



MURPHY OIL CORP 1-12-64-25-W5M

Customer: PTRHTF20046	System Information	Sample Information
QUADRA CHEMICALS 12925 146TH STREET EDMONTON, AB T5L 2H6 CANADA Attn: Ron Nordhagen Tel: (780)665-1291 E-Mail: ron_nordhagen@quadra.ca	System Volume: 20000 ltr Bulk Operating Temp: 428F / 220C Heating Source: Blanket: Fluid: PETRO CANADA PETRO-THERM Make: PROFIRE/ALCO	Lab No: 02209872 Analyst: Peter Harteveld Sample Date: 04/04/18 Received Date: 04/13/18 Completed: 04/16/18 To discuss this report contact Peter Harteveld at (780)967-4234

Recommendation: Water content is slightly high. Recommended to boil off the water by venting steam to atmosphere. The Fluid is in a good condition and suitable for further use.

Comments:

Sample Date	Received Date	Fluid Age	Sample Location	Flash Point (COC)	Water (KF)	Viscosity (40°C)	Acid Number	Solids	GCD 10%	GCD 50%	GCD 90%	GCD % < 335°C
	mm/dd/yy			°F/°C	ppm	cSt	mg/KOH/g	%wt	°F/°C	°F/°C	°F/°C	%
04/04/18	04/13/18	2m		453 / 234	536.9	34.2	0.055	0.017	706 / 374	786 / 419	894 / 479	0.00
Baseline Data				433 / 223		34.2	0.03		720 / 382	817 / 436	900 / 482	1.00



