

## ENRON **OPERATIONS CORP.**

P. O. Box 1188 Houston, Texas 77251-1188 (713) 853-6161

April 19, 1995

Ms. Barbara Hoditschek New Mexico Environment Department Hazardous & Radioactive Materials Bureau 525 Camino de Los Marquez P.O. Box 26110 Santa Fe, NM 87502

RE:

Report of Interim Corrective Measures

Volume of Liquida Decement (calleng)

Transwestern Pipeline Company Roswell Compressor Station Reporting Period: January 1, 1995 through March 31, 1995

Dear Ms. Hoditschek,

This letter report of interim corrective measures at the Roswell Station covers the calendar quarter of January 1995 through March 1995. In December 1994, Transwestern Pipeline Company (TPC) obtained the services of a local contractor, Clayton M. Barnhill, to provide routine operations and maintenance services beginning January 1, 1995. Each month, Mr. Barnhill prepares and submits a spreadsheet report which details various information associated with the interim corrective measures system. A copy of Mr. Barnhill's reports, for each month within the reporting period, are attached.

ı.	volume of Liquius Recovered (gallons)	During Reporting Period	<u>10 Date</u>				
1.	Phase Separated Hydrocarbons (PSH)	423	6,677				
2.	Ground Water	314	5,971				
3.	PSH and Ground Water Combined	737	12,648				
-	Accumulation Time for Recovered Liquids	Januar	10 1005				
1.	Date liquids last removed from recovery tank		January 10, 1995				
2.	Last day of reporting period	Marc	h 31, 1995				
3.	Accumulation time to last day of reporting perio	d	80 days				

#### **III. General Comments**

On January 4, 1995, TPC removed the PSH skimmers from the recovery pumps set in wells MW-1 and RW-1. The primary objective of this action was to substantially reduce the thickness of PSH collected in these two recovery wells. It was previously reported, that as a result of removing the skimmers, a significant volume of PSH and water were recovered within the five day period immediately following their removal. However, it has since been determined that the initial elevated recovery rate was not sustained for any significant duration and the volume measurements were in error. The measurement problem which resulted in this error has been corrected and the estimated volume of liquids recovered presented in this report are believed to be accurate.

On January 8, 1995, the operations and maintenance contractor noted a hydrocarbon odor during inspection of the secondary containment system for pump #2 (recovery well MW-1B). Pump #2 was therefore shut off until the problem could be identified and resolved. Subsequently, it was discovered that an elbow in the discharge line had failed (cracked) and recovered liquid had leaked into the secondary containment line. The failed part was replaced and the system placed back in service. During the repair of the discharge line, the contractor looked for evidence of a discharge (such as soil staining) from the secondary containment to the ground and no such evidence was found. Also, during the repair operation, the air supply line which operates the recovery pumps was inadvertently ruptured. This resulted in a complete system shut down of fourteen days while the air line was repaired.

The following comment is in regard to an event which occurred outside the reporting period but is significant enough to warrant noting at this time. The effectiveness of the preceding January 4, 1995 actions to reduce the thickness of PSH collected in the MW-1 recovery well was limited by the depth the pump was set in the well. Therefore, in order to remove this limitation, on April 1, 1995, TPC replaced the discharge tubing on the pump set in MW-1 with a greater length of new tubing. This effectively lowers the depth at which the pump is set. Subsequent measurements taken to evaluate the effectiveness of this action are as follows:

	Depth to	Depth to	PSH Thickness
Date of Measurement at MW-1	Water (ft.)	PSH (ft.)	(ft.)
March 31, 1995 (Prior to action)	60.22	49.12	11.1
April 19, 1995 (Subsequent to action)	63.79	63.75	0.04

Based on the measurements presented above, this action was effective in reducing the thickness of PSH collected in recovery well MW-1. More information regarding this issue, including sustained recovery rates, will be available and presented in the next quarterly reporting period report.

If you have any questions regarding the content or format of this report, please contact me at (713) 646-7644 or George Robinson at (713) 646-7327.

Sincerely.

