



DRILLING MORNING REPORT # 38 Trefoil-2

07 Nov 2009 From: Bryan Houston / Paul Leathem

To: Phil Stratford

Well Data									
Country	Australia	MDBRT	2523.0m	Cur. Hole Size	8.500in	AFE Cost	US\$33,167,745		
Field	Trefoil	TVDBRT	2523.0m	Last Casing OD	9.625in	AFE No.	Trefoil-2		
Drill Co.	Maersk	Progress	3.0m	Shoe TVDBRT	2520.0m	Daily Cost	US\$600,000		
Rig	Kan Tan IV	Days from spud	32.67	Shoe MDBRT	2520.0m	Cumul. Cost	US\$27,085,500		
Wtr Dpth(MSL)	69.0m	Days on well	37.13	FIT/LOT:	11.00ppg /				
RT-ASL(MSL)	26.0m	Planned TD MD	3221.0m	Current Op @ 0600	RIH 8 1/2'	BHA on 5" DP.			
RT-ML	95.0m	Planned TD TVDRT	3221.0m	Planned Op	Planned Op Continue to RIH. Drill ahead 8 1/2" hold #1.				

Summary of Period 0000 to 2400 Hrs

Continued to pick up drill pipe from deck and RIH. 75 joints total picked up. Continued to RIH to 2402m. Washed and reamed from 2402m to 2494m. Tagged float collar. Took SCRs & CLF. Performed well control exercise with drill crew. Drilled out shoe track. Shoe depth 2520m. Drilled 3m of new formation from 2520m to 2523m. Pumped 25bbls Hi Vis pill and circulated hole clean. Performed FIT to 740psi with 9.4ppg mud = 11 ppg EMW. Pumped slug and POOH. Held time out for safety.

HSE Summary				
Events	Num. Events	Days Since	Descr.	Remarks
Last BOP Test	05 Nov 2009			
Abandon Drill	1	0 Days	Held abandon drill	
Emergency Drill	1	3 Days	Full Emergency drill performed	
Fire Drill	1	0 Days	Main deck - Fire in Control room	
Flash Reports	1	0 Days	Flash Report #047	Pin from shackle dropped from derrickmans pull back tugger.
Permit To Work	16	0 Days	Permits administered	
Pre-tour Meeting	2	0 Days	Shift change meetings	
Safety Meeting	6	0 Days	Prejob safety meetings	
STOP Card	60	0 Days	Number of STOP Cards submitted	
Trip / Kick Drill	1	0 Days	Perform well control exercise with drill crew	Performed well control exercise with drill crew.

FORMATION	
Name	Тор
Upper Angahook	1162.00m
Angahook Volcanics Equiv	1331.00m
Lower Angahook	1569.00m
Demons Bluff	1850.00m
Eastern View Coal Measures	2105.00m

Operations For Period 0000 Hrs to 2400 Hrs on 07 Nov 2009

Phse	Cls (RC)	Op	From	То	Hrs	Depth	Activity Description
P17	U	G8	0000	0300	3.00	2520.0m	Continued to pick up drill pipe from deck and RIH from 402m to 900m. Filled pipe. 75 joints total picked up.
P17	U	G8	0300	0800	5.00	2520.0m	Continued to RIH with stands from 900m to 2402m. Filled pipe every 20 stands.
P17	U	F1	0800	0930	1.50	2520.0m	Washed and reamed from 2402m to 2494m. Tagged float collar.
P17	U	G23	0930	1030	1.00	2520.0m	Took SCRs and CLF. Performed well control exercise with drill crew.
P17	Р	D8	1030	1200	1.50	2520.0m	Drilled out shoe track with 5-10klbs WOB (70rpm, 140spm=700gpm @ 1550psi). Shoe depth 2520m. Drilled 3m of new formation from 2520m to 2523m.
P17	Р	F4	1200	1300	1.00	2520.0m	Pumped 25bbls Hi Vis pill and circulated hole clean with 140spm=700gpm @ 1550psi. Installed Geoservices bracket.
P17	Р	E1	1300	1530	2.50	2520.0m	Pulled back inside casing shoe to rig up and perform FIT to 710psi = 11.0 ppg EMW.
P17	U	G8	1530	2000	4.50	2520.0m	Pumped slug and POOH from 2520m to 257m.
P17	U	G14	2000	2130	1.50	2520.0m	Performed flow check prior to pulling BHA through the BOPs. POOH and racked back





