

## State of West Virginia Division of Environmental Protection Section of Oil and Gas

Reviewed	TM6
Recorded	minimum variation variation variation of the contraction of the contra

Well Operator's Report of Well Work

Farm	name:	GEORGIA-PACIFIC CO.

Operator Well No.: D-39 S-137181

LOCATION:

Elevation: 1053.24

Quadrangle: CHAPMANVILLE

District:

ISLAND CREEK

County: LOGAN

Latitude: 11600 Feet South of 37 Deg. 55 Min. 0 Sec. Longitude: 11500 Feet West of 82 Deg. 2 Min. 30 Sec.

Company:

ASHLAND EXPLORATION, INC.

P. O. BOX 391, A1-6 ASHLAND, KY 41114-0391

Agent:

B. E. WIDENER

Inspector: OFIE HELMICK

Permit Issued: Well work Commenced: Well work Completed:	01/06/92 03/11/92 07/17/92
Verbal Plugging:	
Permission granted on:	
	Rig
Total Depth (feet)	4104
Fresh water depths (ft)	
3" stream 80'	
Salt water depths (ft)	
None noted	
Is coal being mined in	area (Y/N)? <u>N</u>

Casing & Tubing	Used in Drilling	Left in Well	Cement Fill Up Cu. Ft.
Size			
16"	42'	42'	11.8
11 3/4"	313'	313'	294
8 5/8"	1500'	1500'	505
5 1/2"	4081'	4081'	781
1.9" @ 1.9" @	3936' w/ 1768'	R-4 pkr 0	1801

OPEN FLOW DATA

Coal Depths (ft): <u>885-889</u>

Producing formation <u>Dev. Shale/Berea</u> Pay zone depth (ft) <u>2290-4024</u>

Gas: Initial open flow <u>0</u> MCF/d Oil: Initial open flow <u>---</u> Bbl/d Final open flow \*1192 MCF/d Final open flow <u>---</u> Bbl/d 3 Hours Time of open flow between initial and final tests \_\_\_\_ Static rock pressure \_\_\_\_495# psig (surface pressure) after \_\_\_\_72\_\_\_

Second producing formation Big Lime Pay zone depth (ft) 1608-1762 Gas: Initial open flow 84 MCF/d Oil: Initial open flow Final open flow MCF/d Final open flow — Oil: Initial open flow \_\_\_\_\_ Bb1/d Time of open flow between initial and final tests Hours Static rock Pressure \_\_\_\_\_500#\_ psig (surface pressure) after \_

NOTE: ON BACK OF THIS FORM PUT THE FOLLOWING: 1. DETAILS OF PERFORATED INTERVALS, FRACTURING OF STIMULATING, PHYSICAL CHANGE, ETC. 2.) THE WELL LOG WHICH IS A SYSTEMATIĆ DETIALED GEOLOGICAL RECORD OF ALL FORMATIONS, INCLUDING COAL ENCOUNTERED BY THE WELLBORE.

For: ASHLAND EXPLORATION, INC.

James L. Stephens, Eng. Tech.

Formation on Rock Type	<u>TOP</u>	BASE
Sand and Shale (Base Lee Fm) Pennington formation U. Maxton 1319-1384 L. Maxton 1456-1468	0 1092	1092 1489
Little Lime Big Lime Borden formation Sunbury Shale Berea Devonian Shale Onondaga Ls	1489 1540 1762 2257 2287 2306 4092	1540 1762 2257 2287 2306 4092 TD

DTD 4104 LTD 4107

11%" casing cemented to surface by grouting 40 sx after primary cement job. 8%" casing cemented to surface on primary job.

## Well Treatment

Perf Rhinestreet 16H/3804-4024.  $N_2$  frac using 500 gal  $7\frac{1}{2}\%$  fe acid, 811,000 scf  $N_2$  @ 102,000 scf/min. BD @ 2380#, ATP 3100#, MTP 3160# and ISIP 2000#.

Perf L. Huron 21H/3295-3580.  $N_2$  frac using 500 gal  $7\frac{1}{2}\%$  fe acid, 805,000 scf  $N_2$  @ 103,000 scf/min. BD 4080#, ATP 2500#, MTP 4080# and ISIP 1400#.

Perf U. Dev. Shale and Berea 19H/2290-2708. N<sub>2</sub> frac using 500 gal  $8\frac{1}{2}\%$  fe acid, 812,000 scf N<sub>2</sub> @ 102,000 scf/min. BD 1610#, ATP 2150#, MTP 2320# and ISIP 1200#.