Bill Kendrick

Projects Group Manager EOC Environmental Affairs

gcr/BK

cp w/enclosures:

Teri Davis Roger Anderson NMED HRMB NMOCD Santa Fe, NM Santa Fe, NM

### Transwestern Pipline Facility Remediation System Maintenance Roswell, New Maxico

Recovery Well Log Sheet	Month:	Day:	Wal #	Product Level	Water Level	Pump # / MW #	Flow Rate	Cycle Time	Tank Recovered Fluid Level	Product	Water	Remarks:	Inspector	Time
Erron Roswell Remediation System Maintenance	Jan-95	1-Jan	RW-1/p1	38' 10"	38' 11"	Pump 1/RW-1	125ML/60 Sec.		2.32'	0.70		Pumps 1,2,3,4 On, No spills or leaks	CMB	5:30-5:45 p.m.
Transwestern Pipeline Facility		2-Jan	MW-18/p2	59" 1"	59' 1.5"	Pump 2/MW-1B	10 ML/ 120 sec.					Pumps 1,2,3,4 On, No spills or leaks	СМВ	9:30-9:45 a.m.
5381 North Main Street		3-Jan	MW-2/p3	No Product	59"	Pump 3/MW-2	100/ 60 sec.					Pumps 1,2,3,4 On, No spills or leaks	CMB	3:15-3:30 p.m
Roswell, New Mexico 88201		4-Jan	MW-1/p4	48' 6.5"	59' 1"	Pump 4/MW-1	150/ 60sec					Pumps 1,2,3,4 On, No spills or leaks	CMB	10:00-10:15 a.m
		5-Jan	1							_		Pumps 1,2,3,4 On, No spills or leaks	CMB	2:00-2:15 p.m.
Prepared By:		6-Jan	1					-				Pumps 1,2,3,4 On, No spills or leaks	CMB	4:45-5:00 p.m.
Clayton M. Barnhill		7-Jan										Pumps 1,2,3,4 On, No spills or leaks	СМВ	9:30-9:48 a.m.
Consulting Geologist		8-Jan							Pump 2 Shut off due to leakage			Pumps 1, 3, 4, On, No Spills or Leaks	CMB	9:45-10:10 a.m
PO Box 2304		9-Jan	1			Pump 1/RW-1	Trace/ 60 Sec.		2.32	0.70*	1.62	Pumps 1, 3, 4, On, No Spills or Leaks	CMB	2:15-3:00 p.m.
Roswell, New Mexico 88202-2304		10-Jan	1			Pump 2/MW-1B	Off		Tank Emptied			Pumps 1, 3, 4, On, No Spills or Leaks	CMB	10:00-10:15a.n
(505) 622-2012		11-Jan				Pump 3/MW-2	100 ML/ 120 sec	;,				Pumpe 1, 3, 4, On, No Spills or Leaks	CMB	8:00-8:20 a.m.
		12-Jan				Pump 4/MW-1	10 ML/ 60sec.					Pumps 1, 3, 4, On, No Spills or Leaks	CMB	7:15-7:30 a.m.
		13-Jan										Pumps 1, 3, 4, On, No Spills or Leaks	CMB	3:30-3:40 a.m.
		14-Jan	1		1	1	1					Pumps 1, 3, 4, On, No Spills or Leaks	СМВ	2:20-2:40 p.m
		15-Jan	1				1					Pumps 1, 3, 4, On, No Spills or Leaks	CMB	6:15-6:30 p.m
		16-Jan	1							_		Pumpe 1, 3, 4, On, No Spills or Leaks	CMB	9:00-9:15 a.m