Phse	Cls (RC)	Ор	From	То	Hrs	Depth	Activity Description
							BHA from 257m - 54m.
P17	U	G23	2130	2230	1.00	2520.0m	Time out for safety. Roughnecks heard something land on the rig floor which had dropped from out of the derrick. Inspection found that the pin of a shackle used by the derrickman on a sheave on his pull back tugger at the monkey board level had fallen out. Performed mast inspection and checked all other similar shackles and sheaves in the mast prior to continuing operations. Flash Report #047
P17	U	G8	2230	2300	0.50	2520.0m	Continued to POOH BHA from 54m to surface. Dull bit (#4) grade 1-1-WT-A-E-I-NO-BHA.
P17	Р	G6	2300	2400	1.00	2520.0m	Picked up and made up 8 1/2" PDC bit and BHA.

Operations For Period 0000 Hrs to 0600 Hrs on 08 Nov 2009

Phse	Cls (RC)	Ор	From	То	Hrs	Depth	Activity Description
P17	Р	G6	0000	0100	1.00	2520.0m	Picked up and RIH 8 1/2" BHA to 31m.
P17	Р	G7	0100	0230	1.50	2520.0m	Downloaded MWD tools and installed radio active source.
P17	Р	G6	0230	0330	1.00	2520.0m	Continued to pick up BHA and RIH from 31m to 180m.
P17	Р	G7	0330	0430	1.00	0.0m	Performed shallow water test of MWD tools (127spm/1067gpm/1150psi).
P17	Р	G6	0430	0500	0.50	2520.0m	Continued to RIH BHA from 127m - 287m.
P17	Р	G8	0500	0600	1.00	2520.0m	RIH 8 1/2" BHA on 5" DP from 287m to 650m. Filled every 15 stands.

Operations For Period Hrs to Hrs on

Phase Data to 2400hrs, 07 Nov 20	09					
Phase	Phase Hrs	Start On	Finish On	Cumul. Hrs	Cumul. Days	Max Depth
Mob/Demob(P1)	69.5	21 Sep 2009	04 Oct 2009	69.50	2.896	0.0m
Conductor Hole(P2)	46.5	04 Oct 2009	06 Oct 2009	116.00	4.833	155.0m
Conductor Casing(P3)	37	06 Oct 2009	08 Oct 2009	153.00	6.375	155.0m
Surface Hole(P4)	68	08 Oct 2009	11 Oct 2009	221.00	9.208	935.0m
Surface Casing(P5)	36	11 Oct 2009	12 Oct 2009	257.00	10.708	935.0m
BOPs/Risers(P6)	61.5	12 Oct 2009	15 Oct 2009	318.50	13.271	935.0m
Production Hole (1)(P11)	176.5	15 Oct 2009	22 Oct 2009	495.00	20.625	2520.0m
Production Casing(1)(P13)	359	22 Oct 2009	06 Nov 2009	854.00	35.583	2520.0m
Liner Hole (1)(P17)	37	06 Nov 2009	07 Nov 2009	891.00	37.125	2520.0m

General Comments

00:00 TO 24:00 Hrs ON 07 Nov 2009

WBM Data				Cost Tod	lay US\$ 3216					
Mud Type:	KCI	API FL:	4.0cc/30min	CI:	42500mg/l	Solids(%vol):	3%	Viscosity	6	66sec/qt
	POLYMER	Filter-Cake:	1/32nd"	K+C*1000:	9%	H2O:	93%	PV YP	251	11cp b/100ft ²
Sample-From:	2	HTHP-FL:	10.5cc/30min	Hard/Ca:	400mg/l	Oil(%):		Gels 10s		9
Time:	07:30 hrs	HTHP-cake:	2/32nd"	MBT:	12	Sand:	.3	Gels 10m		15
Weight:	9.40ppg	TITTII -cake.	2/32110					Fann 003		9
-				PM:	0.2	pH:	9	Fann 006		10
Temp:				PF:	0.15	PHPA:	2ppb	Fann 100		26
								Fann 200		32
Comment		Note: Cost is in	n AUD					Fann 300		36
								Fann 600		47