Perf Big Lime 26H/1608-1762. 60 quality foam acidize using 500 gal 15% fe acid, 8000 gal 28% fe acid, and 239,500 scf  $\rm N_2$  @ 5,700 scf/min. BD 2570#, ATP 1800# @ 5.7 bbl/min acid rate, MTP 2570# and ISIP 1840#.

FORM WW-28 DEO 19 1991

045-1180 Expuis 16194
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STATE OF WEST VIRGINIA
DEPARTMENT OF ENERGY, DIVISION OF OIL AND GAS WELL WORK PERMIT APPLICATION

1)	Well Operator: Ashland Exploration, Inc. 2750 (5) 33
	Island Creek Coal Co. Operator's Well Number: <u>D-39, Serial #137181</u> 3) Elevation: 1053.2
4)	Well type: (a) Oil/ or Gas_X/
	(b) If Gas: Production_X/ Underground Storage/ Deep/ Shallow_X/
5)	Proposed Target Formation(s): Devonian Shale
6)	Proposed Total Depth: 5,163' KB feet
7)	Approximate fresh water strata depths: 213' KB (Map WV-12)
8)	Approximate salt water depths: 488' KB (Map WV-12)
	Approximate coal seam depths: Solid - No seams operated
	Does land contain coal seams tributary to active mine? Yes/ No_X /
11)	Proposed Well Work: Drill and Stimulate New Well
12)	CASING AND TUBING PROGRAM

TYPE	SPECIFICATIONS		FOOTAGE	INTERVALS	CEMENT	
	Size	Grade	Weight per ft.	For drilling	Left in well	Fill-up (cu.ft.)
Conductor	16	LS	36.91	30	30 ~	CTS
Fresh Water	11 3/4	H40	42.0	350	350	CTS
Coal					1.4	3, 1,2/4.3
Intermediate	8 5/8	J55	24.0	1500	1500	CTS
Production	5 1/2	J55	15.5	5163	5163 <del>x</del>	AS NEEDED
Tubing	1.9	J55	2.76		5113	SIPHON
Liners						

PACKERS	9	Kind Sizes Depths s	set	
1405	***************************************	-		
) Fee	(s	) paid:	For Division of Oil and Gas Use Only  Well Work Permit Reclamation Fund WPCI  Bond Lower Ager	
Plan	t ب	EI WW-	-9   WW-2B.   Bond Lucky Sind   Ager	nt

Form WW2-A (09/87) DEC 19 1991 2) DEC 19 1991 3)	Date: December 18, 1991 Operator's well number Island Creek Coal Co. #D-39, Serial #137181 API Well No: 47 - 045 - 1180 State - County - Permit				
DEPARTMENT OF ENERGY, DI					
NOTICE AND APPLICATION F	OR A WELL WORK PERMIT				
4) Surface Owner(s) to be served:  (a) Name Georgia-Pacific Corp.  Address General Delivery  Wyoming, WV 24898	Name N/A				
(b) Name Address  (c) Name	(b) Coal Owner(s) with Declaration Name Island Creek Coal Company Address P.O. Box 840 Holden, WV 25625				
Address	Name Address				
6) Inspector Ofie Helmick  Address P.O. Box 218  Sanrock, WV 24834  Telephone (304) - 732-9135	(c) Coal Lessee with Declaration				
Included is the lease or leases or other continuing contract or contracts by which I hold the right to extract oil and gas OR  X Included is the information required by Chapter 22B, Article 1, Section 8(d) of the Code of West Virginia (see page 2)  I certify that as required under Chapter 22B of the West Virginia Code  I have served copies of this notice and application, a location plat, and accompanying documents pages 1 through 2 on the above named parties, by:  Personal Service (Affidavit attached)  X Certified Mail (Postmarked postal receipt attached)  Publication (Notice of Publication attached)					
I have read and understand Chapter 22B and 38 CSR 11-18, and I agree to the terms and conditions of any permit issued under this application.  I certify under penalty of law that I have personally examined and am familiar with the information submitted on this application form and all attachments, and that based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the information is true, accurate, and complete.  I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment.  Well Operator Ashland Exploration, Inc.					
Its: <u>Operations Manager</u> Address P.O. Box 391					
Ashland, KY 41114  Telephone 606-329-5989 Subscribed and sworn before me this 18th day of December , 1991					
My community expires November 23, 1994	Notary Public				