		17-Jan	1			Pump 1/RW-1	Trace/ 60 Sec.		0.3	0.3	0	Pumps 1, 3, 4, On, No Spills or Leaks	CMB	11:30-s.m12p.
		18-Jan				Pump 2/MW-1B	Off					Pumps 1, 3, 4, On, No Spills or Leaks	CMB	5:10-5:20 a.m.
		19-Jan	1			Pump 3/MW-2	50 ML/ 120 sec.					Pumps 1, 3, 4, On, No Spills or Leaks	СМВ	9:10-9:20 a.m.
		20-Jan	+			Pump 4/MW-1	10 ML/ 60eec.					Pumps 1, 3, 4, On, No Spills or Leaks	CMB	2:45-3:00 p.m
		21-Jan	1		1		12					Pumps 1, 3, 4, On, No Spills or Leaks	CMB	12:30-12:45 p.i
		22-Jan	1									Pumps 1, 3, 4, On, No Spills or Leaks	CMB	6:30-5:45 a.m
		23-Jan	<del>                                     </del>		+							Pumps 1, 3, 4, On, No Spills or Leaks	CMB	4:30-4;50 p.m
		24-Jan	<del>i - 1</del>		+	+						Pumps 1, 3, 4, On, No Spills or Leaks	CMB	5:30-5:45 a.m
	<del></del>	25-Jan	<del> </del>									Pumps 1, 3, 4, On, No Spills or Leaks	ST	4:30-4:45 р.п
		26-Jan	<del>   </del>				<del> </del>					Pumps 1, 3, 4, On, No Spills or Leaks	ST	4:30-4:45 p.m
		27-Jan	1			<del>                                     </del>	+					Pumps 1, 3, 4, On, No Spills or Leaks	ST	5:15-5:30 p.m
		28-Jan	<del> </del>		+	· · · · · · · · · · · · · · · · · · ·						Pumpe 1, 3, 4, On, No Spills or Leaks	CMB	4:30-4:45 p.m
	<del></del>	29-Jan	<del></del>			+						Pumpe 1, 3, 4, On, No Spills or Leaks	CMB	3:30-3:45 p.m
		30-Jan	<del>i -</del>		<del> </del>		<del> </del>					Pumpe 1, 3, 4, On, No Spille or Leaks	CMB	4:45-5:00 p.m
		31-Jan	RW-1/p1	38,80	39.15	Pump 1/RW-1	Trace/ 60 Sec.		1.08'	0.96	0.12	Pumps 1, 3, 4, On, No Spills or Leaks	CMB	10:00a.m12:p.r
<del></del>	<del>-  </del>	31.3811	MW-1B/p2	58.24	61.0	Pump 2/MW-1B	Off		1.00	0.50	0.72	Tonigo 17 of 17 old in a	1	
	<del></del>		MW-2/p3	58.94'	59.0	Pump 3/MW-2	50 ML/ 120 sec.			<del>                                     </del>			1	
		<del> </del>	MW-1/p4	48.58	59.40*	Pump 4/MW-1	Trace/ 60sec.							<del>                                     </del>
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	<del></del>		<del> </del>		-		+		31.5 gallons / inch of tank volume	52.29 gallons	54 9a door			
THE STATE			-			<del> </del>	<del> </del>		107.79 gallons/3.45 gallons per day	1.68gal/day			<del> </del>	
			<del></del>						107.79 gallons/3.45 gallons per day	1.08gal/day	1.70 ga/0sy	<u> </u>		