Bit # 4				Wear	I	01	D	L	В	G	02	R
					1	1	WT	Α	1	I		вна
				Bitwear C	comments:							
Size ("):	8.50in	IADC#	117	No	zzles	Drille	d over las	st 24 hrs	Ca	lculated o	ver Bit	Run
Mfr:	Baker Huhes Chistensen	WOB(avg)	3.30klb	No.	Size	Progres	s	3.0m	Cumul.	Progress		3.0m
Type:	Rock	RPM(avg)	72			On Botte	om Hrs	0.5h	Cumul.	On Btm H	rs	0.5h
Serial No.	: 6076381	F.Rate	729gpm			IADC D	rill Hrs	0.2h	Cumul.	IADC Drill	Hrs	0.2h
Bit Model	8 1/2 GT-1	SPP	1617psi			Total Re	evs		Cumul.	Total Reve	3	0
Depth In	2520.0m	HSI				ROP(av	g)	6.00 m/hr	ROP(av	g)		6.00 m/hr
Depth Out	2523.0m	TFA	0.000									
Bit Comm	ent					•						





BHA # 24												
Weight(Wet)	50000.00klb	Length		255.7m	Torque(max))	D.C. (1) Ann Velocity	670fpm				
Wt Below Jar(Wet)	25000.00klb	String	3	330.00klb	Torque(Off.E	8tm)	D.C. (2) Ann Velocity	0fpm				
		Pick-Up	3	340.00klb	Torque(On.E	8tm)	H.W.D.P. Ann Velocity	378fpm				
		Slack-Off	3	320.00klb			D.P. Ann Velocity	378fpm				
BHA Run Description		Drill out 9 5/8 o	ill out 9 5/8 casing shoe BHA.									
BHA Run Comment		Note/ No jets i	nstalled in bi	t incase cr	nt squeeze jol	b is required.						
E	quipment		Length	OD	ID	Serial #	Comment					
Bit			0.25m	8.50in	2.25in	6076381						
Bit Sub			1.19m	6.88in	2.38in	87						
6 3/4" DC			9.32m	6.75in	2.88in	1185						
6 3/4" DC			9.45m	6.75in	2.88in	1764						
6 3/4" DC			9.44m	6.75in	2.88in	1180						
6 3/4" DC			9.26m	6.75in	2.88in	1191						
6 3/4" DC			9.47m	6.75in	2.88in	1761						
6 3/4" DC			9.20m	6.75in	2.88in	1188						
6 3/4" DC			9.45m	6.75in	2.88in	1759						
6 3/4" DC			9.38m	6.75in	2.88in	1760						
Jar			9.91m	6.50in	2.88in	17602018						
6 3/4" DC			9.47m	6.75in	2.88in	1190						
6 3/4" DC			9.29m	6.75in	2.88in	1766						
6 3/4" DC			9.45m	6.75in	2.88in	1183						
HWDP			141.13m	5.00in	3.00in							
Bulk Stocks												

Bulk Stocks					
Name	Unit	In	Used	Adjust	Balance
Rig Fuel	m3	0	10	0	532.0
Drill Water	m3	30	0	0	634.0
Pot Water	m3	14	25	0	255.0
Brine	m3	0	0	0	71.0
Barite	MT	0	0	0	167.0
Baradefoam-W300	can	0	0	0	9.0
Barolift	boxes	0	0	0	17.0
Bentonite	MT	0	0	0	81.2
Caustic Soda	pail	0	8	0	16.0
Lime	sx	0	0	0	4.0
Soda Ash	sx	0	3	0	34.0
Sodium Bicarbonate	25kg sx	0	0	0	38.0
Shaker Screen 50	Screens	0	0	0	8.0
Citric Acid	Sacks	0	0	0	80.0

