	0.15	67.6	710.2		0.1				
	1/1/2008	CRW-757	0.39	65.1	719.2		0.4				
		Average	0.17	64.6	721.0		0.2			35.0	3.2
		Std Dev	0.07	2.1	7.7		0.1			13.1	2.0
		Avg + StdDev	0.24	66.7	728.7		0.4			48.1	5.2
		Avg - StdDev	0.10	62.5	713.3		0.1			21.9	1.2

Light Crude Quality Project Light Ends Summary (December 2007)

Crude Sample Date	Count of Batches or Batch No.	Ethane (vol%)	Propane (vol%)	Butanes (vol%)	Pentanes (vol%)	Hexanes (vol%)	Heptanes (vol%)	Octanes (vol%)	Nonanes (vol%)	Decanes (vol%)	Benzene (vol%)	Toluene (vol%)	Ethyl Benzene (vol%)	Xylenes (vol%)
CRW Condensate Blend														
2005 Q2	3	0.02	0.32	3.54	23.63	21.20	15.23	10.08	5.12	2.28	1.15	2.10	0.23	1.86
2005 Q3	3	0.02	0.23	3.23	23.45	21.28	16.37	10.77	5.51	2.45	1.23	2.34	0.25	2.03
2005 Q4	3	0.02	0.23	3.15	21.79	21.60	16.33	11.80	6.09	2.40	1.16	2.26	0.30	2.13
2006 Q1	4	0.02	0.19	2.76	22.50	22.77	14.89	10.86	6.18	2.49	1.23	2.07	0.28	1.92
2006 Q2	3	0.02	0.27	3.42	22.51	19.93	15.65	10.90	5.69	2.30	1.06	2.08	0.26	1.86
2006 Q3	2	0.02	0.28	2.96	20.36	19.74	16.38	11.82	6.08	2.52	1.06	2.19	0.29	2.06
2006 Q4	2	0.02	0.22	3.37	25.43	22.50	15.32	10.35	5.29	2.09	1.13	2.00	0.25	1.82
2007 Q1	3	0.02	0.24	3.33	24.64	24.26	15.17	10.54	5.29	2.17	1.27	2.10	0.27	1.93
2007 Q2	3	0.02	0.20	3.22	25.40	23.30	15.51	10.59	5.37	1.96	1.25	2.15	0.27	1.86
2007 Q3	3	0.02	0.24	3.42	23.97	20.53	15.46	10.25	5.10	2.08	1.08	2.13	0.25	1.82
2007 Q4	3	0.02	0.26	3.49	24.77	21.60	16.06	11.39	5.70	2.22	1.08	2.15	0.30	1.97
2008 Q1	1	0.02	0.21	3.06	25.40	21.80	16.14	11.48	5.53	2.05	1.07	2.13	0.31	1.99
12/1/2007	CRW-753	0.02	0.18	2.89	26.08	22.84	16.97	11.76	5.53	2.07	1.14	2.22	0.3	1.94
1/1/2008	CRW-757	0.02	0.21	3.06	25.4	21.8	16.14	11.48	5.53	2.05	1.07	2.13	0.31	1.99
Average		0.02	0.24	3.25	23.56	21.77	15.65	10.85	5.59	2.27	1.16	2.14	0.27	1.93
Std Dev		0.01	0.06	0.34	2.28	1.95	0.94	0.96	0.65	0.30	0.12	0.16	0.04	0.16
Avg + StdDev		0.03	0.30	3.59	25.84	23.72	16.59	11.82	6.24	2.56	1.28	2.30	0.31	2.09
Avg - StdDev		0.01	0.18	2.91	21.28	19.82	14.71	9.89	4.94	1.97	1.04	1.99	0.23	1.78