# Transwestern Pipline Facility Remediation System Maintenance Roswell, New Mexico

Recovery Well Log Sheet	Month:	Day:	Well#	Product Level	Water Level	Pump#/MW#	Flow Rate	Cycle Time	Tank Recovered Fluid Level	Product	Water	Remarks:	Inspector	Time
nron Roswell Remediation System Maintenance	Fab-95	1-Feb		· · · · · · · · · · · · · · · · · · ·		Pump 1/RW-1	Trace/ 60 Sec.		1.08*	0.96*	0.12	Pumps 1, 3, 4, On, No Spills or Leaks	CMB	4:30-4:45 p.m.
ranswestern Pipeline Facility		2-Feb				Pump 2/MW-1B	Off					Pumps 1, 3, 4, On, No Spills or Leaks	CMB	10 am - 12 pm
381 North Main Street		3-Feb				Pump 3/MW-2	50 ML/ 120 sec					Pumps 1, 3, 4, On, No Spills or Leaks	CMB	10 am - 2 pm
Roswell, New Mexico 88201		4-Feb	1			Pump 4/MW-1	Trace/ 60sec.					Pumps 1, 3, 4, On, No Spills or Leaks	CMB	1:15 - 1:30 pm
		5-Feb										Pumps 1, 3, 4, On, No Spills or Leaks	CMB	2:30-2:45 p.m.
repared By:		6-Feb	1				1			T		Pumps 1, 3, 4, On, No Spills or Leaks	CMB	9 am - 12 pm
Dayton M. Barnhill		7-Feb										Cut Air Line, Shut Down System	CMB	10 am - 4 pm
Consulting Geologist		8-Feb	f t			1	1					Cut Air Line, Shut Down System	CMB	7:30 am - 3 pm
O Box 2304		9-Feb					1					Repaired Airline Did not Hold, Broke	CMB	5:30 - 5:45 pm
Roswell, New Mexico 88202-2304		10-Feb				T	1					System Shut Down, Air Line Broken	CMB	Shut Down
(505) 622-2012		11-Feb				+	1					System Shut Down, Air Line Broken	CMB	Shut Down
		12-Feb					<del>†</del>			-		System Shut Down, Air Line Broken	CMB	5 - 6 pm
		13-Feb	1						<del></del>			System Shut Down, Air Line Broken	CMB	Shut Down
		14-Feb	+				<del>                                     </del>			1		System Shut Down, Air Line Broken	CMB	Shut Down
		15-Feb	1									System Shut Down, Air Line Broken	CMB	Shut Down
	<u> </u>	16-Feb		·			<del>                                     </del>		<del>                                      </del>	1		System Shut Down, Air Line Broken	CMB	Shut Down
		17-Feb	t			<del>-</del>			<del> </del>			System Shut Down, Air Line Broken	CMB	Shut Down
		18-Feb	†			+	<del></del>		<del> </del>			System Shut Down, Air Line Broken	СМВ	11 am -12:30 pr
		19-Feb	+			+			· <del> </del>			System Shut Down, Air Line Broken	СМВ	Shut Down
		20-Feb	RW-1/p1	38.82	39.20*	Pump 1/RW-1	Trace/ 60 Sec.		1.08'	0.98	0.10	System Shut Down, Air Line Broken	CMB	10 am -12:30 pm
		21-Feb	MW-1B/p2	58.79*	61.45	Pump 2/MW-1B	Off		<del>                                     </del>			Pumps 1, 3, 4, On, No Spills or Leaks	CMB	10 am - 4 pm
		22-Feb	MW-2/p3	58.30*	60.62		25 ML/ 120 sec					Pumps 1.2, 3, 4, On, No Spills or Leaks	CMB	9 am - 4 pm
		23-Feb	MW-1/p4	48.58'	59.40"	Pump 4/MW-1	Trace/ 60sec.			+		Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB	8:30 - 9:00 am
		24-Feb	1		7.7.7.							Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB	4:30 pm -6 pm
		25-Feb	<del>                                     </del>			<del></del>	<del>                                     </del>		<b>+</b>			Pumps 1,2, 3, 4, On, No Spille or Leaks	CMB	7:00 -7:15 em
		26-Feb				<del> </del>			<del>-  </del>			Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB	12:30 - 12:45 pr
		27-Feb		•		<del> </del>	<del> </del>					Pumps 1.2. 3, 4, On, No Spills or Leaks	CMB	5:15-5:30 p.m.
		28-Feb	<del> </del>			Pump 1/RW-1	Trace/ 60 Sec.		1.08'	0.98*	0.10	Pumps 1.2, 3, 4, On, No Spills or Leaks	CMB	7:30 -8 am
		20.00	<del>                                     </del>			Pump 2/MW-1B	10 ML/60 Sec			- 5.00			-	
			1			Pump 3/MW-2	25 ML/ 120 sec	<u> </u>		+				
			+			Pump 4/MW-1	Trace/ 60sec.			+		<u> </u>	1	
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	<del></del>		+ +			+	+			+		<del></del>	1	
			+			+	+	Totale:	31.5 gallons / inch of tank volume	6.3 gallons	0		-	<del></del>
T/THE 12 THE 12	<del></del>	ļ	<del> </del>				ļ	/ U.S.	6.3 gallons/ 14 days = 0.45gal/day	0.45gal/day		<del>                                     </del>	+	