Pυ	ımps																
Pu	mp Data - Last	24 Hrs						Slow Pump Data									
No.	Туре	Liner (in)	MW (sg)	Eff (%)	SPM (SPM)	SPP (psi)	Flow (gpm)	Depth (m)	SPM1 (SPM)	SPP1F (psi)	low1(gpr	n)SPM2 (SPM)	SPP2 (psi)		SPM3 (SPM)		Flow3 (gpm)
1	Continental Emsco	6.50	1.12	97	85	1617	729	2520.0	30	320	252	40	360	336	50	450	420
2	Continental Emsco	6.50	1.12	97	85	1617	729	2520.0	30	310	252	40	360	336	50	460	420
3	Continental Emsco	6.50	1.12	97	85	1617	729	2520.0	30	300	252	40	350	336	50	440	420

Casing			
OD	LOT / FIT	Csg Shoe (MD/TVD)	Cementing
30 "	/		30" Cement Job: Pumped 50 bbls spacer ahead. Mixed 260 bbls of 15.8ppg (53 MT) class G cement with 155 bbls of seawater. Displaced with 72.4 bbls of seawater.





Casing	Casing							
OD	LOT / FIT	Csg Shoe (MD/TVD)	Cementing					
13.38	15.15ppg /		13 3/8" Cement Job: Pumped 50 bbls of spacer ahead. Mixed 436 bbls (35 MT) of 11.5 ppg lead cement with 368 bbls of mix water. Mixed 67 bbls (14 MT) of 15.8 ppg tail cement with 40 bbls of mix water. Displaced with 412 bbls of seawater.					
9.63	/ 11.00ppg	2520.00m / 2520.00m	No Cmt					

Personnel On Board				
Company	Pax			
ADA	4			
Maersk	48			
GRN	4			
OMS	14			
Reach	1			
Geoservices	4			
Halliburton Cementers	2			
Halliburton	3			
Halliburton (Baroid)	2			
Dril-Quip	1			
Fugro ROV	3			
Swaco	1			
Sperry Sun	3			
Origin Energy	2			
Other Contractor	1			
Total	93			

Mud Volumes, Mud Losses and Shale Shaker Data Engineer: Mike Lawrance / Fergus Spencer							
Available	2306.9bbl	Losses	0.0bbl	Equipment	Description	Mesh Size	Comments
Active	750.0bbl	Downhole		Shaker 1	Brandt VSM 300	20 top/50 bottom	
Mixing	0.0bbl	Surf+ Equip	0.0bbl	Shaker 2	Brandt VSM 300	20 top/50 bottom	
Ü		' '	0.0001	Shaker 3	Brandt VSM 300	20 top/50 bottom	
Hole	695.9bbl	Dumped		Shaker 4	Brandt VSM 300	20 top/50 bottom	
Slug		De-Gasser					
Reserve	861.0bbl	De-Sander					
Kill		De-Silter					
		Centrifuge					
				1			

Marine Weather on 07 Nov 2009 Rig Support Visibility Wind Speed Wind Dir. Air Temp. Wave Height Wave Dir. Wave Period Pressure Anchors Tension (klb) 1025.0mbar 13C° 183.0 10.0nm 18kn 50.0deg 1.0m 60.0deg 2 188.0 VDL Heave Pitch Roll Rig Dir. Ris. Tension Weather Comments 3 158.0 317.0deg 240000.00klb 116684.00klb 0.9m 0.4deg 1.0deg 4 194.0 Swell Period Swell Height Swell Dir. Comments 5 210.0 6 195.0 3.0m 160.0deg 5s 7 181.0 194.0

Vessel Name	Arrived (Date/Time)	Departed (Date/Time)	Status		Bulks		
Far Scimitar	1920 hrs 7/10/09		Rig standby	Item	Unit	Used	Quantity
				Rig Fuel	M3		629
				Potable Water	M3		490
				Drill Water	M3		530
					t		(
				Barite	t		(
				Bentonite	t		(
				Brine	M3		165





Far Fosna	0630 hrs 3/10/09	Rig Standby.	Item	Unit	Used	Quantity
			Rig Fuel	M3		456
			Pot Water	M3		516
			Drill Water	M3		600
			Bentonite	t		42
			Barite	t		0
				t		130
			Brine	M3		0
1330 - 1515 hrs, Car	go operations.					

Helicopter Movement							
Flight #	Company	Arr/Dep. Time	Pax In/Out	Comment			
1	Bristow Helicopters	1	1				