

22-Jan-99 API # 47- 83-01157

State of West Virginia Division of Environmental Protection
Section of Oil and Gas
Well Operator's Report of Well Work

Farm name: VANCE, HARVEY J

Operator Well No.: MAKNOES UNA #1

LOCATION:

Elevation: 3,825.00 Quadrangle: HARMAN Conservation Commission

County: RANDOLPH

District: DRY FORK County: RANDOLPH
Latitude: 6220 Feet South of 38 Deg. 55Min. 0 Sec.
Longitude 5960 Feet West of 79 Deg. 30 Min. 0 Sec.

Company: ARDENT RESOURCES, INC.

P. O. BOX 8

BETHEL PARK, PA 15102-0008

Agent: EDWARD HART

Inspector: PHILLIP TRACY

01/22/99 Permit Issued:

01/27/99 Well work Commenced: Well work Completed:

Verbal Plugging

Permission granted on:

Rotary x Cable Rig
Total Depth (feet) 9230'
Fresh water depths (ft) 3/4" @ 54'
1/2" @ 500'

Salt water depths (ft) none

Is coal being mined in area (Y/N)?N

Coal Depths (ft):\_\_\_

Casing & Tubing	Used in Drilling		Cement  Fill Up  Cu. Ft.
Size 20"	17'	17'	10 sx
13 3/8"	216'	216'	165 sx
9 5/8"	1802'	1802'	590 sx
4 1/2"		9188'	387 sx
2 3/8"		8990'	

## OPEN FLOW DATA

Producing formation Oriskany Sandstone Pay zone depth (ft) 9007'

Gas: Initial open flow 2017 MCF/d Oil: Initial open flow \_\_\_\_\_ Bbl,

Final open flow 1150 MCF/d Final open flow \_\_\_\_ Bbl,

Time of open flow between initial and final tests \_\_\_\_\_ Hour Bbl/d Static rock Pressure 2500 psig (surface pressure) after 48 Hours

Second producing formation N/A Pay Zone deposition N/A Pay zone depth (ft)\_ Final open flow MCF/d Final open flow Time of open flow between initial and final tests psig (surface pressure) after Static rock Pressure\_

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

For:	ARDENT RESOURCES, INC.	
	ARDENT RESOURCES, INC. By: Very J. Ward	
	By: (1-1:00)	
	Date: 004/19/00	

DETAILS OF PERFORATED INTERVALS, FRACTURING OR STIMULATING, PHYSICAL CHANGE, ETC.

- 5/13/99 Perforated Oriskany @ 9007' to 9010', 9019' to 9022', 9048' to 9054' w/4 spf.
- 5/14/99 Frac Oriskany w/100 sx 80/100 sand, 600 sx 20/40 sand, w/5% HCL throughout. Slurry volume 28,350 gals. Total HCL acid 5500 gals. BDP 2540 psi, AIR 35 BPM, ATP 4000 psi.

## WELL LOG

sand and shale     surface       shale     270       sand     510       shale     650       sand and shale     740       lime and shale     900       lime and shale     1450       sand and shale     1450       shale     1540       sand and shale     1800       sand and shale     1800       sand and shale     3000       sand and shale     3560       sand and shale     3700       shale     3700       sand and shale     3700       shale     3700       sand     3940       sand     7360       sand     7400       shale     4070       sand     7600       sand     7600       shale     8700       shale     8300       shale     840       shale	FORMATION COLOR HARD OR SOFT	TOP FEET	BOTTOM FEET	REMARKS Including indication of all fresh and salt water, coal, oil and gas
	shale sand shale sand and shale lime and shale sand sand and shale sand and shale sand and shale sand shale sand shale sand and shale sand and shale shale sand shale sand shale sand shale sand chale lime (Tully) shale shale (Marcellus) lime (Onondaga) Chert (Huntersville) shale (Needmore) sand (Oriskany)	270 510 650 740 900 1250 1450 1540 1800 2000 3080 3760 3740 4070 7360 7410 7600 7640 8270 8300 8620 8780 8840 8890 8925	510 650 740 900 1250 1450 1540 1800 2000 3080 3560 3700 3940 4070 7360 7410 7600 7640 8270 8300 8620 8780 8840 8890 8925 9140	3/4" fresh wtr. @ 54' 1/2" fresh wtr. @ 500'

(Attach separate sheets as necessary)

Ardent Resources, Inc.	
Well Operator	
By: Yenry & Hand	
Date: 04-18.00	

Note: Regulation 2.02(i) provides as follows:

"The term 'log' or 'well log' shall mean a systematic detailed geological record of all formations, including coul, encountered in the drilling of a well."