#### Transwestern Pipline Facility Remediation System Maintenance Roswell, New Mexico

Recovery Well Log Sheet	Month:	Day:	Was	Product Level	Water Level	Pump#/MW#	Row Rate	Cycle Time	Tank Recovered Fluid Level	Product	Weter	Remarks:	Inspector	Time
nron Roswell Remediation System Maintenance	Mar-95	1-Mar				Pump 1/RW-1	Trace/ 60 Sec.	3 Cycle	1.08*	0.98*	0.10	Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB	6:30-6:45 a.m.
Franswestern Pipeline Facility		2-M#				Pump 2/MW-1B	25ML/60 Sec					Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB	6 am - 6:15 am
5381 North Main Street		3-M#				Pump 3/MW-2	50 ML/ 120 sec.					Pumps 1,2, 3, 4, On, No Spills or Leaks	СМВ	6 p.m6:15 p.m
Roswell, New Mexico 88201		4-Mar	T			Pump 4/MW-1	Trace/ 50sec.					Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB	8:15 - 8:30 a.m
		5-Mar				1						Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB	6:30-6:45 p.m.
Prepared By:		6-Mar										Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB	6:30-6:45 p.m.
Clayton M. Barnhill		7-Mar										Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB	8am 8:15 am
Consulting Geologist		8-Mar	1							-		Pumps 1,2, 3, 4, On, No Spills or Leaks	СМВ	7:30 pm - 7:45 p
PO Box 2304		9-Mar										Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB	4:30 - 4:45 pm
Roswell, New Mexico 88202-2304		10-Mar										Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB	4:30 · 4:45 pm
(505) 622-2012		11-Mar	$\overline{1}$									Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB	7:45 - 8 a.m.
		12-Mar										Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB	7 - 7:15 p.m.
		13-Mar				Pump 1/RW-1	Trace/ 60 Sec.	3 Cycle	1.51'	1.04'	0.47	Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB	5:45 - 6 p.m.
		14-M#				Pump 2/MW-1B	25ML/60 Sec					Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB	6:45 - 7 p.m.
		15-Mar	1 1			Pump 3/MW-2	50 ML/ 120 sec.					Pumps 1,2, 3, 4, On, No Spits or Leaks	CMB	6:45 - 7 p.m.
		16-Mar	1 1			Pump 4/MW-1	Trace/ 60sec.					Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB	6 -6:15 a.m.
		17-M#	1			1				<b></b>		Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB	2:45 -3 p.m.
		18-Mar	1			1	1			-		Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB	10:30 a.m4:30 o
		19-Mar	<del>                                     </del>				-			+		Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB	2-4 p.m.
		20-M#	1						<del></del>			Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB	7 · 7:25 p.m.
		21-M#	1				<u> </u>					Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB ·	7 -7:15 p.m.
		22-Mar	<del>  </del>									Pumps 1,2, 3, 4, On, No Spills or Leaks	СМВ	7 · 7:15 p.m.
		23-M#	<del>                                     </del>			Pump 1/RW-1	Trace/ 60 Sec.	3 Cycle	1,76*	1.12	0.64	Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB	6 -6:15 s.m.
		24-M#	1			Pump 2/MW-1B	10 ML/60 Sec	0 0,00	1	1.72	0.04	Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB	6:20-6:40 p.m.
		25-M#				Pump 3/MW-2	25 ML/ 120 sec.		+	1		Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB	3:00 -3:15 p.m
		26-M#			<u> </u>	Pump 4/MW-1	Trace/ 60sec.			+		Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB	8 -10 a.m.
		27-Mar	1				1110001 000001					Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB	3 -4 p.m.
		28-Mar				T	<del> </del>			· · · · ·	<del></del>	Pumpe 1,2, 3, 4, On, No Spills or Leaks	CMB	4:30 -4:45 p.m
		29-Mar	1			<del>                                     </del>		† · · · · · · · · · · · · · · · · · · ·	<del></del>			Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB	6:15 -6:30 p.m
		30-Mar	1			<del> </del>	<del> </del>	<del></del>		<del></del>		Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB	6:30 -6:45 p.m.
		31-Mar	RW-1/p1	38,84'	39.32	Pump 1/RW-1	Trace/ 60 Sec.	3 Cycle	1.95	1.12	0.83*	Pumps 1,2, 3, 4, On, No Spills or Leaks	CMB	6:30 -6:45 p.m
			MW-1B/p2	59.10	59.12	Pump 2/MW-1B	10 ML/60 Sec	9 0700	1.30	1.12	0.00	Tongs 1,2, 0, 1, on, 10 opine de Leane	-	3.00 U.10 p.m
			MW-2/p3	59.00	59.06	Pump 3/MW-2	25 ML/ 120 sec.		-	+				
			MW-1/p4	49.12	60.22	Pump 4/MW-1	Trace/ 60sec.			+		<del> </del>	1	
						1. 4		Recovery:	0.87*	0.14	0.73			<del> </del>
			+						0.67	0.14	0.73		<del> </del>	<b>—</b>
			1 1					Totals:	31.5 gallons / inch of tank volume	4.41	22.99		<del> </del>	<del> </del>
			1 1				+	rotara:	27.40 gallons/ 31 days = 0.88gal/day				<del>                                     </del>	+
	<del></del>						<del></del>		27.40 galors/ 31 days = 0.88ga/day	1 U. 14 ga/gay	U. /4 ga/day			